

DRAFT PROGRAM ENVIRONMENTAL IMPACT REPORT

FOR THE

PITTSBURG TECHNOLOGY PARK SPECIFIC PLAN

(SCH # 2024030184)

JULY 2024

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PROJECT OVERVIEW

In May 2024, the City of Pittsburg (City) completed a multi-year process and updated the City's General Plan as the blueprint for the future physical development of the City. To guide development at a more granular level than provided in the 2040 General Plan, the Pittsburg Technology Park Specific Plan (proposed Specific Plan; proposed project) provides policy, zoning, development standards and guidelines, along with an implementation framework for the development of a technology park to generate employment opportunities within the City. The proposed Specific Plan acts as an intermediate level of guidance between the 2040 General Plan and individual development proposals within the proposed Specific Plan area (Plan Area).

The proposed Specific Plan incorporates a vision and goals for the Plan Area and sets development standards, zoning, and design guidelines for land use, site and building, public right-of-way, circulation, and mobility for the development of a dynamic employment center. All specific plans must comply with California Government Code Sections 65450-65457. These provisions require that a specific plan be consistent with the adopted general plan of the jurisdiction within which it is located. The 2040 General Plan designates the Plan Area for Employment Center Industrial (ECI) land use, and the Specific Plan would further provide zoning for the Plan Area adopted by ordinance.

This Program Environmental Impact Report (PEIR) has been prepared to address potential environmental effects associated with implementation of the Specific Plan. The project would establish employment generating uses in the Plan Area to increase economic opportunities by expanding the variety of industrial, office, and technology park uses.

The proposed project would require discretionary actions including: the adoption of the Pittsburg Technology Specific Park Plan; adoption of the tentative map; along with certification of this PEIR, including adoption of Findings, a Statement of Overriding Considerations (if applicable) and adoption of the Mitigation Monitoring Reporting Program. A detailed description of the proposed project is provided in Chapter 3.0 of this PEIR.

AREAS OF CONTROVERSY AND ISSUES TO BE RESOLVED

The CEQA Guidelines Section 15123 (b)(2) and (3) require that an EIR identify areas of controversy known to the Lead Agency, including issues raised by other agencies and the public and issues to be resolved, including the choice among alternatives and whether, or how to mitigate the significant effects. The issues of concern have been identified during the review period of the distribution of the NOP (from February 28, 2024, to March 29, 2024) and public meetings (public scoping meeting was held on March 14, 2024, via a web-based video meeting and in-person at 6:00 P.M.). This PEIR addresses the potentially significant impacts associated with aesthetics, air quality, biological resources, cultural and tribal cultural resources, geology, greenhouse gas emissions and energy, hazards and hazardous materials, hydrology and water quality, land use and planning, noise, population and housing, public services and recreation, transportation, utilities and service systems, wildfire, and cumulative impacts.

During the NOP process, 14 comment letters were received from interested agencies and organizations. The comments are summarized in Chapter 1.0, *Introduction*, of this PEIR and are also provided in Appendix A.

ALTERNATIVES TO THE PROPOSED PROJECT

The CEQA Guidelines require a PEIR to describe a reasonable range of alternatives to the project or to the location of the project which would reduce or avoid significant impacts, and which could feasibly accomplish the basic objectives of the proposed project. The alternatives analyzed in this EIR include the following:

- **Alternative A: No Project.** The No Project/No Development Alternative is analyzed based on the CEQA Guidelines Section 15126.6(e)(3)(B), which states: “In certain instances, the no project alternative means ‘no build’ wherein the existing environmental setting is maintained.” Under the No Project/No Development Alternative, the proposed Specific Plan would not be implemented, and no new development would occur.
- **Alternative B: No Project/Adopted 2040 General Plan Alternative.** The No Project/Existing General Plan Alternative is based on the CEQA Guidelines section 15126.6(e)(3)(A) which states: “When the project is the revision of an existing land use or regulatory plan, policy or ongoing operation, the “no project” alternative will be the continuation of the existing plan, policy or operation into the future. Typically, this is a situation where other projects initiated under the existing plan will continue while the new plan is developed. Thus, the projected impacts of the proposed plan or alternative plans would be compared to the impacts that would occur under the existing plan.” Consistent with CEQA Guidelines, Alternative B would not adopt or implement the development program proposed under the Pittsburg Technology Center Specific Plan. The Plan Area would conform to the 2040 General Plan and Zoning Ordinance.
- **Alternative C: Phase I Data Hub Development Only.** Alternative C would continue to provide a job-creating development in a portion of the Plan Area under separate approvals; however, it would not adopt or implement the proposed Specific Plan. Alternative C considers development of the Pittsburg Data Hub (PDH) for Phase I of the Plan Area. The PDH is composed of a 347,000 square foot data center, commercial switching yard and PG&E electrical substation, along with ancillary facilities, as described below. It is assumed that the remainder of the Plan Area would not be developed and would be retained as vacant land for the foreseeable future.

The PDH project includes an emergency backup generating facility with a generation capacity of up to 92 megawatts (MW) to support the need for the PDH to provide uninterruptible power supply for its tenant’s servers. The Pittsburg Back-up Generating Facility (PBGF) would consist of 37, 3 MW diesel-fired backup generators arranged in a generation yard located on the west side of the PDH. A total of 36 generators would be dedicated to replacing the electricity needs of the data center in case of a loss of utility power, and one additional generator would be used to support general office loads along

with building and life safety services. An application for a Small Power Plan Exemption (SPPE) was submitted to the California Energy Commission (CEC) on February 28, 2024, for the PBGF (24-SPPE-1). The entirety of the SPPE application, including a detailed analysis of the potential PDH project impacts, is included as Appendix C to this Program Environmental Impact Report (PEIR).

- **Alternative D: Limited Uses Alternative.** Alternative D would revise the list of permitted uses in the Specific Plan to place more emphasis on technology center, research, innovation, and light industrial uses. Specifically, this Alternative would eliminate all office, logistics, and warehouse uses, thereby reducing vehicle miles traveled, truck trips and associated diesel emissions. Alternative D was developed to reduce potential impacts associated with air quality, greenhouse gases, energy, noise, and transportation.

A comparative analysis of the proposed Specific Plan and each of the Project alternatives is provided in Table ES-1 below. The table includes a numerical scoring system, which assigns a score of 1 to 3 to each of the alternatives with respect to how each alternative compares to the proposed project in terms of the severity of the environmental topics addressed in this PEIR. A score of “2” indicates that the alternative would have the same level of impact when compared to the proposed project. A score of “1” indicates that the alternative would have a better (or reduced) impact when compared to the proposed project. A score of “3” indicates that the alternative would have a worse (or increased) impact when compared to the proposed project. The project alternative with the lowest total score is considered the environmentally superior alternative.

As shown in Table ES-1, Alternative A (the No Project/No Development Alternative) results in the least environmental impacts of all alternatives considered. However, as required by CEQA, when the No Project/No Development Alternative is the environmentally superior alternative, the environmentally superior alternative among the others must be identified.

The Phase I Data Hub Development Only Alternative has been identified as the environmentally superior alternative because it would result in reduced impacts related to aesthetics, air quality, biological resources, GHG emissions and energy, noise, transportation, and utilities. Additionally, this Alternative would meet three of the five project objectives, but not to the same extent under the proposed project.

TABLE ES-1: COMPARISON OF ALTERNATIVES TO THE PROPOSED PROJECT

ENVIRONMENTAL ISSUE	PROPOSED PROJECT	ALTERNATIVE A (NO PROJECT/NO DEVELOPMENT)	ALTERNATIVE B (NO PROJECT/2040 GENERAL PLAN ALTERNATIVE)	ALTERNATIVE C (PHASE I DATA HUB ONLY DEVELOPMENT)	ALTERNATIVE D (LIMITED USES)
Aesthetics	2 – Same	1 – Better than	3 – Worse than	1 – Better than	2 – Same
Air Quality	2 – Same	1 – Better than	3 – Worse than	1 – Better than	1 – Better than
Biological Resources	2 – Same	1 – Better than	2 – Same	1 – Better than	2 – Same
Cultural and Tribal Cultural Resources	2 – Same	1 – Better than	2 – Same	2 – Same	2 – Same
Geology and Soils	2 – Same	1 – Better than	2 – Same	2 – Same	2 – Same

<i>ENVIRONMENTAL ISSUE</i>	<i>PROPOSED PROJECT</i>	<i>ALTERNATIVE A (NO PROJECT/NO DEVELOPMENT)</i>	<i>ALTERNATIVE B (NO PROJECT/2040 GENERAL PLAN ALTERNATIVE)</i>	<i>ALTERNATIVE C (PHASE I DATA HUB ONLY DEVELOPMENT)</i>	<i>ALTERNATIVE D (LIMITED USES)</i>
Greenhouse Gases and Energy	2 – Same	1 – Better than	3 – Worse than	1 – Better than	2 – Same
Hazards and Hazardous Materials	2 – Same	1 – Better than	2 – Same	2 – Same	2 – Same
Hydrology and Water Quality	2 – Same	1 – Better than	2 – Same	2 – Same	2 – Same
Land Use and Planning	2 – Same	3 – Worse than	2 – Same	2 – Same	2 – Same
Noise	2 – Same	1 – Better than	3 – Worse than	1 – Better than	1 – Better than
Population and Housing	2 – Same	1 – Better than	2 – Same	2 – Same	2 – Same
Public Services and Recreation	2 – Same	1 – Better than	2 – Same	2 – Same	2 – Same
Transportation and Circulation	2 – Same	1 – Better than	3 – Worse than	1 – Better than	1 – Better than
Utilities	2 – Same	1 – Better than	3 – Worse than	1 – Better than	1 – Better than
Wildfire	2 – Same	2 – Same	2 – Same	2 – Same	2 – Same
SUMMARY	30	18	36	23	25

SUMMARY OF IMPACTS AND MITIGATION MEASURES

In accordance with the CEQA Guidelines, this PEIR focuses on the project's significant effects on the environment. The CEQA Guidelines defines a significant effect as a substantial adverse change in the physical conditions which exist in the area affected by the proposed project. A less than significant effect is one in which there is no long- or short-term significant adverse change in environmental conditions. Some impacts are reduced to a less than significant level with the implementation of mitigation measures and/or compliance with regulations.

The environmental impacts of the proposed project, the impact level of significance prior to mitigation, the proposed mitigation measures to mitigate an impact, and the impact level of significance after mitigation are summarized in Table ES-2.

TABLE ES-2: PROJECT IMPACTS AND PROPOSED MITIGATION MEASURES

<i>ENVIRONMENTAL IMPACT</i>	<i>LEVEL OF SIGNIFICANCE WITHOUT MITIGATION</i>	<i>MITIGATION MEASURE</i>	<i>RESULTING LEVEL OF SIGNIFICANCE</i>
AESTHETICS AND VISUAL RESOURCES			
Impact 3.1-1: Have a substantial adverse effect on a scenic vista	LS	<i>None Required</i>	LS
Impact 3.1-2: Substantially damage scenic resources, including but not limited to, trees, rock outcroppings, and historic buildings within a state scenic highway	NI	<i>None Required</i>	NI
Impact 3.1-3: General Plan implementation would not, in a non-urbanized area, substantially degrade the existing visual character or quality of public views of the site and its surroundings, or in an urbanized area, conflict with applicable zoning and other regulations governing scenic quality	NI	<i>None Required</i>	NI
Impact 3.1-4: General Plan implementation could result in the creation of new sources of nighttime lighting and daytime glare	LS	<i>None Required</i>	LS
AIR QUALITY			
Impact 3.2-1: Conflict with or obstruct implementation of the applicable air quality plan	LS	<i>None Required</i>	LS
Impact 3.2-2: Result in a cumulatively considerable net increase of any criteria pollutant for which the project region is nonattainment under an applicable federal or state ambient air quality standard	PS	MM 3.2-1 Prior to approval of subsequent development applications by the Zoning Administrator, applicants shall provide a project-level construction air quality analysis to determine the significance of air quality impacts. Specific construction activities shall be compared to BAAQMD screening criteria to determine if a more detailed emissions analysis is required to determine significance. If a quantitative analysis of emissions during project construction is required, the estimated emissions shall be compared to BAAQMD significance thresholds. Mitigation measures necessary to reduce any significant impacts	LS

ENVIRONMENTAL IMPACT	LEVEL OF SIGNIFICANCE WITHOUT MITIGATION	MITIGATION MEASURE	RESULTING LEVEL OF SIGNIFICANCE
		shall be developed in coordination with the BAAQMD and shall include BAAQMD's basic best management practices for construction-related fugitive dust emissions as follows: • All exposed surfaces (e.g., parking areas, staging areas, soil piles, graded areas, and unpaved access roads) shall be watered two times per day. • All haul trucks transporting soil, sand, or other loose material off-site shall be covered. • All visible mud or dirt trackout onto adjacent public roads shall be removed using wet power vacuum street sweepers at least once per day. The use of dry power sweeping is prohibited. • All vehicle speeds on unpaved roads shall be limited to 15 mph. • All roadways, driveways, and sidewalks to be paved shall be completed as soon as possible. Building pads shall be laid as soon as possible after grading unless seeding or soil binders are used. • All excavation, grading, and/or demolition activities shall be suspended when average wind speeds exceed 20 mph. • All trucks and equipment, including their tires, shall be washed off prior to leaving the site. • Unpaved roads providing access to sites located 100 feet or further from a paved road shall be treated with a 6- to 12-inch layer of compacted layer of wood chips, mulch, or gravel. • Publicly visible signs shall be posted with the telephone number and name of the person to contact at the lead agency regarding dust complaints. This person shall respond and take corrective action within 48 hours. The Air District's General Air Pollution Complaints number shall also be visible to ensure compliance with applicable regulations. MM 3.2-2 Prior to issuance of a grading permit, the project applicant shall show on the grading plans via notation that the contractor shall ensure that all offroad heavy-duty diesel-powered equipment larger than 100 horsepower (e.g., rubber tired dozers, excavators, graders, scrapers, pavers, paving equipment, and cranes) to be used for each phase of construction of the project (i.e., owned, leased, and subcontractor vehicles) shall	

ENVIRONMENTAL IMPACT	LEVEL OF SIGNIFICANCE WITHOUT MITIGATION	MITIGATION MEASURE	RESULTING LEVEL OF SIGNIFICANCE
		meet USEPA emissions standards for Tier 4 engines or equivalent. The grading plans shall be submitted for review and approval by the City Engineer. MM 3.2-3 To minimize emissions of fugitive dust, future development shall be required to implement the following enhanced best management practices, which shall be notated on grading plans prior to approval: 1. Limit the simultaneous occurrence of excavation, grading, and ground-disturbing construction activities. 2. Install wind breaks (e.g., trees, fences) on the windward side(s) of actively disturbed areas of construction. Wind breaks should have at maximum 50 percent air porosity. 3. Plant vegetative ground cover (e.g., fast-germinating native grass seed) in disturbed areas as soon as possible and watered appropriately until vegetation is established. 4. Install sandbags or other erosion control measures to prevent silt runoff to public roadways from sites with a slope greater than one percent. 5. Minimize the amount of excavated material or waste materials stored at the site. 6. Hydroseed or apply non-toxic soil stabilizers to construction areas, including previously graded areas, that are inactive for at least 10 calendar days. Due to the potential for full project buildout to include land use types that generate diesel truck trips beyond what was estimated in the CalEEMod modeling analysis, the following conditional mitigation measure may be required. MM 3.2-4 If a future development application includes a land use type that would generate diesel truck trips during project operation (such as logistics and warehousing), then prior to approval by the zoning administrator, a project-level air quality analysis shall be performed in conformance with General Plan Actions 2-A-4.b. and c. The analysis shall include, but not be limited to, quantification of operational criteria air pollutant emissions, a determination of operational air quality impacts, and identification of mitigation measures necessary to reduce any significant impacts.	

<i>ENVIRONMENTAL IMPACT</i>	<i>LEVEL OF SIGNIFICANCE WITHOUT MITIGATION</i>	<i>MITIGATION MEASURE</i>	<i>RESULTING LEVEL OF SIGNIFICANCE</i>
Impact 3.2-3: Expose sensitive receptors to substantial pollutant concentrations	PS	MM 3.2-5 If a future development application includes a land use type that would generate diesel truck trips during project operation (such as logistics and warehousing), then prior to approval by the Zoning Administrator, then a Health Risk Assessment (HRA) shall be performed in conformance with 2040 General Plan Action 2-A-4.c. The analysis shall evaluate potential impacts from directly emitted TAC and PM2.5, as specified in Chapter 5 of BAAQMD's 2022 CEQA Guidelines. The guidelines recommend a tiered approach where at each successive step, the project's impacts (i.e., annual PM2.5 concentrations, cancer risks, and hazards), and the combined cumulative impacts from surrounding sources and the project, are compared to the appropriate thresholds of significance. Projects shall not be approved until it can be demonstrated that the project would not result in exceedance of the established thresholds of significance for public health risks at nearby sensitive receptors.	LS
Impact 3.2-4: Result in other emissions (such as those leading to odors adversely affecting a substantial number of people)	LS	<i>None Required</i>	LS
BIOLOGICAL RESOURCES			
Impact 3.3-1: Have a substantial adverse effect, either directly or through habitat modifications, on any species identified as a candidate, sensitive, or special status species in local or regional plans, policies, or regulations, or by the California Department of Fish and Wildlife or U.S. Fish and Wildlife Service	PS	MM 3.3-1 Each applicant will be required to obtain coverage for the project under the East Contra Costa HCP/NCCP. This shall include submittal of all required application materials per HCP/NCCP Section 6.2.1 and payment of a Development Fee and applicable fees for wetland impacts and/or stream corridor encroachments consistent with current HCP/NCCP requirements. Alternatively, the applicant may, in accordance with the terms of PMC Section 15.108, offer to dedicate land in lieu of some or all of the HCP/NCCP Development Fee. All applicable fees shall be paid, and/or an "in-lieu-of-fee" agreement fully executed, prior to the issuance of a grading permit for the project. If a grading permit is not required, fee payment and/or an "in-lieu-of-fee" agreement shall be fully executed prior to issuance of the project's building permit. Proof of applicable fees and/or "in-lieu-of-fee" agreement shall be provided to the City of Pittsburg Community Development Director as a condition of approval for future projects under the Specific Plan.	LS

ENVIRONMENTAL IMPACT	LEVEL OF SIGNIFICANCE WITHOUT MITIGATION	MITIGATION MEASURE	RESULTING LEVEL OF SIGNIFICANCE
		MM 3.3-2 Each applicant will be required to provide Worker Environmental Awareness training to all construction personnel. The WEAP shall include the following information. • The sensitive habitats on the study area. • Special-status species known or potentially present on the site, including their: ○ Listing status and causes of decline, ○ Habitat preferences, and ○ Distinguishing physical characteristics. • The measures (AMMs and East Contra Costa HCP/NCCP measures) required to protect sensitive habitats and special-status species, including next steps and notifications in the event of a special-status species sighting. The WEAP shall include a hard copy handout that summarizes information presented in the training and includes photographs of habitat resources and species to facilitate identification in the field by construction personnel. Each applicant shall ensure that all construction personnel undergo WEAP training before they begin work. Training shall be delivered by a qualified biologist approved by the City of Pittsburg Community Development Director and shall be provided bilingually in English and Spanish if appropriate. MM 3.3-3 Each applicant shall ensure that the project adheres to all applicable East Contra Costa HCP/NCCP requirements. <u>Pre-Construction Surveys</u> Planning surveys per HCP/NCCP Section 6.3.1 were completed in 2018 – 2023. Based on the outcomes of the planning surveys, preconstruction surveys by USFWS- and CDFW-approved biologists shall be conducted for the following species per HCP/NCCP Sections 6.3.2: • Golden Eagle • Burrowing Owl • Swainson’s Hawk • San Joaquin kit fox	

ENVIRONMENTAL IMPACT	LEVEL OF SIGNIFICANCE WITHOUT MITIGATION	MITIGATION MEASURE	RESULTING LEVEL OF SIGNIFICANCE
		If preconstruction surveys determine that any of the above species is present on the site (or, for the bird species, within a distance where they could be disturbed by construction activity), the biologist may recommend construction monitoring; if so, then each applicant shall ensure that monitoring is conducted per HCP/NCCP Section 6.3.3. This will include submittal of a Construction Monitoring Plan (CMP) to the East Contra Costa County Habitat Conservancy for approval; the CMP must be submitted and approved prior to issuance of the grading permit (or, if no grading permit is required, the building permit) for the proposed project. Based on results of the planning surveys, which indicate that no suitable habitat is available on the study area, preconstruction surveys and construction monitoring are not required for the following species: • Covered shrimp species • Giant garter snake • Townsend's big-eared bat <u>Jurisdiction Delineations</u> A delineation of jurisdictional wetlands and other waters shall be conducted on the project site per HCP Sections 6.2.1 and 6.3.1. Each applicant shall also comply with all applicable provisions of East Contra Costa HCP/NCCP Section 6.4, Specific Conditions on Covered Activities, as follows: • Section 6.4.1: Landscape-Level Measures ○ Conservation Measure 1.10 – Maintain Hydrologic Conditions and Minimize Erosion ○ Conservation Measure 1.11 – Avoid Direct Impacts on Extremely Rare Plants, Fully Protected Wildlife Species [and] Covered Migratory Birds ○ Conservation Measure 1.7 – Establish Stream Setbacks ○ Conservation Measure 1.14 – Design Requirements for Covered Roads outside the UDA • Section 6.4.2: Natural Community-Level Measures	

ENVIRONMENTAL IMPACT	LEVEL OF SIGNIFICANCE WITHOUT MITIGATION	MITIGATION MEASURE	RESULTING LEVEL OF SIGNIFICANCE
		○ Conservation Measure 2.12 – Wetland, Pond, and Stream Avoidance and Minimization • Section 6.4.3: Species-Level Measures for the following species ○ California tiger salamander ○ Burrowing Owl ○ Golden Eagle ○ Swainson’s Hawk ○ San Joaquin kit fox ○ California Red-legged Frog MM 3.3-4 Rare Plant Survey & Protection MM 3.3-4a If project construction begins in 2025 or later, an updated protocol-level rare plant survey shall be conducted by a qualified biologist/botanist who is familiar with the rare plants of the project region and has been approved by the City of Pittsburg Community Development Director. Surveys shall be conducted prior to construction, with enough lead time to allow for the follow-up actions described below, if they are warranted. Surveys shall be conducted during the peak blooming periods of the target species and shall cover all potentially suitable habitats within the study area and surrounding 250-foot-wide buffer. Target species and blooming periods are listed in the table below; the table is highlighted to group species with similar blooming periods. If no special-status plants are documented within the area to be disturbed for project construction (including staging and access), no further action is required. MM 3.3-4b. If special-status plants covered by the East Contra Costa HCP/NCCP, or plants designated as “no take” by the East Contra Costa HCP/NCCP, are present on the site, the relevant survey report(s) shall be submitted to the East Contra Costa Habitat Conservancy per HCP/NCCP Section 6.3.1. If any of the following species covered by the East Contra Costa HCP/NCCP is found to be present, each applicant shall promptly notify the East Contra Costa County Habitat Conservancy of the species’ presence and the planned construction schedule, to enable the East Contra Costa County Habitat Conservancy to salvage the occurrence(s) in accordance with HCP/NCCP Conservation Measure 3.10 (Plant Salvage when Impacts Are Unavoidable). Each	

ENVIRONMENTAL IMPACT	LEVEL OF SIGNIFICANCE WITHOUT MITIGATION	MITIGATION MEASURE	RESULTING LEVEL OF SIGNIFICANCE
		applicant shall confirm with the East Contra Costa County Habitat Conservancy that the take limits established by the HCP/NCCP for the species in question have not been breached: • Big tarplant • Mount Diablo fairy lantern • Diablo helianthella • Showy golden madia • Adobe navarretia Under no circumstance shall any of the following HCP/NCCP “no-take” plants be harmed: • Large-flowered fiddleneck • Alkali milkvetch • Mt. Diablo buckwheat • Diamond-petaled poppy • Contra Costa goldfields • Caper-fruited tropidocarpum Due to their extreme rarity, none of these species are expected to be present within the Plan Area, but if any of them are found, each applicant shall notify the East Contra Costa County Habitat Conservancy immediately and shall work with the Conservancy to determine and execute the appropriate course of action. MM 3.3-4c If any special-status plant not covered by the East Contra Costa HCP/NCCP is found to be present, the occurrence(s) shall be avoided and protected in place to the extent feasible. If the occurrence(s) cannot be entirely avoided, then a Plant Salvage and Mitigation Plan shall be prepared and implemented. The Plan shall be prepared by a qualified biologist/botanist who is familiar with the rare plants of the project region and has experience conducting rare plant salvage operations. Plant salvage techniques shall be consistent with those outlined in HCP/NCCP Conservation Measure 3.10. The plan shall, at a minimum, include the following.	

ENVIRONMENTAL IMPACT	LEVEL OF SIGNIFICANCE WITHOUT MITIGATION	MITIGATION MEASURE	RESULTING LEVEL OF SIGNIFICANCE
		- Quantity and species of plants to be planted or transplanted - Location of the mitigation/transplant site(s) - Salvage methods, such as relocation/transplantation, seed collection, etc., including storage locations and methods to preserve the plants - Procedures for propagating collected seed, including storage methods - Planting procedures, including the use of soil preparation and irrigation - Schedule and action plan to maintain and monitor the mitigation/transplant site for a minimum 3-year period - Interim and final success criteria and corrective action thresholds (e.g., growth, plant cover, survivorship) - Potential corrective actions/contingency measures in the event interim success criteria are not being met (e.g., weed removal, supplemental irrigation, supplemental plantings, etc.). - Reporting requirements and procedures, including the contents of annual progress reports, report submittals, review/approval responsibilities, etc. Each applicant shall be responsible for ensuring that the Plant Salvage and Mitigation Plan is implemented. The Plan shall be implemented under the oversight of the biologist/botanist who prepared it or another individual with equivalent qualifications. The biologist shall be approved by the City of Pittsburg Community Development Director. MM 3.3-5 No more than one year prior to the initiation of vegetation removal and grading in the project area, each applicant shall retain an appropriately qualified biologist (see next paragraph) who has been approved by the City of Pittsburg Community Development Director to conduct surveys for Crotch bumble bee, obscure bumble bee, and American bumble bee. Biologist qualifications for bumble bee surveys will conform to current CDFW guidance prevailing at the time surveys are performed. Surveys shall be performed by a qualified entomologist familiar with the species' behavior. If surveys are performed prior to CESA (and if applicable, ESA) listing for any species, they shall comprise the following activities, consistent with CDFW's Survey Considerations for CESA Candidate Bumble Bee Species. In the event any bumble bee species is listed at the	

ENVIRONMENTAL IMPACT	LEVEL OF SIGNIFICANCE WITHOUT MITIGATION	MITIGATION MEASURE	RESULTING LEVEL OF SIGNIFICANCE
		time of survey, surveys will instead adhere to the protocol(s) adopted by the listing agency/agencies (CDFW and/or USFWS). • Surveys shall be conducted during each species' peak worker activity period. Surveys shall cover all areas of onsite habitat determined by the biologist to be suitable for any of the three target bumble bee species, based on habitat mapping conducted for the project to date. A minimum of three to four surveys shall be conducted, spaced two weeks apart; the total number, timing, and duration of surveys performed shall depend on the biologist's judgment, in consideration of weather, site conditions, and protocol requirements. Surveys shall be designed to identify all foraging bumble bee species; a single survey may be used to detect all species with peak activity periods including the survey date. • If Crotch bumble bee, obscure bumble bee, or American bumble bee is observed onsite during the surveys, an additional survey or surveys shall be conducted to determine whether a nest or colony is present, unless the biologist is satisfied that the initial survey(s) were sufficient to rule out the presence of nests/colonies. • If a nest or colony is present onsite, the biologist shall establish an appropriate avoidance buffer determined in consideration of site conditions, the species involved, and the construction activities planned prior to the close of the nesting season. No entry into the buffer shall be permitted. The buffer shall be delineated in the field using orange construction fencing or another appropriate medium, under the biologist's oversight, and shall remain in place until the end of the nesting species' gyne flying season, or until the qualified biologist determines that the nest has been abandoned. • If no nest/colony is present onsite, no further action will be taken. However, all workers shall be required to avoid injury and mortality to bumble bees they may encounter; this requirement shall be discussed during the WEAP training and shall be reiterated to all workers if special-status bumble bees are confirmed onsite. • To support improved understanding and conservation of all three bumble bee species, survey results, including negative findings, shall be submitted to CDFW prior to implementing project-related ground-disturbing activities. At a minimum, the survey report shall include the following information. 1. A description and map of the survey area, focusing on areas that could provide suitable habitat for Crotch bumble bee, obscure bumble bee, or American bumble bee	

ENVIRONMENTAL IMPACT	LEVEL OF SIGNIFICANCE WITHOUT MITIGATION	MITIGATION MEASURE	RESULTING LEVEL OF SIGNIFICANCE
		2. Field survey conditions, including name(s) of qualified entomologist(s) and brief qualifications; date(s) and time(s) of survey; survey duration; general weather conditions; survey goals; and species searched 3. Map(s) showing the location of nests/colonies, if any 4. A description of physical (e.g., soil, moisture, slope) and biological (e.g., plant composition) conditions where each nest/colony is found, including native plant composition (e.g., density, cover, and abundance) within impacted habitat (e.g., species list separated by vegetation class; density, cover, and abundance of each species) 5. The measures that will be implemented to avoid adverse effects on the bumble bee species present 6. An assessment of potential project effects on special-status bumble bees during project construction and project operation/maintenance, with avoidance and minimization measures in place. MM 3.3-6 The following measures will be required to protect monarch butterflies prior to ESA (and, if applicable, CESA) listing. In the event monarch butterfly is ESA- and/or CESA-listed at the time of project construction, monarch butterfly protection requirements will instead adhere to the protocol(s) adopted by the listing agency/agencies (CDFW and/or USFWS). • No more than two days prior to the initiation of vegetation trimming or removal for construction, each applicant shall ensure that a qualified biologist approved by the City of Pittsburgh Community Development Director surveys all areas of potentially suitable habitat for monarch butterfly larval host plants. • If host plants are found, the biologist shall survey all host plants for monarch eggs, larvae, and pupae. If no eggs, larvae, or pupae are found, plants may be removed within two days. • If eggs, larvae, or pupae are present, host plants shall be protected in place until the biologist has determined that no more eggs, larvae, or pupae are present. MM 3.3-7 The following measures will be required to protect western pond turtles prior to ESA (and, if applicable, CESA) listing. In the event western pond turtle is ESA- and/or CESA-listed at the time of project construction, western pond turtle protections will instead adhere to the protocol(s) adopted by the listing agency/agencies (CDFW and/or USFWS). • Prior to the start of construction activities, each applicant shall ensure that a qualified biologist approved by the City of Pittsburgh Community Development	

ENVIRONMENTAL IMPACT	LEVEL OF SIGNIFICANCE WITHOUT MITIGATION	MITIGATION MEASURE	RESULTING LEVEL OF SIGNIFICANCE
		Director conducts a pedestrian preconstruction survey of the study area and adjacent suitable habitat for western pond turtle. • The survey shall be conducted no more than 24 hours prior to start of work and shall include walking the work area limits and interior and investigating all areas that could be used by the species. • If western pond turtle individuals are found, the biologist shall relocate them to suitable habitat outside the disturbance area and far enough away that they would not be expected to return. • If the biologist determines that it is warranted, exclusion measures shall be implemented to prevent individuals returning to the active work site. The same requirements will apply for operations and maintenance activities with the potential to affect western pond turtle habitat. MM 3.3-8 If project-related disturbance (e.g., vegetation removal or trimming, clearing/grubbing, grading) commences any time during the nesting/breeding season of native bird species potentially nesting in or near the Plan Area (February 1 – August 31 for most species; January 1 through August 31 for Golden Eagle; March 15 – September 15 for Swainson’s Hawk), a preconstruction survey for nesting birds shall be conducted by a qualified biologist approved by the City of Pittsburg Community Development Director, using binoculars. The survey shall take place no more than two weeks prior to the initiation of work. If active nests are found in areas that could be directly affected or are within 300 feet of disturbance activities and would be subject to prolonged noise, a no-disturbance buffer zone shall be created around active nests for the remainder of the breeding season or until the biologist determines that all young have fledged or that the nest has been abandoned. No entry into the no-activity buffer shall be permitted. The no-activity buffer shall be delineated in the field by or under the supervision of the biologist, using temporary construction fencing or another suitable low-impact medium. The size of the buffer zone(s) shall be determined by the biologist based on the species involved, the amount of vegetative and other screening between the nest and areas where construction activity shall take place, and, if appropriate, other site-specific factors. The minimum buffer width shall be 50 feet for species other than raptors, and a minimum of 500 feet for raptor species other than Golden Eagle and Swainson’s Hawk, and may be enlarged by taking into account factors such as the following:	

ENVIRONMENTAL IMPACT	LEVEL OF SIGNIFICANCE WITHOUT MITIGATION	MITIGATION MEASURE	RESULTING LEVEL OF SIGNIFICANCE
		- Noise and human disturbance levels at the construction site at the time of the survey and the noise and disturbance expected during the construction activity. - Sensitivity of nesting species and behaviors of the individual nesting birds. If nesting Swainson's Hawk or Golden Eagle are observed, buffers and other avoidance measures shall conform to Species-Level Measures for these species as laid out in East Contra Costa HCP/NCCP Section 6.4.3. or current CDFW requirements, whichever is greater. MM 3.3-9 The following requirements apply to construction and to operations and maintenance that involves disturbance that could affect nesting activity, such as vegetation removal or trimming, clearing/grubbing, and grading. Bald Eagle nests may be built throughout the year. Consequently, each applicant shall retain a qualified biologist approved by the City of Pittsburg Community Development Director to conduct a preconstruction survey for nesting Bald Eagles prior to the initiation of work at the site (including vegetation removal or trimming, clearing/grubbing, grading, etc.). The survey shall be conducted using binoculars and shall take place no more than two weeks prior to the initiation of work. If an occupied or active nest is present, construction-related activity shall be prohibited within 0.5 mile of the nest unless site-specific conditions or the nature of the construction activity (e.g., dense vegetation, limited noise generation, limited activities) indicate that a smaller buffer could be appropriate or that a larger buffer should be implemented. The biologist shall coordinate with the East Contra Costa County Habitat Conservancy, CDFW, and USFWS to determine the appropriate buffer size. The nest buffer shall be delineated in the field using temporary construction fencing or another suitable low-impact medium. Buffer fencing shall be placed only on the Plan Area; the buffer shall not be put in place on neighboring properties not involved in project construction and staging. Construction shall be monitored by a qualified biologist to ensure that the buffer remains in place and that no construction activities occur within the buffer zone until the biologist has determined that the young have fledged or that the nest has been abandoned. MM 3.3-10 Prior to the initiation of any activity that could disturb roosting bats (including vegetation trimming/removal, surveys involving the use of lasers that produce high-frequency sounds, drilling, or other activity producing high-frequency sounds, a qualified biologist (as stipulated in Section 5 of H.T. Harvey & Associates 2019, and subject to approval by the City of Pittsburg Community Development Director) shall conduct a habitat	

ENVIRONMENTAL IMPACT	LEVEL OF SIGNIFICANCE WITHOUT MITIGATION	MITIGATION MEASURE	RESULTING LEVEL OF SIGNIFICANCE
		evaluation for special-status bats, focusing on the needs of pallid bat, western red bat, and hoary bat, the species identified by planning surveys as having potential to be present on the site. For purposes of this AMM, high frequency sound is defined as sound in the 20 kHz – 50 kHz frequency range, based on bat disturbance information in California Department of Transportation (Caltrans) bat mitigation guidelines (ibid). If Caltrans guidance is updated, or if frequency sensitivity information relevant to the bat species with potential to occur becomes available prior to project construction, this definition shall be updated accordingly. Surveys shall include the entirety of the study area plus a 400-foot-wide buffer. If no roosting habitat suitable for these species is present on the study area, no further action is required. If roosting habitat is present, the following additional requirements shall apply. Any potential roost trees/other potential roosting habitat shall also be considered potential bat maternity roosts. • Before any activities with the potential to disturb roosting bats begin, the approved biologist(s) shall conduct focused surveys for roost occupancy. These shall be conducted at least two weeks prior to the start of work and shall include: ○ Daytime visual surveys for bats and evidence of bat presence such as guano or urine staining ○ Evening emergence and acoustic surveys If bat presence is confirmed, the species, number of individuals, and roost type (maternity/non-maternity) shall be documented and reported to the CNDDDB. Bats shall not be disturbed or relocated during the surveys. • Confirmed non-maternity roosts shall be protected by buffers. Buffers shall be delineated in the field with temporary construction fencing or another suitable measure, installed under biologist oversight. Note that buffer distances vary depending on the species and the type of noise/disturbance involved. (If bat species other than those addressed here are encountered, buffer distances shall be consistent with H.T. Harvey & Associates 2019). The biologist shall coordinate with construction staff to determine the appropriate buffer width; if there is uncertainty, the more conservative buffer width shall prevail. If a confirmed roost must be removed or trimmed for construction, or if work must occur within the buffers laid out above, work shall be restricted to daylight hours when the CDFW approved biologist has confirmed that it the roost is not occupied, and shall be overseen by the biologist to prevent injury or mortality.	

ENVIRONMENTAL IMPACT	LEVEL OF SIGNIFICANCE WITHOUT MITIGATION	MITIGATION MEASURE	RESULTING LEVEL OF SIGNIFICANCE
		The biologist shall have authority to divert or stop work in the event of excessive risk to bats. Confirmed maternity roosts shall be protected by the same buffers identified above. Maternity roosts shall not be removed unless removal cannot be avoided, and in no case shall a confirmed maternity roost be removed during the breeding/non-volant season (April – August). If removal of a maternity roost is necessary, each applicant shall consult with CDFW to determine appropriate compensatory mitigation such as the provision of bat boxes and shall submit a Bat Habitat Mitigation Plan for DFW approval. Consultation and submittal of the Mitigation Plan shall occur prior to the removal, and the removal shall not take place until CDFW has approved the Plan. Each applicant shall then be responsible for implementing CDFW-approved mitigation for removal of bat maternity roost habitat. MM 3.3-11 Vegetation removal, clearing/grubbing, and grading activities shall be conducted in a uniform direction to allow mobile animals such as San Joaquin pocket mouse the ability to escape the disturbance area into adjacent undisturbed habitat. Project construction shall also avoid the creation of fragmented islands of habitat where individuals may become trapped, isolated from resources, and at risk from eventual clearing/grading operations. MM 3.3-12 Each applicant shall ensure that a qualified biologist approved by the City of Pittsburg Community Development Director conduct a preconstruction survey for American badger den sites. The survey shall be conducted no more than four weeks before the commencement of ground disturbance. If an occupied den is found, and young are not present, then any badgers present shall be removed from the den either by the use of appropriate exclusionary devices or by trapping and relocation. The removal method shall be approved by CDFW prior to implementation; if trapping and relocation are used, it shall be carried out by biologist(s) with all required permits for badger handling. Any trapped badgers shall be relocated to other suitable habitat at least 500 feet outside the study area boundary. Once any badgers are excluded or trapped and relocated, den(s) shall be excavated by hand and backfilled to prevent reoccupation. Exclusion shall continue until the badgers are successfully removed from the site, as determined by the biologist. Badgers shall not be excluded or relocated if it is determined by the biologist that young are or may be present. Any occupied dens shall be protected with a 50-foot-wide no-activity buffer. The buffer shall be delineated in the field by a qualified biologist, using temporary	

<i>ENVIRONMENTAL IMPACT</i>	<i>LEVEL OF SIGNIFICANCE WITHOUT MITIGATION</i>	<i>MITIGATION MEASURE</i>	<i>RESULTING LEVEL OF SIGNIFICANCE</i>
		construction fencing or another appropriate low-impact medium, and shall remain in place until the biologist has determined that the young are no longer dependent on their mother and the den site. No entry into the buffer area shall be permitted.	
Impact 3.3-2: Have a substantial adverse effect on any riparian habitat or other sensitive natural community identified in local or regional plans, policies, regulations or by the California Department of Fish and Wildlife or U.S. Fish and Wildlife Service	PS	Implement MM 3.3-1 through MM 3.3-3 , as described above.	LS
Impact 3.3-3: Have a substantial adverse effect on state or federally protected wetlands (including, but not limited to, marsh, vernal pool, coastal, etc.) through direct removal, filling, hydrological interruption, or other means	PS	Implement MM 3.3-1 through MM 3.3-3 , as described above.	LS
Impact 3.3-4: Interfere substantially with the movement of any native resident or migratory fish or wildlife species or with established native resident or migratory wildlife corridors, or impede the use of native wildlife nursery sites	PS	Implement MM 3.3-1 through MM 3.3-12 , as described above.	LS
Impact 3.3-5: Conflict with any local policies or ordinances protecting biological resources, such as a tree preservation policy or ordinance	NI	<i>None Required</i>	NI
Impact 3.3-6: Conflict with the provisions of an adopted Habitat Conservation Plan, Natural Community Conservation Plan, or other approved local, regional, or State habitat conservation plan	NI	Implement MM 3.3-1 through MM 3.3-3 , as described above.	NI

<i>ENVIRONMENTAL IMPACT</i>	<i>LEVEL OF SIGNIFICANCE WITHOUT MITIGATION</i>	<i>MITIGATION MEASURE</i>	<i>RESULTING LEVEL OF SIGNIFICANCE</i>
CULTURAL AND TRIBAL RESOURCES			
Impact 3.4-1: Cause a substantial adverse change in the significance of a historical resource pursuant to Section 15064.5	LS	<i>None Required</i>	LS
Impact 3.4-2: Cause a substantial adverse change in the significance of an archaeological resource pursuant to Section 15064.5	PS	MM 3.4-1 Prior to construction, all workers regardless of location, shall receive cultural resource awareness training. The training program should be developed by a Qualified Professional Archaeologist that meets the Secretary of the Interior's Professional Qualifications Standards for archaeology and shall include relevant information regarding sensitive cultural resources and tribal cultural resources, including applicable regulations, protocols for avoidance, and consequences of violating state laws and regulations. It should also describe appropriate avoidance and impact minimization measures for cultural resources and tribal cultural resources that may be located within the Plan Area and provide guidance on procedures to follow if any cultural resources or TCRs are encountered. MM 3.4-2 All ground-disturbing activities proposed within the Plan Area shall be monitored by a Qualified Professional Archaeologist who meets or works under the direct supervision of someone who meets the Secretary of the Interior's Professional Qualifications Standards for prehistoric and historic archaeology. All ground-disturbing activities proposed within the Plan Area shall also be monitored by Qualified Native American Monitor. In the event that cultural resources are observed, all work must stop within the immediate vicinity of the find, and the Qualified Professional Archaeologist shall prepare and implement a resource mitigation plan and monitoring program. MM 3.4-3 If an inadvertent discovery of tribal cultural resources, archaeological artifacts, other cultural resources, or human remains are discovered during construction within the Plan Area, all work must halt within a 100-foot radius of the discovery. The Qualified Professional Archaeologist, meeting the Secretary of the Interior's Professional Qualification Standards for prehistoric and historic archaeology, shall be retained to evaluate the significance of the find, and shall have the authority to modify the no-work radius as appropriate, using professional judgment. The following notifications and procedures shall apply: • If the professional archaeologist determines that the find does not represent a cultural resource, work may resume immediately, and no agency notifications are required.	LS

ENVIRONMENTAL IMPACT	LEVEL OF SIGNIFICANCE WITHOUT MITIGATION	MITIGATION MEASURE	RESULTING LEVEL OF SIGNIFICANCE
		• If the Qualified Professional Archaeologist determines that the find does represent a cultural resource from any time period or cultural affiliation, the Qualified Professional Archaeologist shall immediately evaluate the find pursuant to Public Resources Code Section 21083.2. If necessary, the evaluation may require preparation of a treatment plan and archaeological testing for determining California Register of Historical Resources eligibility. If the discovery proves to be significant under CEQA and cannot be avoided by the project, additional work may be warranted, such as data recovery excavation, to mitigate any significant impacts to significant resources. Work may not resume within the no-work radius until the lead agencies, through consultation as appropriate, determine that the site either: 1) is not a Historical Resource under CEQA or a Historic Property under Section 106; or 2) that the treatment measures have been completed to their satisfaction. Any reports required to document and/or evaluate unanticipated discoveries shall be submitted to the City of Pittsburg for review and approval and submitted to the Northwest Information Center in Sonoma State after completion. Recommendations contained within prepared reports shall be implemented throughout the remainder of ground disturbance activities. • If the find represents a Native American or potentially Native American resource that does not include human remains, then the Qualified Professional Archaeologist shall notify the City of Pittsburg, a Native American Representative from the Wilton Rancheria tribe, and the NAHC shall be contacted to ensure that the Most Likely Descendant (MLD) can assess the find. The City of Pittsburg shall consult with the tribes on a finding of eligibility and implement appropriate treatment measures, if the find is determined to be a Historical Resource under CEQA, as defined in Section 15064.5(a) of the CEQA Guidelines. If the deposit is eligible, the project shall attempt to feasibly avoid damage to the deposit (e.g., redesign or capping). If avoidance is not feasible, the archaeologist shall, in consultation with the MLD and City, develop and implement a plan to recover the scientifically consequential data represented by the deposit in a manner respectful of tribal concerns. Work may not resume within the no-work radius until the lead agencies, through consultation as appropriate, determine that the site either: 1) is not a Historical Resource under CEQA, as defined in Section 15064.5(a) of the CEQA Guidelines; or 2) that the treatment measures have been completed to the agencies satisfaction. A report of the finds or any resource evaluation and/or data recovery efforts shall be submitted to City of Pittsburg for	

<i>ENVIRONMENTAL IMPACT</i>	<i>LEVEL OF SIGNIFICANCE WITHOUT MITIGATION</i>	<i>MITIGATION MEASURE</i>	<i>RESULTING LEVEL OF SIGNIFICANCE</i>
		review and approval and submitted to the Northwest Information Center in Sonoma State as a condition for access to its archives. If the find includes human remains, or remains that are potentially human, the Qualified Professional Archaeologist shall ensure reasonable protection measures are taken to protect the discovery from disturbance (AB 2641). The Qualified Professional Archaeologist shall notify the City of Pittsburg Development Services Director, a Native American Representative from the Wilton Rancheria tribe, and the Contra Costa County Coroner (per § 7050.5 of the Health and Safety Code). The provisions of § 7050.5 of the California Health and Safety Code, § 5097.98 of the California PRC, and AB 2641 will be implemented. If the coroner determines the remains are Native American origin and not the result of a crime scene, the coroner will notify the Native American Heritage Commission (NAHC), which then will designate a Native American Most Likely Descendant (MLD) for the Project (§ 5097.98 of the PRC). The designated MLD will have 48 hours from the time access to the property is granted to make recommendations concerning treatment of the remains. If the landowner does not agree with the recommendations of the MLD, the NAHC can mediate (§ 5097.94 of the PRC). If no agreement is reached, the landowner must rebury the remains where they will not be further disturbed (§ 5097.98 of the PRC). This will also include either recording the site with the NAHC or the appropriate Information Center; using an open space or conservation zoning designation or easement; or recording a reinternment document with the county in which the property is located (AB 2641). Work may not resume within the no-work radius until the agencies, through consultation as appropriate, determine that the treatment measures have been completed and are approved by the Development Services Director.	
Impact 3.4-3: Lead to the disturbance of any human remains	PS	Implement MM 3.4-3 , as described above.	LS
Impact 3.4-4: Cause a substantial adverse change in the significance of a tribal cultural resource, defined in Public Resources Code Section 21074, and that is: Listed or eligible for listing in the California Register of Historical Resources, or in a local register of historical resources as defined in	PS	Implement MM 3.4-1 through 3.4-3 , as described above.	LS

<i>ENVIRONMENTAL IMPACT</i>	<i>LEVEL OF SIGNIFICANCE WITHOUT MITIGATION</i>	<i>MITIGATION MEASURE</i>	<i>RESULTING LEVEL OF SIGNIFICANCE</i>
Public Resources Code Section 5020.1(k), or a resource determined by the lead agency			
GEOLOGY AND SOILS			
Impact 3.5-1: Directly or indirectly have the potential to expose people or structures to substantial adverse effects, including the risk of loss, injury, or death involving rupture of a known earthquake fault, strong seismic ground shaking, seismic-related ground failure, including liquefaction, or landslides	LS	<i>None Required</i>	LS
Impact 3.5-2: Result in substantial soil erosion or the loss of topsoil	LS	<i>None Required</i>	LS
Impact 3.5-3: Result in development located on a geologic unit or soil that is unstable, or that would become unstable as a result of the project, and potentially result in on- or off-site landslide, lateral spreading, subsidence, liquefaction or collapse	LS	<i>None Required</i>	LS
Impact 3.5-4: Result in development located on expansive soil, as defined in Table 18-1-B of the Uniform Building Code (1994), creating substantial direct or indirect risks to life or property	LS	<i>None Required</i>	LS
Impact 3.5-5: Result in having soils incapable of adequately supporting the use of septic tanks or alternative waste water disposal systems where sewers are not available for the disposal of waste water	LS	<i>None Required</i>	LS

<i>ENVIRONMENTAL IMPACT</i>	<i>LEVEL OF SIGNIFICANCE WITHOUT MITIGATION</i>	<i>MITIGATION MEASURE</i>	<i>RESULTING LEVEL OF SIGNIFICANCE</i>
Impact 3.5-6: Directly or indirectly destroy a unique paleontological resource or site or unique geologic feature	PS	MM 3.5-1 At the time of application for site specific development within the Plan Area, the Applicant shall retain a Project Paleontologist to develop a Paleontological Resources Mitigation and Monitoring Plan. The Plan shall outline preconstruction coordination, monitoring procedures, emergency discovery procedures, sampling and data recovery, museum storage coordination with an accredited institution or facility for any specimen and data recovered, and final reporting. MM 3.5-2 Prior to the start of construction, the Project Paleontologist or a qualified paleontological monitor shall provide all construction personnel involved with earthmoving activities an environmental awareness training that will provide information on the possibility of encountering fossils during construction, how to identify fossils, and the protocols to follow in the case of any fossil discoveries including proper notification procedures. MM 3.5-3 Prior to construction, the Project Paleontologist shall review excavation plans to determine where paleontologically sensitive stratigraphic units will be disturbed by Project-related earth movement. Earthmoving construction activities will be monitored by a qualified paleontological monitor in those areas and/or where disturbance will take place to previously undisturbed sediment. Monitoring will not take place in areas where the ground has been previously disturbed, in areas underlain by artificial fill, or in areas where exposed sediment will be buried but not disturbed. Monitoring procedures will include measures to suspend monitoring should construction activities be restricted to previously disturbed fill and to adjust monitoring protocols based on updated evaluations of sensitivity subsequent to initial excavations.	LS
GREENHOUSE GAS EMISSIONS, CLIMATE CHANGE, AND ENERGY			
Impact 3.6-1: Project implementation could generate greenhouse gas emissions that could have a significant impact on the environment and could conflict with an applicable plan, policy, or regulation adopted for the purpose of reducing the emissions of greenhouse gases	LS	<i>None Required</i>	LS

<i>ENVIRONMENTAL IMPACT</i>	<i>LEVEL OF SIGNIFICANCE WITHOUT MITIGATION</i>	<i>MITIGATION MEASURE</i>	<i>RESULTING LEVEL OF SIGNIFICANCE</i>
Impact 3.6-2: General Plan implementation has the potential to result in a significant impact due to wasteful, inefficient, or unnecessary consumption of energy resources, or conflict with or obstruct a state or local plan for renewable energy or energy efficiency	LS	<i>None Required</i>	LS
HAZARDS AND HAZARDOUS MATERIALS			
Impact 3.7-1: Create a significant hazard to the public or the environment through the routine transport, use, or disposal of hazardous materials	LS	<i>None Required</i>	LS
Impact 3.7-2: Create a significant hazard to the public or the environment through reasonably foreseeable upset and accident conditions involving the release of hazardous materials into the environment	LS	<i>None Required</i>	LS
Impact 3.7-3: Emit hazardous emissions or handle hazardous or acutely hazardous materials, substances, or waste within one-quarter mile of an existing or proposed school	LS	<i>None Required</i>	LS
Impact 3.7-4: Be located on a site which is included on a list of hazardous materials sites compiled pursuant to Government Code Section 65962.5 and, as a result, would it create a significant hazard to the public or the environment	NI	<i>None Required</i>	NI
Impact 3.7-5: For a project located within an airport land use plan or, where such a plan has not been adopted, within two miles of a public airport or public use airport, would the project	NI	<i>None Required</i>	NI

<i>ENVIRONMENTAL IMPACT</i>	<i>LEVEL OF SIGNIFICANCE WITHOUT MITIGATION</i>	<i>MITIGATION MEASURE</i>	<i>RESULTING LEVEL OF SIGNIFICANCE</i>
result in a safety hazard for people residing or working in the Plan Area			
Impact 3.7-6: Impair implementation of or physically interfere with an adopted emergency response plan or emergency evacuation plan	LS	<i>None Required</i>	LS
Impact 3.7-7: Expose people or structures to a significant risk of loss, injury or death involving wildland fires	LS	<i>None Required</i>	LS
HYDROLOGY AND WATER QUALITY			
Impact 3.8-1: Violate water quality standards or waste discharge requirements or otherwise substantially degrade water quality or obstruct implementation of a water quality control plan	LS	<i>None Required</i>	LS
Impact 3.8-2: Substantially decrease groundwater supplies or interfere substantially with groundwater recharge such that the project may impede sustainable groundwater management of the basin	LS	<i>None Required</i>	LS
Impact 3.8-3: Substantially alter the existing drainage pattern of the site or area, including through the alteration of the course of a stream or river, or through the addition of impervious surfaces, in a manner which would: (i) result in a substantial erosion or siltation on or offsite; (ii) substantially increase the rate of amount of surface runoff in a manner	LS	<i>None Required</i>	LS

<i>ENVIRONMENTAL IMPACT</i>	<i>LEVEL OF SIGNIFICANCE WITHOUT MITIGATION</i>	<i>MITIGATION MEASURE</i>	<i>RESULTING LEVEL OF SIGNIFICANCE</i>
which would result in flooding on-or offsite; (iii) create or contribute runoff water which would exceed the capacity of existing or planned stormwater drainage systems or provide substantial additional sources of polluted runoff; or (iv) impede or redirect flood flows.			
Impact 3.8-4: Result in a flood hazard, tsunami, seiche zones, risk release of pollutants due to project inundation	LS	<i>None Required</i>	LS
Impact 3.8-5: Conflict with or obstruct implementation of a water quality control plan or sustainable groundwater management plan	LS	<i>None Required</i>	LS
LAND USE AND PLANNING			
Impact 3.9-1: Physically divide an established community	LS	<i>None Required</i>	LS
Impact 3.10-2: Cause a significant environmental impact due to a conflict with any land use plan, policy, or regulation adopted for the purpose of avoiding or mitigating an environmental effect	LS	<i>None Required</i>	LS
NOISE			
Impact 3.10-1: Generate a substantial temporary or permanent increase in ambient noise levels in excess of local general plan standards or noise ordinance	PS	MM 3.10-1 If at the time of development review, an Applicant cannot provide evidence of project level conformance with Table 3-1, the Applicant shall submit a detailed construction mitigation plan accompanied by a construction noise analysis that incorporates specific mitigation techniques for site-specific noise reduction and attenuation. Examples include limiting hours of construction, locating stationary noise sources (e.g., generators,	LS

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		compressors) away from sensitive receptors, using shrouds or temporary barriers for louder equipment (e.g., pile drivers), and using newer machinery. MM 3.10-2 If at the time of development review, an Applicant cannot provide evidence of project level conformance with Table 3.10-8, the Applicant shall submit a detailed operational mitigation plan accompanied by an operational noise analysis that incorporates specific mitigation techniques for site-specific noise reduction and attenuation. Examples of operational noise mitigation include changes to a site layout to place noise sources further from sensitive receptors, using manufacturer-supplied or third-party noise mitigation (e.g., low-sound fan options, silencers, acoustical louvers), and installing sound barriers. MM 3.10-3 If future development anticipates greater use of truck trips beyond what was analyzed in this PEIR (15 trips per day), then the Applicant shall prepare a subsequent noise analysis to provide evidence that they conform to the noise level thresholds identified in Table 3.10-8. If the Applicant cannot demonstrate conformance with Table 3.10-8, then the Applicant shall submit a detailed operational mitigation plan accompanied by an operational noise analysis that incorporates specific mitigation techniques for site-specific noise reduction and attenuation.	
Impact 3.10-2: Generate excessive groundborne vibration or groundborne noise levels	LS	<i>None Required</i>	LS
Impact 3.10-3: For a project located within the vicinity of a private airstrip or an airport land use plan or, where such a plan has not been adopted, within two miles of a public airport or public use airport, expose people residing or working in the project area to excessive noise levels	NI	<i>None Required</i>	NI

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POPULATION AND HOUSING			
Impact 3.11-1: Induce substantial unplanned population growth in an area, either directly (for example, by proposing new homes and businesses) or indirectly (for example, through extension of roads or other infrastructure)	LS	<i>None Required</i>	LS
Impact 3.11-2: Displace substantial numbers of existing people or housing, necessitating the construction of replacement housing elsewhere	LS	<i>None Required</i>	LS
PUBLIC SERVICES AND RECREATION			
Impact 3.12-1: Result in adverse physical impacts on the environment associated with the need for new fire protection facilities or the need for new or physically altered fire protection facilities, the construction of which could cause significant environmental impacts and the provision of public services	LS	<i>None Required</i>	LS
Impact 3.12-2: Result in adverse physical impacts on the environment associated with the need for new police protection facilities or the need for new or physically altered police protection facilities, the construction of which could cause significant environmental impacts and the provision of public services	LS	<i>None Required</i>	LS
Impact 3.12-3: Result in adverse physical impacts on the environment associated with the need for new school facilities or the need for new or physically altered school facilities, the construction of which could cause significant	LS	<i>None Required</i>	LS

<i>ENVIRONMENTAL IMPACT</i>	<i>LEVEL OF SIGNIFICANCE WITHOUT MITIGATION</i>	<i>MITIGATION MEASURE</i>	<i>RESULTING LEVEL OF SIGNIFICANCE</i>
environmental impacts and the provision of public services			
Impact 3.12-4: Result in adverse physical impacts on the environment associated with the need for new park facilities or the need for new or physically altered park facilities, the construction of which could cause significant environmental impacts and the provision of public services	LS	<i>None Required</i>	LS
Impact 3.12-5: Increase the use of existing parks and recreation facilities such that substantial physical deterioration of the facility would occur or require the construction or expansion of recreational facilities which might have an adverse physical effect on the environment	LS	<i>None Required</i>	LS
TRANSPORTATION AND CIRCULATION			
Impact 3.13-1: Specific Plan implementation would result in VMT per employee that is greater than 85 percent of Baseline conditions	PS	MM 3.13-1 Travel Demand Management Plan(s) shall be prepared and implemented for future phases of Specific Plan implementation. The TDM Plan comply with the City's TIA Guidelines in effect at the time of application and should identify trip reduction strategies as well as mechanisms for funding and overseeing the delivery of trip reduction programs and strategies. Trip reduction strategies applicable to the proposed project may include, but are not limited to, the following: a. Implement Alternative Work Schedules b. Provide New Hire Packets on Transportation Options c. Implement Subsidized or Discounted Transit Program d. Provide Carpooling Programs e. Implement Car-Sharing Program f. Provide a Transit Riders Guide g. Provide an Online TDM Information Center h. Implement Commute Trip Reduction Marketing i. Increase Bicycle and Pedestrian Facilities/Amenities j. Free Trial Rides on Transit Services	LS

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Impact 3.13-2: Specific Plan implementation would conflict with a program, plan, policy, or ordinance addressing the circulation system, including transit, bicycle, and pedestrian facilities	PS	MM 3.13-2 As future specific land-uses are proposed for development on the site, a level of service analysis shall be performed in accordance with the City of Pittsburgh's TIA Guidelines in effect at the time of application. If violations of the City's General Plan LOS policies are identified, improvement measures shall be developed and proposed to eliminate those violations. MM 3.13-3 As future specific land-uses are developed on the site, appropriate local and regional traffic impact fees shall be calculated and paid in accordance with the anticipated level of traffic generation. The two currently applicable traffic impact fees are the Pittsburgh Transportation Impact Mitigation Fee (TIMF) and the Pittsburgh Regional Transportation Development Impact Fee (PRTDIM), as described in Chapters 15.90 and 15.103 PMC, respectively.	LS
Impact 3.13-3: Specific Plan implementation would increase hazards due to a design feature, incompatible uses, or inadequate emergency access	LS	<i>None Required</i>	LS
UTILITIES AND SERVICE SYSTEMS			
Impact 3.14-1: Require or result in the relocation or construction of new or expanded water, wastewater treatment or storm water drainage, electric power, natural gas or telecommunication facilities, the construction or relocation of which could cause significant environmental effects?	LS	<i>None Required</i>	LS
Impact 3.14-2: Would the project have sufficient water supplies available to serve the project and reasonably foreseeable future development during normal, dry and multiple dry years?	LS	<i>None Required</i>	LS
Impact 3.14-3: Would the project result in a determination by the wastewater treatment provider which serves or may serve the project that it has adequate capacity to serve the	LS	<i>None Required</i>	LS

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project's projected demand in addition to the provider's existing commitments?			
Impact 3.14-4: Would the project generate solid waste in excess of State or local standards, or in excess of local infrastructure, or otherwise impair the attainment of solid waste reduction goals?	LS	<i>None Required</i>	LS
Impact 3.14-5: Would the project comply with federal, state, and local management and reduction statutes and regulations related to solid waste?	LS	<i>None Required</i>	LS
WILDFIRES			
Impact 3.15-1: Substantially impair an adopted emergency response plan or emergency evacuation plan	LS	<i>None Required</i>	LS
Impact 3.15-2: Due to slope, prevailing winds, and other factors, exacerbate wildfire risks, and thereby expose project occupants to pollutant concentrations from a wildfire or the uncontrolled spread of a wildfire	LS	<i>None Required</i>	LS
Impact 3.15-3: Require the installation or maintenance of associated infrastructure (such as roads, fuel breaks, emergency water sources, power lines or other utilities) that may exacerbate fire risk or that may result in temporary or ongoing impacts to the environment	LS	<i>None Required</i>	LS

<i>ENVIRONMENTAL IMPACT</i>	<i>LEVEL OF SIGNIFICANCE WITHOUT MITIGATION</i>	<i>MITIGATION MEASURE</i>	<i>RESULTING LEVEL OF SIGNIFICANCE</i>
Impact 3.15-4: Expose people or structures to significant risks, including downslope or downstream flooding or landslides, as a result of runoff, post-fire slope instability, or drainage changes	PS	MM 3.15-1 Prior to approval of building permit, the applicant shall demonstrate that debris flow potential has been studied for post-fire conditions. Alternatives for mitigating potential debris flow impacts shall be considered and refined as each phase of future development is designed. Preliminary mitigation measures may include restricting the use of portions of the site until the potential for debris flow is quantified, using best modeling methods. If it is determined that there is high potential for debris flow impacts, additional infrastructure or interventions may be required, including constructing debris collection basins, routine removal of debris-generating materials, and sizing up stormwater runoff conveyance facilities for bulked debris flows.	LS
OTHER CEQA-REQUIRED TOPICS			
Impact 4.1: Cumulative degradation of the existing visual character of the region	LCC	<i>Minimized to the greatest extent feasible.</i>	LCC
Impact 4.2: Cumulative impact on the region's air quality	CC	<i>Minimized to the greatest extent feasible.</i>	LCC
Impact 4.3: Cumulative loss of biological resources, including habitats and special status species	LCC	<i>Minimized to the greatest extent feasible.</i>	LCC
Impact 4.4: Cumulative impacts on known and undiscovered cultural resources	LCC	<i>Minimized to the greatest extent feasible.</i>	LCC
Impact 4.5: Cumulative impacts related to geology and soils	LCC	<i>Minimized to the greatest extent feasible.</i>	LCC
Impact 4.6: Cumulative impacts related to greenhouse gases, climate change, and energy	LCC	<i>Minimized to the greatest extent feasible.</i>	LCC
Impact 4.7: Cumulative impacts related to hazardous materials and human health risks	LCC	<i>None Required</i>	LCC

<i>ENVIRONMENTAL IMPACT</i>	<i>LEVEL OF SIGNIFICANCE WITHOUT MITIGATION</i>	<i>MITIGATION MEASURE</i>	<i>RESULTING LEVEL OF SIGNIFICANCE</i>
Impact 4.8: Cumulative impacts related to hydrology and water quality	CC	<i>Minimized to the greatest extent feasible.</i>	LCC
Impact 4.9: Cumulative impacts related to local land use	LCC	<i>None Required</i>	LCC
Impact 4.10: Cumulative impacts related to noise	LCC	<i>Minimized to the greatest extent feasible.</i>	LCC
Impact 4.11: Cumulative impacts to population and housing	LCC	<i>None Required</i>	LCC
Impact 4.12: Cumulative impacts to public services and recreation	LCC	<i>None Required</i>	LCC
Impact 4.13: Cumulative impacts on the transportation network	CC	<i>Minimized to the greatest extent feasible</i>	LCC
Impact 4.14: Cumulative impacts related to utilities	LCC	<i>None Required</i>	LCC
Impact 4.15: Cumulative impact related to wildfire	CC	<i>Minimized to the greatest extent feasible</i>	LCC
Impact 4.16: Irreversible Effects	LCC	<i>None Required</i>	LCC

NOTES:*CC – cumulatively considerable**NI – no impact**LCC – less than cumulatively considerable**PS – potentially significant**LS – less than significant**SU – significant and unavoidable*

1.1 INTRODUCTION

In May 2024, the City of Pittsburg (City) completed a multi-year process and updated the City's General Plan as the blueprint for the future physical development of the city. To guide development at a more granular level than provided in the 2040 General Plan, the Pittsburg Technology Park Specific Plan (proposed Specific Plan or proposed project) provides policy, permitted uses, and implementation framework for the development of a technology park to generate employment opportunities within the City. The Specific Plan acts as an intermediate level of guidance between the 2040 General Plan and individual development proposals within the area (Plan Area).

The proposed Specific Plan incorporates a vision and goals for the Plan Area and sets development standards, zoning, and design guidelines for land use, site and building, public right-of-way, circulation, and mobility for the development of a dynamic employment center. All specific plans must comply with California Government Code Sections 65450-65457. These provisions require that a specific plan be consistent with the adopted general plan of the jurisdiction within which it is located. The 2040 General Plan designates the Plan Area as Employment Center Industrial (ECI) land use designation, and the proposed Specific Plan would further provide zoning for the Plan Area adopted by ordinance.

SPECIFIC PLAN PROGRAM ENVIRONMENTAL IMPACT REPORT

The City of Pittsburg, as lead agency, determined that the Specific Plan is a "project" within the meaning of CEQA. CEQA requires the preparation of an EIR prior to approving any project that may have a significant impact on the environment. For the purposes of CEQA, the term "project" refers to the whole of an action, which has the potential for resulting in a direct physical change or a reasonably foreseeable indirect physical change in the environment (CEQA Guidelines Section 15378[a]).

A Program Environmental Impact Report(EIR) responds to the requirements of the California Environmental Quality Act (CEQA) as set forth in Sections 15126, 15175, and 15176 of the CEQA Guidelines. The Planning Commission and City Council will use the EIR in order to understand the potential environmental implications associated with implementing the proposed Specific Plan. This PEIR has been prepared to address potential environmental effects associated with implementation of the proposed Specific Plan. The proposed project would increase economic opportunities in the City by establishing a variety of industrial and business park uses within the Plan Area.

The proposed project would require discretionary actions including: the adoption of the Pittsburg Technology Specific Park Plan; adoption of the tentative map; along with certification of this EIR, including adoption of Findings, a Statement of Overriding Considerations (if applicable) and adoption of the Mitigation Monitoring Reporting Program. A detailed description of the proposed project is provided in the Project Description in Chapter 3.0 of this EIR.

This Draft PEIR has been prepared according to CEQA requirements to evaluate the potential environmental impacts associated with the implementation of the proposed Specific Plan. A copy of

the Public Draft Specific Plan is located on the City of Pittsburg website at <https://www.pittsburgca.gov/services/community-development/planning/advanced-planning-special-projects/pittsburg-technology-park-specific-plan-project>. The Draft PEIR also discusses alternatives to the proposed Specific Plan and methods to offset, minimize, or otherwise avoid potentially significant environmental impacts. This Draft PEIR has been prepared in accordance with CEQA, California Resources Code Section 21000 et seq.; and the Guidelines for the California Environmental Quality Act (California Code of Regulations, Title 14, Chapter 3).

A PEIR must disclose the expected direct and indirect environmental impacts associated with a project, including impacts that cannot be avoided, growth-inducing effects, impacts found not to be significant, and significant cumulative impacts, as well as identify mitigation measures and alternatives to the proposed project that could reduce or avoid its adverse environmental impacts. CEQA requires government agencies to consider and, where feasible, minimize significant environmental impacts of proposed development.

1.2 TYPE OF EIR

The CEQA Guidelines identify several types of EIRs, each applicable to different project circumstances. This EIR has been prepared as a Program EIR pursuant to CEQA Guidelines Section 15168. Section 15168 states:

“A program EIR is an EIR which may be prepared on a series of actions that can be characterized as one large project and are related either:

- 1) Geographically;
- 2) As logical parts in the chain of contemplated actions;
- 3) In connection with issuance of rules, regulations, plans or other general criteria to govern the conduct of a continuing program; or
- 4) As individual activities carried out under the same authorizing statutory or regulatory authority and having generally similar environmental effects which can be mitigated in similar ways.”

The program-level analysis considers the broad environmental effects of the proposed project. Additional environmental review under CEQA may be required for subsequent projects and would be generally based on the subsequent project’s consistency with the Specific Plan and the analysis in this PEIR, as required under CEQA. It may be determined that some future projects or infrastructure improvements may be exempt from environmental review. When individual subsequent projects or activities under the Specific Plan are proposed, the lead agency that would approve and/or implement the individual project will examine the projects or activities to determine whether their effects were adequately analyzed in this PEIR (CEQA Guidelines Section 15168). If the projects or activities would have no effects beyond those disclosed in this PEIR, no further CEQA compliance would be required.

1.3 PURPOSE OF THE PEIR

In accordance with the California Environmental Quality Act (CEQA) Guidelines section 15121, the purpose of this PEIR is to provide public agency decision-makers and members of the public with detailed information about the potential significant environmental effects of the proposed project, possible ways to reduce its significant effects, and reasonable alternatives that would reduce or avoid identified significant effects.

1.4 INTENDED USES OF THE PEIR

The City of Pittsburg, as the lead agency, has prepared this PEIR to provide the public and responsible and trustee agencies with an objective analysis of the potential environmental impacts resulting from adoption of the City of Pittsburg Technology Park Specific Plan and subsequent implementation of projects consistent with the proposed Specific Plan. The environmental review process enables interested parties to evaluate the proposed project in terms of its environmental consequences, to examine and recommend methods to eliminate or reduce potential adverse impacts, and to consider a reasonable range of alternatives to the project. While CEQA requires that consideration be given to avoiding adverse environmental effects, the lead agency must balance adverse environmental effects against other public objectives, including the economic and social benefits of a project, in determining whether a project should be approved.

This PEIR will be used as the primary environmental document to evaluate all subsequent planning and permitting actions associated with the proposed Specific Plan. Subsequent actions that may be associated with the proposed Specific Plan are identified in Chapter 2.0, Project Description.

1.5 KNOWN RESPONSIBLE AND TRUSTEE AGENCIES

The term “Responsible Agency” includes all public agencies other than the Lead Agency that have discretionary approval power over the project or an aspect of the project (CEQA Guidelines Section 15381). For the purpose of CEQA, a “Trustee” agency has jurisdiction by law over natural resources that are held in trust for the people of the State of California (CEQA Guidelines Section 15386). While no Responsible Agencies or Trustee Agencies are responsible for approvals associated with adoption of the proposed Specific Plan, implementation of future projects within the Plan Area may require permits and approvals from such agencies, which may include the following:

- California Department of Fish and Wildlife (CDFW);
- Bay Area Air Quality Management District (BAAQMD);
- East Contra Costa County Habitat Conservancy (ECCC HCP/NCCP);
- Regional Water Quality Control Board (RWQCB);
- U.S. Army Corps of Engineers (USACE);
- U.S. Fish and Wildlife Service (USFWS); and
- California Office of Historic Preservation (OHP).

1.6 ENVIRONMENTAL REVIEW PROCESS

The review and certification process for the PEIR has involved, or will involve, the following general procedural steps:

NOTICE OF PREPARATION

The City of Pittsburg circulated a Notice of Preparation (NOP) of a PEIR for the proposed project on February 28, 2024, to trustee and responsible agencies, the State Clearinghouse, and the public. A scoping meeting was held on March 14, 2024, via a web-based video meeting and in-person on March 14, 2024 at 6:00 P.M. During the 30-day public review period for the NOP, which ended on March 29, 2024, 14 written comment letters were received on the NOP. A summary of the NOP comments is provided later in this chapter. The NOP and all comments received on the NOP are presented in Appendix A.

DRAFT PEIR

This document constitutes the Draft PEIR. The Draft PEIR contains a description of the project, description of the environmental setting, identification of the project's direct and indirect impacts on the environment and mitigation measures for impacts found to be significant, as well as an analysis of project alternatives, identification of significant irreversible environmental changes, growth-inducing impacts, and cumulative impacts. This Draft PEIR identifies issues determined to have no impact or a less than significant impact and provides detailed analysis of potentially significant and significant impacts. Comments received in response to the NOP were considered in preparing the analysis in this EIR. Upon completion of the Draft EIR, the City of Pittsburg will file the Notice of Completion (NOC) with the State Clearinghouse of the Governor's Office of Planning and Research to begin the public review period.

PUBLIC NOTICE/PUBLIC REVIEW

Concurrent with the NOC, the City of Pittsburg will provide a public notice of availability for the Draft PEIR, and invite comment from the general public, agencies, organizations, and other interested parties. Consistent with CEQA requirements, the review period for this Draft EIR is forty-five (45) days. Public comment on the Draft EIR will be accepted in written form. All comments or questions regarding the Draft PEIR should be addressed to:

Alison Spells, Associate Planner
City of Pittsburg Planning Division
65 Civic Avenue
Pittsburg, CA 94565

RESPONSE TO COMMENTS/FINAL EIR

Following the public review period, a Final PEIR will be prepared. The Final PEIR will respond to comments received during the public review period.

CERTIFICATION OF THE EIR/PROJECT CONSIDERATION

The City of Pittsburgh City Council will review and consider the Final PEIR. If the City finds that the Final PEIR is “adequate and complete,” the City Council may certify the Final PEIR in accordance with CEQA. As set forth by CEQA Guidelines Section 15151, the standards of adequacy require a PEIR to provide a sufficient degree of analysis to allow decisions to be made regarding the proposed project that intelligently take account of environmental consequences.

Upon review and consideration of the Final PEIR, the City Council may take action to approve, revise, or deny the project. If the EIR determines that the project would result in significant adverse impacts to the environment that cannot be mitigated to less than significant levels, the City Council would be required to adopt a statement of overriding considerations as well as written findings in accordance with State CEQA Guidelines Sections 15091 and 15093. A Mitigation Monitoring and Reporting Program (MMRP) would also be adopted in accordance with Public Resources Code Section 21081.6(a) and CEQA Guidelines Section 15097 for mitigation measures required to reduce or avoid significant effects on the environment. The MMRP would be designed to ensure that these measures are carried out during project implementation, in a manner that is consistent with the PEIR.

1.7 ORGANIZATION AND SCOPE

Sections 15122 through 15132 of the State CEQA Guidelines identify the content requirements for Draft and Final EIRs. An EIR must include a description of the environmental setting, an environmental impact analysis, mitigation measures for any significant impacts, alternatives, significant irreversible environmental changes, growth-inducing impacts, and cumulative impacts. The PEIR reviews environmental and planning documentation developed for the project, environmental and planning documentation prepared for recent projects located within the City of Pittsburgh, and responses to the Notice of Preparation (NOP).

This Draft EIR is organized in the following manner:

EXECUTIVE SUMMARY

The Executive Summary summarizes the characteristics of the proposed project, known areas of controversy and issues to be resolved, and provides a concise summary matrix of the project’s environmental impacts and possible mitigation measures. This chapter identifies alternatives that reduce or avoid at least one significant environmental effect of the proposed project.

CHAPTER 1.0 – INTRODUCTION

Chapter 1.0 briefly describes the proposed project, the purpose of the environmental evaluation, identifies the lead, trustee, and responsible agencies, summarizes the process associated with preparation and certification of an EIR, identifies the scope and organization of the Draft PEIR, and summarizes comments received on the NOP.

CHAPTER 2.0 – PROJECT DESCRIPTION

Chapter 2.0 provides a detailed description of the proposed project, including the location, intended objectives, background information, the physical and technical characteristics, including the decisions subject to CEQA, subsequent projects and activities, and a list of related agency action requirements.

CHAPTER 3.0 – ENVIRONMENTAL SETTING, IMPACTS, AND MITIGATION MEASURES

Chapter 3.0 contains an analysis of environmental topic areas as identified below. Each subchapter addressing a topical area is organized as follows:

Environmental Setting. A description of the existing environment as it pertains to the topical area.

Regulatory Setting. A description of the regulatory environment that may be applicable to the project.

Impacts and Mitigation Measures. Identification of the thresholds of significance by which impacts are determined, a description of project-related impacts associated with the environmental topic, identification of appropriate mitigation measures, and a conclusion as to the significance of each impact.

The following environmental topics are addressed in this section:

- Aesthetics and Visual Resources
- Air Quality
- Biological Resources
- Cultural and Tribal Resources
- Geology and Soils
- Greenhouse Gas Emissions and Energy
- Hazards and Hazardous Materials
- Hydrology and Water Quality
- Land Use and Planning
- Noise
- Population and Housing
- Public Services and Recreation
- Transportation and Circulation
- Utilities and Service Systems
- Wildfires

CHAPTER 4.0 – OTHER CEQA-REQUIRED TOPICS

Chapter 4.0 evaluates and describes the following CEQA required topics: impacts considered less-than-significant, significant and irreversible impacts, growth-inducing effects, cumulative impacts, and significant and unavoidable environmental effects.

CHAPTER 5.0 – ALTERNATIVES

Chapter 5.0 provides a comparative analysis between the merits of the proposed project and the selected alternatives. State CEQA Guidelines Section 15126.6 requires that an EIR describe a range of reasonable alternatives to the project, which could feasibly attain the basic objectives of the project and avoid and/or lessen any significant environmental effects of the project.

CHAPTER 6.0 – REPORT PREPARERS

Chapter 6.0 lists all authors and agencies that assisted in the preparation of the Draft PEIR, by name, title, and company or agency affiliation.

APPENDICES

This section includes all notices and other procedural documents pertinent to the Draft PEIR, as well as technical material prepared to support the analysis.

1.8 COMMENTS RECEIVED ON THE NOTICE OF PREPARATION

The City received five comment letters on the NOP. Copies of these letters are provided in Appendix A of this Draft EIR and the comments are summarized below.

TABLE 1.8-1: NOTICE OF PREPARATION COMMENT SUMMARY

<i>Commenter</i>	<i>Date Received</i>	<i>Summary of Comment</i>
<i>State</i>		
Native American Heritage Commission	March 7, 2024	Provides a list of actions for compliance with Assembly Bill 52 and Senate Bill 18. Recommends steps to adequately assess the existence and significance of tribal cultural resources, with recommendations on a plan for avoidance, preservation in place, and mitigation of project-related impacts.
Bureau of Environmental Justice	March 18, 2024	Summarizes environmental impacts that logistics facilities have on communities, specifically adverse health related impacts from toxic air contaminants. The letter states toxic air contaminants as precursors to respiratory problems, cancer, heart disease, and premature death, and cites the California Air Resources Board, the Office of Environmental Health Hazard Assessment and American Lung Association. Provides the Attorney General Office of Bureau of Environmental Justice best practices and mitigation measures for warehouse projects. Encourages the consideration of best practices and mitigation measures in the preparation of the Draft Environmental Impact Report.

1.0 INTRODUCTION

<i>Commenter</i>	<i>Date Received</i>	<i>Summary of Comment</i>
California Department of Transportation (Caltrans)	April 3, 2024	Suggests including two (2) Caltrans multimodal plans, including Caltrans District 4 Pedestrian Plan (2021) and the Caltrans District 4 Bike Plan (2018) in the Draft EIR for a location-based prioritization needs for bicycle and pedestrian improvements.
Governor's Office of Planning and Research	March 18, 2024	Indicates the project may be eligible for judicial streamlining.
<i>Local Agency</i>		
Pacific Gas and Electric Company (PG&E)	March 4, 2024	Indicates that the PG&E Plan Review Team needs verification that the CEQA document will identify any required future PG&E services for adequate Gas and Electric facility review and will provide project specific response if needed. Provides detail on PG&E stipulations for Gas and Electric facilities.
Pacific Gas and Electric Company (PG&E)	April 4, 2024	Indicates the Specific Plan improvements do not interfere with PG&E facilities or easements.
Bay Area Rapid Transit (BART) District	April 3, 2024	Suggests the consideration of "strong transportation demand management (TDM) elements", as the Plan Area is not within walking distance of the city's two BART stations. Includes effective elements to encourage TDM such as charging for parking and requiring a dedicated manager who will run and monitor the TDM program.
East Bay Municipal Utility District (EBMUD)	March 27, 2024	Notes that the EBMUD's Mokelumne Aqueducts are located adjacent to northern boundary of the Plan Area. Confirms development projects will need to conform with EMBUD's Procedure 718. States that any project encroachments will need to be reviewed by EBMUD and any retaining walls and fences along the property must be constructed completely outside of EBMUD property.
<i>Interested Party</i>		
Arthur Calbert	March 1, 2024	Requests GIS data and attribute tables to analyze how the project will affect the surrounding area.
Delta Stewardship Council	March 11, 2024	Requests clarification of project location to be within the Contra Costa Urban Limit Line, and requests associated land use permit application number.
TRANSPAN Committee	March 29, 2024	Makes several recommendations based on the current adopted "Action Plan" (2017). Suggests the Draft Environmental Impact Report analyze freeway ramp metering operations and project

<i>Commenter</i>	<i>Date Received</i>	<i>Summary of Comment</i>
		impact on transit service. Recommends the project consider connecting West Leland Road to the Delta De Anza Trail for bike path continuity and recommends TDM strategies be developed in consultation with TRANSPLAN.
Save Mount Diablo (SMD)	April 4, 2024	Recommends the Draft EIR analyze non-impact area review of historical city land grant from the Department of Interior, as well as environmental impact areas (biological resources, aesthetics, greenhouse gases, and recreation).

2.1 INTRODUCTION

STATE SPECIFIC PLAN LAW

A specific plan is a planning document that effectively establishes a link between implementing policies of the general plan and the individual development proposals in a defined area. The specific plan contains a customized regulatory framework made up of detailed development standards and implementation measures to which future projects located within the specified geographic area must adhere.

All specific plans must comply with California Government Code Sections 65450-65457. These provisions require that a specific plan be consistent with the adopted general plan of the jurisdiction within which it is located. In addition, specific plans must be consistent with any Airport Land Use Plan pursuant to Public Utilities Code §21676. In turn, all subsequent subdivision and development, public works projects, and zoning regulations must be consistent with the specific plan. The initiation of the specific plan process may be motivated by any number of factors including development issues or the efforts of private property owners, elected officials, citizen groups, or the local planning agency. As with a general plan, the authority for adoption of the specific plan is vested with the local legislative body pursuant to §65453(a). However, unlike the general plan, which is required to be adopted by resolution (§65356), two options are available for the adoption of a specific plan: 1) adoption by resolution, which is designed to be policy driven, or 2) adoption by ordinance, which is regulatory by design.

PROJECT OVERVIEW

The City of Pittsburg (City) Pittsburg Technology Park Specific Plan (proposed Specific Plan; proposed project) provides the policy, zoning, and implementation framework for the development of a technology park employment area on a portion of the former municipal Delta View Golf Course.

The Specific Plan is based on a concept for development of the area in three phases (Plan Area). Phase I is assumed to be a data center project [or other permitted use(s) allowed by the SP] north of the Contra Costa Canal. The Pittsburg Data Hub (PDH) is one potential project that could be developed in Phase I. Phases II and III cover land south of the canal and allow for the further development of the Plan Area as a dynamic employment center.

The potential PDH project includes an emergency backup generating facility with a generation capacity of up to 92 megawatts (MW) to support the need for the PDH to provide uninterruptible power supply for its tenant's servers. The Pittsburg Back-up Generating Facility (PBGF) would consist of 37, 3 MW diesel-fired backup generators arranged in a generation yard located on the west side of the PDH. A total of 36 generators would be dedicated to replacing the electricity needs of the data center in case of a loss of utility power, and one additional generator would be used to support general office loads along with building and life safety services. An application for a Small Power Plan Exemption (SPPE) was submitted to the California Energy Commission (CEC) on February 28, 2024, for the PBGF (24-SPPE-1). The entirety of the SPPE application, including a detailed analysis of

the potential PDH project impacts, is included as Appendix C to this Program Environmental Impact Report (PEIR).

The PDH project remains speculative because the project design and other details have not been finalized; the CEC may or may not approve the required SPPE; and depending on CEC feedback, market demand, economic conditions, site constraints, and other factors, the property owner may choose to proceed with a different or revised development concept for Phase I. Accordingly, the Specific Plan does not provide authorization for the PDH project, and the PEIR provides a programmatic, rather than a project-level, environmental analysis for Phase I. Nevertheless, to provide the public and decisionmakers with as much information as possible, this PEIR includes and incorporates the SPPE application as Appendix A, and it studies the environmental impacts of the PDH project as one potential alternative in Chapter 5. Pursuant to Public Resources Code section 25519(c), the CEC must act as lead agency for the PDH project. If and when the CEC approves the SPPE, and the property owner applies to the City to develop the PDH project, then the City will evaluate that application pursuant to the review procedures of the Specific Plan and conduct appropriate CEQA compliance.

The Specific Plan provides multidisciplinary guiding principles for use in planning-related endeavors for future development. The document incorporates a vision and goals for the Plan Area and sets development standards, zoning, and design guidelines for land use, building, public right-of-way, circulation, and mobility. Per the California Government Code (Title 7, Division 1, Chapter 3, Article 8, Sections 65450 et seq.), the Specific Plan acts as a regulatory document that will be adopted by ordinance.

2.2 PROJECT OBJECTIVES

The intended purpose of the Specific Plan is to establish a direct connection between the City of Pittsburg's 2040 General Plan (2040 General Plan) and opportunities for economic development. An overall goal of the Specific Plan is to foster economic opportunities within the community by expanding the variety of technology-focused business park uses. The Specific Plan will serve as the overarching policy document and provide the necessary zoning and development standards for the development of a technology park. The following objectives have been established to achieve the purpose of the proposed project:

- Develop a comprehensive master plan for the Plan Area that provides for technology park uses while incorporating essential infrastructure facilities.
- Foster economic and employment opportunities within the community by expanding the variety of industrial, office, and technology park uses.
- Enable the construction of industrial or office buildings that will be attractively incorporated into the landscape, while minimizing impacts to the surrounding natural environment and sensitive resources.

- Identify and facilitate the installation and ongoing maintenance of water, sewer, drainage, and road infrastructure in connection with development projects in the Specific Plan Area.
- Establish guidelines and standards for building and site development aesthetics that create a distinctive and cohesive identity for the Plan Area.

2.3 PROJECT LOCATION

REGIONAL SETTING

The Plan Area is located in the City of Pittsburg within Contra Costa County, CA. The City is bordered by Suisun Bay and Solano County to the north, the City of Antioch and unincorporated Contra Costa County to the east, the City of Concord to the west, and unincorporated Contra Costa County to the south.

The City is well-connected within the Bay Area region with access to all modes of transportation, from regional rail services, airports, state routes and more, including Pittsburg/Bay Point Bay Area Rapid Transit (BART) and the extension of BART services to eastern Contra Costa County. State Route 4 (SR-4) provides regional motor vehicle access to the other major cities and towns in the Bay Area.

The City's early growth centered around industrial development. The growth of the Bay Area has brought many changes to the City's region, including residential, commercial development and marina development. Pittsburg has grown outward from the downtown area since the 1990s. Residential development continues in the southwestern portion of the City, generally south of Leland Road. Infill commercial development continues to occur along SR-4. The expansion of BART to serve the City, with the Bay Point Station opening in 1996 and the Pittsburg Center Station opening in 2018, has encouraged transit-oriented development, including new retail, commercial offices, restaurants, and residential uses around the stations.

PLAN AREA DESCRIPTION

Plan Area Land Use

The Plan Area generally encompasses the eastern half of the former municipal Delta View Golf Course, south of West Leland Road, located at 2232 Golf Club Road (Figure 2-1). The Plan Area consists of three individual parcels totaling approximately 76.4 acres. The Contra Costa Canal runs east-west through the Plan Area, separating the site into two major project areas. The parcel north of the canal is approximately 22.05 acres and the two parcels south of the canal total 54.33 acres.

The Plan Area is predominantly undeveloped and includes remnant features of the former golf course including sand pits, paved roads, and parking areas. Vegetation onsite primarily consists of annual grasses and large trees with some wetlands occurring in larger drainage swales.

The Plan Area is designated as Employment Center Industrial (ECI) per the 2040 General Plan, as shown on Figure 2-2. This designation is described in the 2040 General Plan as "fostering vibrant, diverse, and dynamic employment hubs that accommodate technology, advanced manufacturing,

2.0 PROJECT DESCRIPTION

logistics, and other sectors that generate substantial employment opportunities; uses may include administrative, financial, business, professional, medical and public offices, business incubators, research and development, custom and light manufacturing, limited assembly, warehousing and distribution, data centers, technology and innovation, energy, hospitals and large-scale medical facilities, services, light and heavy automobile services, and supporting commercial uses”. To achieve internal consistency between the 2040 General Plan and the City’s zoning ordinance, as required by Government Code 65860, the City rezoned areas designated as ECI by the 2040 General Plan with the “Limited Industrial with an Overlay (IL-O)” District. IL-O overlay zone allows for employment-generating and light manufacturing uses with specific development regulations to facilitate economic development within the City, while the city-wide conforming zoning updates proceed.

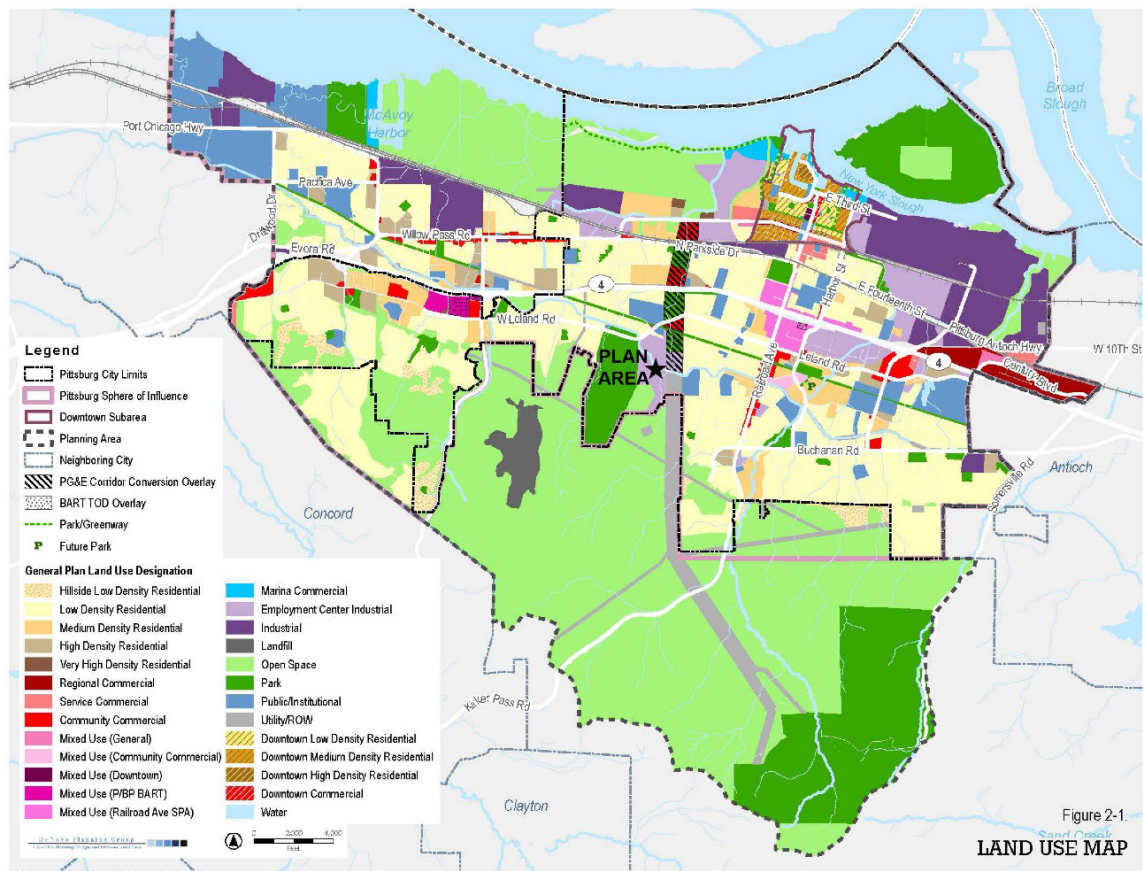
FIGURE 2-1. PLAN AREA



Surrounding Land Use

Lands to the south and west of the Plan Area are vacant/open space and are additional portions of the former Delta View Golf Course. Lands to the east consist of open space containing a transmission owned by Pacific Gas and Electric (PG&E). To the north of the Plan Area are low- and medium-density residential development. The 2040 General Plan designates the land to north as Low Density Residential and Public/Institutional; to the east as a PG&E Corridor Conversion Overlay; to the west as Park. The Contra Costa County General Plan designates lands to the south as Open Space.

FIGURE 2-2. CITY OF PITTSBURG 2040 GENERAL PLAN LAND USE MAP



Natural Environment

The Plan Area is part of the former Delta View Golf Course and consists of rolling hills along the southern edge of the City. As such, it lies on the approximate boundary between extensive development bordering Suisun Bay, and largely open space to the immediate south. Elevations within the Plan Area range from approximately 68 feet to 290 feet above sea level, trending upward in elevation from the northeast to the southwest.

The Plan Area is dominated by silt and clay soils that support annual grassland in undeveloped areas, though extensive areas have been partially leveled and native soils have been replaced by soils suited for golf course landscaping. The fine-textured soils within natural and excavated concave

areas support seasonal wetlands. Natural swales and stream courses also run along the edge of the Plan Area, and two artificial ponds have been developed. Some of these ponds were developed entirely within uplands, while others are impoundments of natural drainages. The remnant intact drainages that flow through the Plan Area support a few riparian tree species, but these are widely scattered and include many non-native trees, and do not form contiguous riparian habitat.

Immediately to the east of the Plan Area is a PG&E transmission line corridor that supports an intermittent stream with associated riparian habitat within a mosaic of annual grassland and ruderal habitat. Immediately west of the Plan Area are former golf course lands, and farther west a second narrow riparian corridor. Medium-density residential development is present to the east and west, beyond the riparian corridors.

The Plan Area contains a limited amount of sensitive biological resources, including potentially jurisdictional Waters of the U.S./Waters of the State of California, and potential habitat for Endangered Species Act (ESA) and California Endangered Species Act (CESA) listed species. The Plan Area is subject to the East Contra Costa County Habitat Conservation Plan & Natural Community Conservation Plan (HCP/NCCP) and its associated Regional General Permit (RGP).

Circulation and Mobility

The Plan Area does not have any established roadways through the area and is primarily served by local roadways, including Golf Club Road to the north and John Henry Johnson Parkway to the west. Regional access to the Plan Area is provided by State Route (SR) 4, Bailey Road, and Railroad Avenue. These key transportation facilities are discussed in more detail in Section 3.13 of this PEIR.

The City of Pittsburg is served by local and regional transit services provided by Tri-Delta, BART, and County Connection. The Plan Area can be accessed via the Tri-Delta Transit bus routes 388 and 390 at the intersection of Leland Road and Golf Club Road. The Plan Area is approximately one mile away from the BART Yellow Line, Pittsburg Center Station, which provides regional connections. Lastly, the Plan Area is approximately 1.5-miles away from the County Connection Express Route 93X bus route at the intersection of Kirker Pass Road and Castlewood Drive.

Pedestrian facilities near the Plan Area include sidewalks, crosswalks, pedestrian signals, and multi-use trails. Five to eight-foot sidewalks are provided along both sides of West Leland Road and Golf Club Road. Crosswalks are provided at signalized intersections. Pedestrian push-button actuated signals are provided at signalized intersections. Additionally, there are Class II bicycle facilities along West Leland Road and Range Road.

Utilities and Infrastructure

The Contra Costa Water District (CCWD) serves the City and the Plan Area with potable water. The CCWD supplies water from two sources, both of which are treated at the Water Treatment Plant. These sources include surface water deliveries, which make up the vast majority of the City's supply, as well as groundwater supplies from two groundwater wells. The Plan Area is specifically served by an existing 6-inch water main on Golf Club Road. Additionally, a 12-inch water main located near the Plan Area would be extended and utilized for Phase I development.

Delta Diablo (formerly Delta Diablo Sanitation District) provides wastewater collection and treatment for the City of Pittsburg. The wastewater treatment plant (WWTP) has an average dry weather flow permitted capacity of 19.5 million gallons per day (MGD) and a recycled water facility (RWF) provides over 9,600 AFY of recycled water for industrial and landscape irrigation uses within the recycled water service area. There is an existing 30-inch recycled water main which feeds a 10-inch recycled water line to a private recycled water storage tank within the Plan Area. The existing storage tank includes an air gap and has back-up connection to domestic water to provide reliable service.

Sewer services in the Plan Area are provided by the City and Delta Diablo. The City maintains and owns the local sewage collection system that serves the City's municipal users and the City's wastewater is conveyed to Delta Diablo facilities for treatment. There is an 8-inch public sewer main that runs along Golf Club Road with extensions to the former golf course.

The City's existing drainage system is composed primarily of channelized creeks fed by surface runoff and underground storm drains. Storm drains throughout the City are used to collect rainwater and divert it, untreated, into the Delta. The City's storm drains do not connect to the sewer system, and all stormwater that flows into a storm drain system flows directly into the Delta. The Plan Area contains stormwater infrastructure as it related to the Delta View Golf Course. It is assumed that the existing infrastructure ties into the public storm water infrastructure along Golf Course Road. City records do not indicate stormwater infrastructure past Phase I of the Plan Area.

2.4 SPECIFIC PLAN COMPONENTS

The Specific Plan provides the framework for future development of the 76.4-acre Plan Area and is intended to strengthen the existing economic opportunities in the City.

The Specific Plan does not authorize any specific development proposal; rather, it is a framework document intended to guide future development in the Plan Area in a manner that is consistent with the vision, goals, and policies of the 2040 General Plan. Future development proposals within the Plan Area would require approvals from the City and would be reviewed for consistency with Specific Plan land uses, policies, and design guidelines, as described in Section 2.8, *Future Development*.

2.4.1 LAND USE, DESIGN, AND DEVELOPMENT ---

Permitted Uses

The Plan Area considers the following list of permitted uses for future development proposals. There are no conditionally permitted uses. All permitted uses are subject to development standards and design guidelines, and land use entitlement procedures and actions outlined in the Specific Plan. Permitted uses within the Plan Area include the following:

- Administrative, business, and professional offices
- Data center
- Energy
- Financial offices

- Government/public offices
- Medical offices and medical testing
- Research and development services and production
- Manufacturing (custom and limited)
- Warehouse and distribution (interior and exterior storage)

Phasing and Buildout

The Specific Plan is based on a concept for development of the Plan Area in three phases. Phase I is assumed to be a data center project [or other land use(s) allowed by the SP] on the 22.05-acre portion of the Plan Area north of the Contra Costa Canal. As previously discussed, the PDH project is one potential project that could be developed in Phase I. The Phase I PDH CEQA compliance documentation would be completed by the CEC, as it has regulatory authority over data centers with over 49 megawatts or greater capacity.

For the purposes of this PEIR, conservative assumptions for future development projections and buildout are based on planning and technical evaluation and will be used for environmental review within the PEIR. Projected future development and buildout assumptions are based on consistency with the 2040 General Plan land use map and policies as well as on existing conditions, flexible market demands, and site constraints.

Figure 2-3 below illustrates the potential building envelopes for each phase of development, planned infrastructure, and circulation throughout the Plan Area. This PEIR assumes that impacts would occur within the building envelopes and as a result of associated infrastructure and circulation. As detailed in Table 2-1 below, Phase II totals 29.29 acres; however, the building envelope totals 343,975 sq ft. Similarly, Phase III is 25.04 acres and is assumed to have a building envelope of 366,396 sq ft. Based on the development standards in the Specific Plan, it is estimated that approximately 761,118 sq ft of the building envelopes for Phase II and III could be built out.

Employee generation rates are estimated based on the total development assumption and a ratio of one employee per 500 sq ft of development.

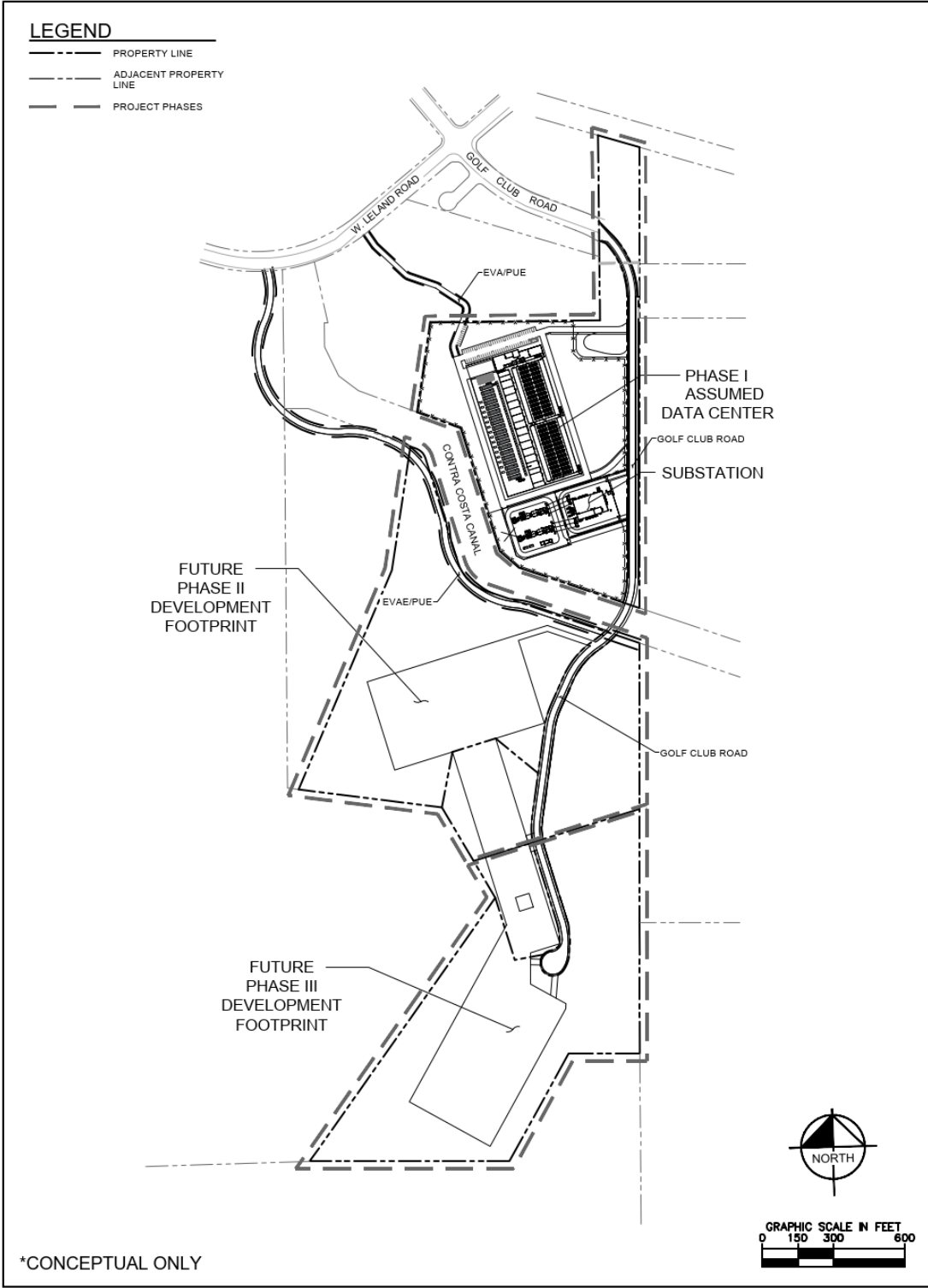
Since the list of permitted uses within the Plan Area allows for a variety of development types and no specific projects are presumed, future development assumptions were made for this PEIR. The analyses in this PEIR assumes 80 percent of Phases II and III would be manufacturing/industrial development, while the remaining 20 percent would be office development.

TABLE 2-1: ASSUMED BUILDOUT POTENTIAL OF THE SPECIFIC PLAN

<i>PLAN PHASE</i>	<i>NET ACREAGE</i>	<i>BUILDING ENVELOP E (SQ FT)</i>	<i>DEVELOPMENT ASSUMPTION (SQ FT)</i>	<i>PROPOSED PLAN AREA PERMITTED USES (SQ FT)</i>		<i>ESTIMATED NO. OF EMPLOYEES</i>	<i>TOTAL 2040 GENERAL PLAN BUILD OUT NO. OF EMPLOYEES</i>
				<i>MANUFACTURIN G/ INDUSTRIAL (80%)</i>	<i>OFFICE (20%)</i>		
Phase I	22.05	381,549	347,740	N/A*	N/A*	60	3,300
Phase II	29.29	343,975	368,551	294,841	73,710	737	
Phase III	25.04	366,396	392,567	314,054	78,513	785	
Total	76.38	1,061,920	1,108,858	887,087	221,771	1,582 employees	3,300

*PHASE I IS ASSUMED TO BE A DATA CENTER PROJECT [OR OTHER LAND USE(S) ALLOWED BY THE SP].

FIGURE 2-3. SITE PLAN CONCEPT



Development Regulations

Table 2-2 below shows the development regulations that will apply to all development projects within the Plan Area.

TABLE 2-2: PROPERTY DEVELOPMENT REGULATIONS

<i>PROPERTY DEVELOPMENT REGULATIONS</i>	<i>FEET</i>
Minimum lot area (sq. ft.)	5,000
Minimum lot width	70
Minimum yards	–
Front Setback	10
Side Setback	10
Side Setback (adjacent to an R or residential PD district)	10
Corner side Setback	10
Rear Setback	10
Rear Setback (adjacent to an R or residential PD district)	10
Maximum front yard (ft.)	–
Maximum height ¹ of structure(s)	99
Minimum height of structure(s)	–
Maximum lot coverage	60%
Maximum FAR ²	0.5
Minimum site landscaping	7%

¹ Height shall be calculated from the proposed finished grade to top of roof membrane. This excludes screening and architectural facades, i.e., parapet.

² Facilities owned and operated by a public utility shall not be included in FAR calculation.

Development Guidelines

The Specific Plan includes development guidelines intended to provide guidance for future development proposed within the Plan Area. The guidelines ensure thoughtful design that supports the overall vision of the Plan Area and creates a unified aesthetic within the Plan Area. These development guidelines are summarized below, and full details are provided in the Specific Plan.

- The Specific Plan outlines guidelines for the shape, size, proportions, and articulation of buildings to promote a cohesive character throughout the Plan Area. In addition to shape and size, the Specific Plan provides guidelines on the building materials, colors and textures to add visual interest while blending with the natural environment.
- The Specific Plan considers circulation and parking requirements to help ensure well-functioning and safe travel around and through the Plan Area. Internal site circulation considers pedestrians through an integrated sidewalk network.
- Landscape design guidelines are intended to enhance site development with aesthetically pleasing and drought-tolerant landscaping throughout the Plan Area. Additionally, fire prevention is a key element of the landscape design guidelines and the continued maintenance of the Plan Area.

2.4.2 CIRCULATION AND PARKING

In addition to the proposed land use and site design framework, the Specific Plan provides a circulation plan and mobility standards and amenities for multiple modes of transportation, parking standards, truck access, and emergency access requirements.

Circulation

The proposed roadway network includes the extension of Golf Club Road and a secondary emergency entrance that connects to West Leland Road. The Specific Plan also identifies private drives for each phase, additional emergency access, sidewalks, and transit connections. Figure 2-4 illustrates the proposed roadway network needed to meet the vehicular and non-vehicular needs of employees and visitors, as well as for the transportation of goods to and from the businesses located within the Plan Area.

Parking

The Specific Plan includes proposed parking regulations to cover all phases of development. The purpose of parking regulations in the Specific Plan is to provide safe and convenient access, to ensure parking areas are properly designed, and to provide enough adequate spaces to service the use, reduce traffic congestion, promote business, and enhance public safety.

Phase I is assumed to be a data center with an adjacent substation and should therefore require minimal parking, as data centers require few on-site staff. Development projects within Phases II and III of the Plan Area are required to provide one off-street parking space per 500 sq ft of floor

space. Data centers are excluded from this requirement. The Director of Planning or his or her designee may allow a reduction in the minimum of parking spaces at their discretion.

2.4.3 UTILITIES AND INFRASTRUCTURE

Water System

The Plan Area currently relies on a water conveyance facility located along the Golf Club Road. In addition, recycled water lines service the Plan Area. It is anticipated that additional water conveyance, including domestic and recycled water infrastructure, would be required as part of future development projects within the Plan Area. The conceptual locations of water line extensions into the Plan Area are shown in Figure 2-4. All connections are anticipated to be within the extension of Golf Club Road.

Subsequent projects within the Plan Area would be required to complete infrastructure studies for all new domestic and recycled water and wastewater lines. Furthermore, all subsequent projects will be reviewed by the City for adequate flows and pressure.

Sewer System

The Plan Area is currently served by an existing sewer collection facility that connects the abandoned Delta View Golf Course to a City owned and maintained 8-inch PVC sewer main running along Golf Club Road. Future development within the Plan Area would increase wastewater flows from the Plan Area, resulting in the need for additional wastewater conveyance infrastructure. The conceptual locations of the extensions of wastewater lines from existing points of connection into the Plan Area are shown in Figure 2-4. All of these connections are anticipated to be within the extension of Golf Club Road. Wastewater conveyance facilities would be evaluated for exact sizing and placement at the project-level in association with subsequent development projects.

Electrical System

Extensions of electrical lines would be required to serve future development within the Plan Area. Extensions of these lines would connect to existing PG&E lines located along the eastern Plan Area boundary within the existing PG&E right-of-way. Future electrical line extensions are anticipated to be located within the future right-of-way of Golf Club Road. The exact sizing and placement would be determined at the project-level in association with subsequent development projects.

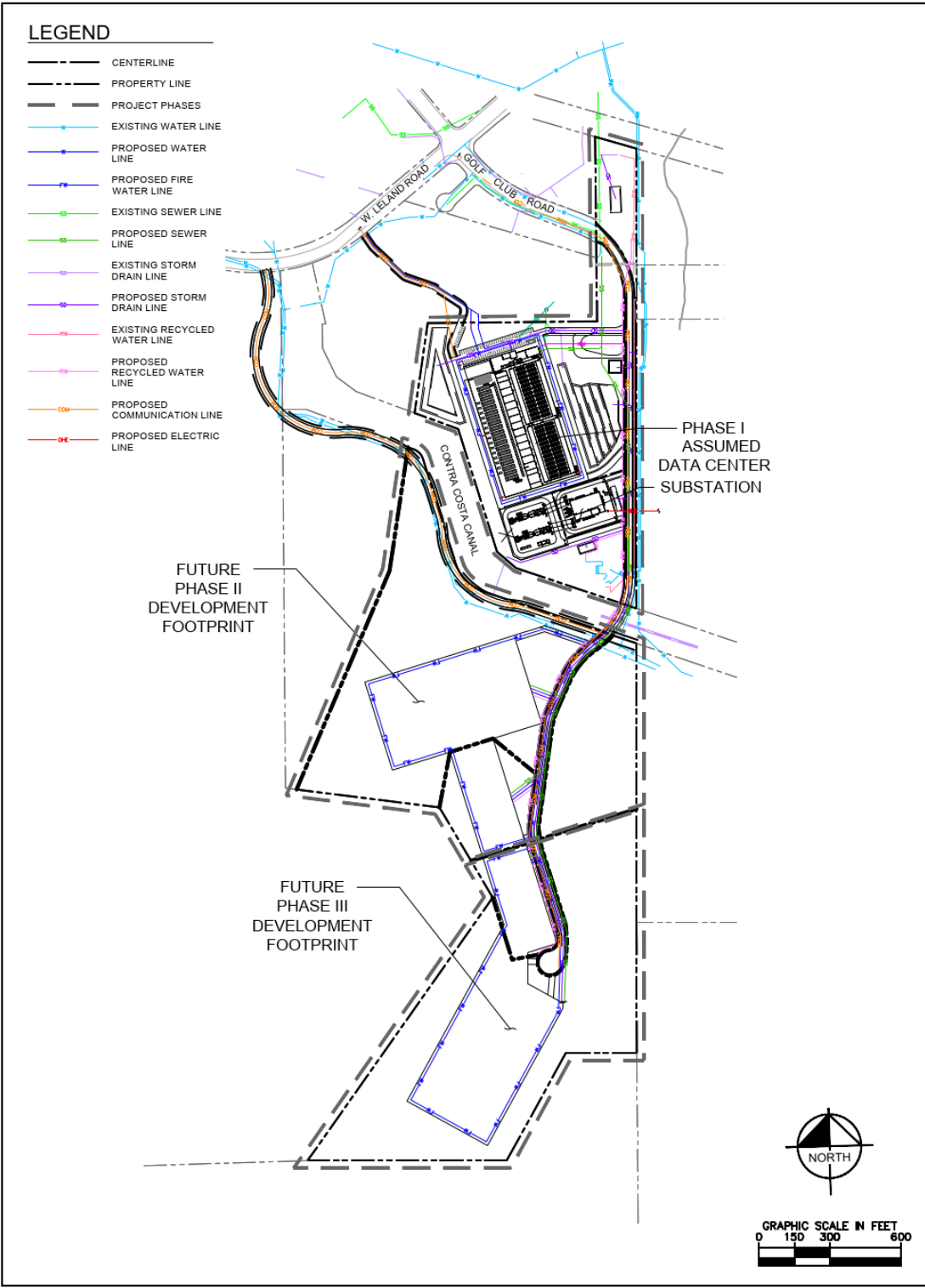
Natural Gas System

There is no existing gas infrastructure in the Plan Area, and no future development projects will be allowed the addition of natural gas infrastructure.

Telecommunications System

Subsequent projects within the Plan Area will require the addition of telecommunications infrastructure.

FIGURE 2-4. UTILITY CONCEPT MAP



2.5 ZONING

Future development within the Plan Area would be governed by the permitted land uses and development standards identified in the Specific Plan, which shall replace and take precedence over the IL-O zoning regulations adopted by the City for the subject property. Where the regulations of the Specific Plan are silent, the IL-O regulations of the City, and all adopted ordinances, regulations, standards, and guidelines of the City shall prevail, as deemed appropriate by the City. Where the development standards contained in the Specific Plan conflict with development standards of the Municipal Code, the standards contained in the Specific Plan shall apply.

2.6 RELATIONSHIP TO GENERAL PLAN

The Specific Plan together with the 2040 General Plan, provides a framework that will guide future land use and development in the Plan Area. The Specific Plan is consistent with and serves as an extension of the 2040 General Plan, which will provide both policy and regulatory direction. When future development proposals are brought before the City, staff and decision-makers will use the Specific Plan as a guide for project review. Projects will be evaluated for consistency with the intent of Specific Plan policies and for conformance with development standards and design guidelines. Specific Plan policies and standards will take precedence over more general policies and standards that are applicable to the rest of the City. In situations where policies or standards relating to a particular subject have not been provided in the Specific Plan, the existing policies and standards of the 2040 General Plan and Zoning Ordinance will continue to apply.

State planning and zoning law (California Government Code Section 65000 et seq.) establishes that zoning ordinances are required to be consistent with the general plan and any applicable specific plans, area plans, master plans, and other related planning documents. When amendments to the general plan are made, corresponding changes in the zoning ordinance may be required within a reasonable time to ensure consistency between the revised land use designations in the general plan (if any) and the permitted uses or development standards of the zoning ordinance (Gov. Code Section 65860, subd. [c]).

2.7 ASSOCIATED ACTIONS

ADOPTION OF THE PITTSBURG TECHNOLOGY PARK CENTER SPECIFIC PLAN

The proposed project includes adoption of the Pittsburg Technology Park Specific Plan by ordinance.

TENTATIVE MAP

The Specific Plan is accompanied by a tentative map that would subdivide the existing three parcels within the Plan Area into 12 new parcels for future phases of development. The tentative map includes easements for public utilities and emergency vehicle access. The tentative map reserves the right to file multiple maps for the purposes of phasing. Following map recordation, the final maps will become the legal document that identifies the lots and backbone infrastructure to allow for future development.

DISCRETIONARY ACTIONS

Discretionary actions are those actions taken by an agency that call for the exercise of judgment in deciding whether to approve or how to carry out a project. The following discretionary actions by the City would be required for approval of the Specific Plan.

- Adopt the Pittsburg Technology Park Specific Plan by ordinance.
- Adoption of the Tentative Map.
- Certify the PEIR, adopt the Findings, Statement of Overriding Considerations (if applicable), and Mitigation Monitoring and Reporting Program.

2.8 FUTURE DEVELOPMENT

A development application must be submitted to the City's Planning department for review and conformity with the standards and design review guidelines of the Specific Plan for all future development projects or infrastructure improvement projects. The Zoning Administrator shall be responsible for administering the provisions of the Specific Plan and shall have authority to review and approve development projects that have been determined to be consistent with the objectives and provisions of the Specific Plan.

The Plan Area is subject to the East Contra Costa County Habitat Conservation Plan & Natural Community Conservation Plan (HCP/NCCP) and its associated Regional General Permit (RGP). Future development must comply with the HCP.

DEVELOPMENT APPLICATION

Future development projects consistent with the Specific Plan would require approval of a development application that includes design review. The development application would need to include a site plan, architectural and civil drawings, grading and landscaping plans, and associated technical studies. The Zoning Administrator shall review the package and provide a determination for consistency with the Specific Plan. The decision of the Zoning Administrator will be appealable to the Planning Commission. If the Zoning Administrator can make the following findings, then the development application and design review permit can be approved administratively without public notice or a public hearing:

- The project complies with all applicable development standards identified in this Specific Plan, the 2040 General Plan, and the Pittsburg Municipal Code.
- There is supporting infrastructure, existing or available, consistent with the intensity of development, to accommodate the proposed development.
- The proposed uses comply with the Specific Plan, 2040 General Plan and Pittsburg Municipal Code.
- The project is within the scope of this PEIR.

CEQA FINDINGS AND SUBSEQUENT ENVIRONMENTAL REVIEW

Subsequent environmental review is required for all subsequent actions to entitle future development. Subsequent actions must be examined in the light of this PEIR to determine whether an additional environmental document needs to be prepared.

The purpose in using a PEIR is to comprehensively consider a series of related projects and to streamline subsequent review of development projects. Subsequent projects may tier from this Specific Plan PEIR, or the City may make a finding that sufficient environmental clearance occurred with this PEIR (CEQA Guidelines sections 15152, 15162 and 15168).

The City shall conduct an analysis under CEQA Guidelines Section 15162 for all subsequent development applications within the Plan Area prior to requiring subsequent CEQA analysis.

This section of the Programmatic Environmental Impact Report (PEIR) describes the affected environment and regulatory setting for aesthetics and visual resources. It also describes the impacts on aesthetics and visual resources that would result from implementation of the Pittsburg Technology Park Specific Plan project (Specific Plan; project). This section uses information from the following documents:

- City of Pittsburg. *Pittsburg 2040 General Plan*. Adopted May 2024.
- City of Pittsburg. *Pittsburg 2040 General Plan Draft Environmental Impact Report*. December 2023.

3.1.1 ENVIRONMENTAL SETTING

The following information provides an overview of the existing visual setting of the Pittsburg Technology Park Specific Plan project area (Plan Area).

REGIONAL SETTING

The Plan Area is located along the southern edge of the City of Pittsburg (City) limits. Pittsburg is a city in Eastern Contra Costa County and is bordered by Suisun Bay and Solano County to the north, the City of Antioch and unincorporated Contra Costa County to the east, the City of Concord and the unincorporated community of Bay Point to the west, and unincorporated Contra Costa County to the south. The northern portion of the City is relatively flat, increasing in elevation towards the southern hills. The most identifying feature lending Pittsburg a sense of character is its location between the rolling, grassy hills to the south and Suisun Bay/Sacramento River Delta to the north. Similarly, while not formally designated as a scenic resource, the Delta shoreline is one of the City's most identifiable visual resources. Views of both natural features are important to the visual quality of the community.

Aesthetically significant features occur in a diverse array of environments within the region, ranging in character from urban centers to rural agricultural lands to natural water bodies. Although the project area is not designated as containing significant visual resources in the City limits, the 2040 General Plan considers open spaces, ridgelines, hillsides, and creeks as important visual resources.

LOCAL CHARACTER

The Plan Area is approximately 76 acres and is composed of two major project areas bisected by the Contra Costa Canal. The Plan Area consists of rolling hills along the lower slopes of the eastern Los Medanos Hills overlooking the City. The Plan Area is currently vacant land that was part of the former Delta View Golf Course. The land encompasses a variety of natural habitat types, including grasslands, wetlands, remnant patches of landscaping trees, and paved roads and parking areas.

A viewshed analysis for the City was conducted as part of the City of Pittsburg's 2040 General Plan (2040 General Plan) update, as illustrated in Figure 3.1-1. Using the ArcView program, four "viewpoints" throughout the City were selected, and digital elevation modeling was used to determine what hills and ridgelines were visible from each. Areas visible from all four viewpoints

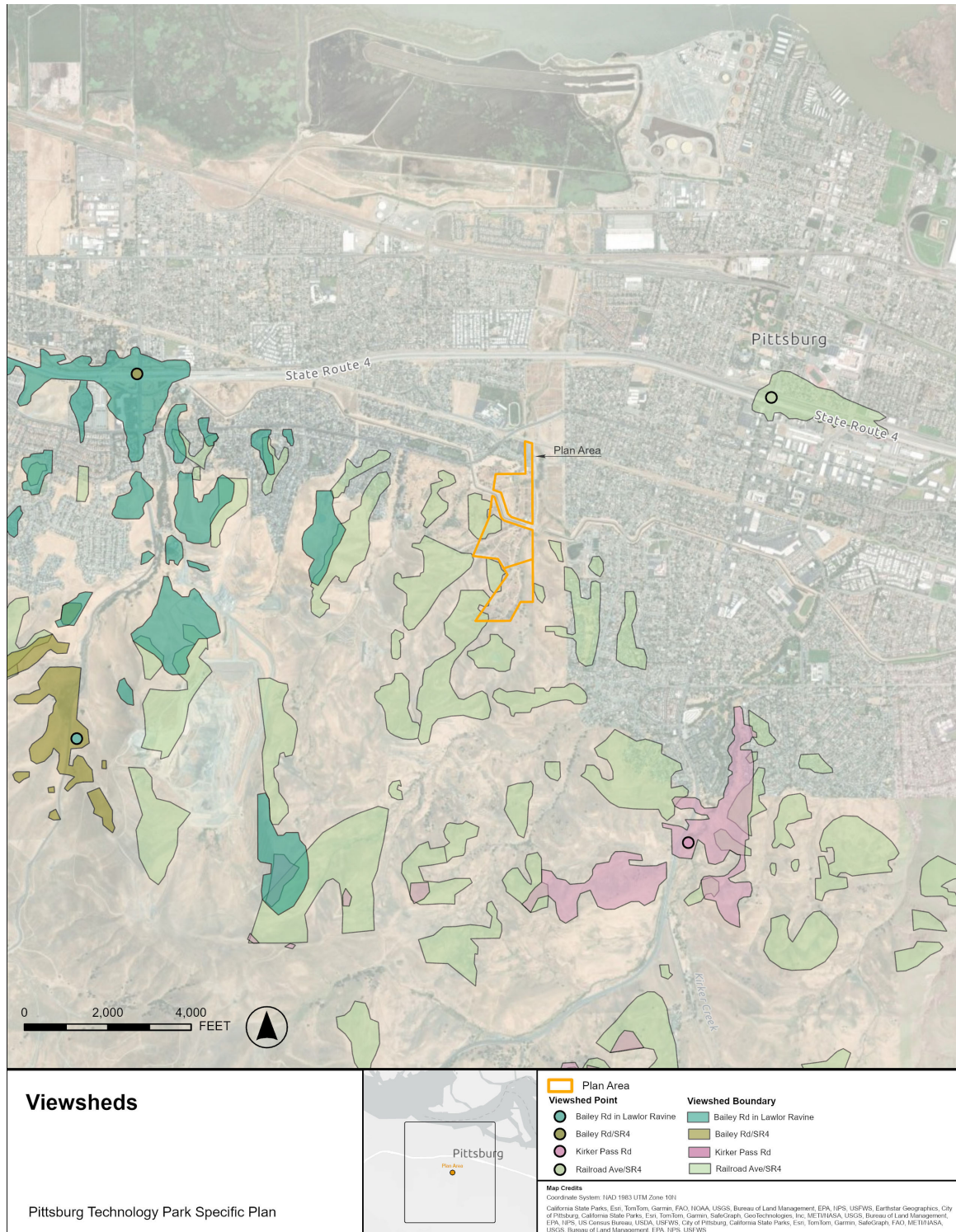
3.1 AESTHETICS AND VISUAL RESOURCES

include multiple small ridgelines in the southern hills, particularly areas southwest of existing development surrounding the Pittsburg/Bay Point BART station.

Approximately 5 acres of the Plan Area are located within the 2040 General Plan designated Railroad Avenue/SR 4 viewshed. The remaining portion of the Plan Area is not within a designated viewshed. Furthermore, according to the 2040 General Plan, the Plan Area does not contain designated major or minor ridgelines. However, there are designated ridgelines south of the Plan Area.

Except for residential and urban development north of the Plan Area, lands to the west, south and east of the Plan Area have little to no development. East of the Plan Area is a Pacific Gas and Electric (PG&E) corridor that includes large transmission lines that traverse the City in a north to south pattern. Land south and west of the Plan Area are designated open spaces with dispersed trees, natural vegetation, undulating ridgelines and hillside terrain that provides a visually pleasing landscape.

FIGURE 3.1-1. VIEWSHEDS NEAR THE PLAN AREA



LIGHT AND GLARE

Lighting effects are associated with the use of artificial light during the evening and nighttime hours. Stationary sources of nighttime light include structure illumination, interior lighting, decorative landscape lighting, and streetlights. The principal mobile source of nighttime light and glare is vehicle headlamp illumination.

Glare is reflective light that can be visually unpleasant or possibly unsafe due to the potential for temporary blindness. Glare is primarily a daytime occurrence that may be caused by light from artificial sources or the sun reflecting off light-colored or smooth, highly polished surfaces, such as metal, glass, water, or polished stone. Glare intensity varies depending on the source and intensity of the light, time of day, time of year, angle of reflectance, weather, texture of material surface, material finish, length of exposure, nature and sensitivity of receptors, and other factors.

Current levels of ambient light and glare in the Plan Area are relatively low as it is currently vacant. However, surrounding areas particularly to the north, is an urbanized area that generates light from signage, residential interiors, and light generated by vehicular traffic. Sources of glare to the north could include sun reflecting off light-colored or smooth residential homes or building facets. Educational and commercial buildings in the vicinity also produce some light and glare generally from stationary light sources such as exterior building illumination, security lighting, parking lot lighting, and landscape lighting.

3.1.2 REGULATORY SETTING

FEDERAL

There are no federal regulations that apply to the proposed project related to visual resources in the Plan Area.

STATE

California Department of Transportation – California Scenic Highway Program

California's Scenic Highway Program was created by the Legislature in 1963 to preserve and protect scenic highway corridors from change, which would diminish the aesthetic value of lands adjacent to highways. State laws governing the Scenic Highway Program are found in the Streets and Highways Code, Section 260 et seq. The State Scenic Highway System includes a list of highways that are either eligible for designation as scenic highways or have been so designated. These highways are identified in Section 263 of the Streets and Highways Code. The project area is not designated as a scenic highway corridor.

California Trails Act

This law requires every city and county to consider trail-oriented recreational uses and consider such demands in developing specific open space programs in their General Plan. Every city, county, and

district must also consider the feasibility of integrating trail routes with appropriate segments of the state trail system.

California Building Standards Code

Title 24 of the California Building Standards Code (CBSC) serves as the basis for the design and construction of buildings in California. In addition to safety, sustainability, new technology and reliability, the CBSC addresses light pollution and glare hazards through the establishment of maximum allowable backlight, up light, and glare (BUG) ratings.

LOCAL

City of Pittsburg 2040 General Plan

The City's 2040 General Plan was adopted by the Pittsburg City Council on May 6, 2024. The Plan Area has a land use designation of 'Employment Center Industrial'. This land use designation is intended to foster "vibrant, diverse, and dynamic employment hubs that accommodate technology, advanced manufacturing, logistics, and other sectors that generate substantial employment opportunities; uses may also include administrative, financial, business, professional, medical and public offices, business incubators, research and development, custom and light manufacturing, limited assembly, warehousing and distribution, data centers, technology and innovation, energy, hospitals and large-scale medical facilities, services, light and heavy automobile services, and supporting commercial uses."

The 2040 General Plan contains several policies and actions applicable to the proposed Specific Plan, including:

Urban Design

Policy 4-P-1.2: Encourage and support high-quality design that evokes Pittsburg's history and unique character through ensuring standards and guidelines for residential, commercial, industrial, mixed use, civic, and other uses incorporate features and materials consistent with Pittsburg's history and character.

Policy 4-P-1.4: Seek methods to improve the visual character and design of Pittsburg, including establishing design standards for gateways, key corridors, residential uses, and non-residential uses, promoting high-quality redevelopment and reuse projects, and addressing features that may adversely affect views of gateways, ridgelines, open space, and other identified visual resources.

Goal-4-2: Encourage preservation of the City's unique natural environment, including hillsides, distinct geologic and topographic landforms, open space, and the waterfront, through a built environment that respects the City's natural features and viewsheds.

Policy 4-P-2.1: Encourage development that preserves unique natural features, such as topography, rock outcroppings, mature trees, creeks, and designated major and minor ridgelines in the design of hillside neighborhoods.

3.1 AESTHETICS AND VISUAL RESOURCES

Policy 4-P-2.4: Retain views of major and minor ridgelines within the southern hills.

Policy 4-P-2.7: Require new development to minimize impacts to, and avoid obstructing views of and from, significant visual resources including major and minor ridgelines through creative site planning, integration of natural features into the project, appropriate scale, materials, and design to complement the surrounding natural landscape, and clustering of development (see also Downtown Policy 9-P-3.2 and Resource Conservation and Open Space Policy 9-P-5.5).

Policy 4-P-2.10: Use revegetation as an erosion control measure to maintain the natural character of a hillside; utilize hydro-seed, silt traps, and other engineering solutions where erosion potential exists during development.

Goal-4-4: Utilize landscape as an important aesthetic and unifying element throughout the City.

Policy 4-P-4.1: Design landscape to enhance structures, neighborhoods, and to create and define public and private spaces.

Policy 4-P-4.4: Limit plant palette to select native trees or identifiable non-native species.

Policy 4-A-4.a: Update the Zoning Ordinance to:

- Establish standards for landscaping and fencing for all districts/use categories, with a focus on unified design and character throughout Pittsburgh.
- Encourage use of native plant species and locally-recognized non-native species with low watering and maintenance requirements in linear parks, landscaped medians, and other quasi-public landscaping applications to enhance the City's overall identity.
- Require landscaped screening for utility boxes, loading areas, and large facilities such as tanks in multifamily, mixed use, and non-residential developments.

Resource Conservation & Open Space

Policy 10-P-1.8: Require development projects to maximize the potential for open space, visual experiences, and passive and active recreation.

Policy 10-P-2.14: Collaborate with developers to establish and/or retain creeks, marshes, wetlands, and riparian corridors in the design of new development.

Goal-10-5: Promote improved views of ridgelines and shorelines from public parks and rights-of way and encourage the preservation, protection, enhancement and use of historical structures and past eras.

Policy 10-P-5.4: Preserve significant visual resources that include unique landforms (e.g., skyline ridges, intermediate ridges, hilltops, and rock outcroppings), creeks, lakes, and open space areas in a natural state, to the extent possible.

Policy 10-P-5.5: Require new development to avoid obstructing views of, and to minimize impacts to, significant visual resources through the following: creative site planning; integration of natural features into the project; appropriate scale, materials, and design to complement the surrounding natural landscape; clustering of development to preserve open space vistas and natural features; minimal disturbance of topography; and creation of contiguous open space networks.

Policy 10-P-5.6: Ensure that the visibility of new development from natural features and open space areas is minimized to preserve the landforms and ridgelines that provide a natural backdrop to the open space systems.

General Plan Policies and Actions related to Light and Glare include:

Land Use

Policy 2-P-4.10: Ensure that employment-generating development, such as industrial, warehouse, distribution, logistics, and fulfillment projects, does not result in adverse impacts (including health risks and nuisances), particularly to residential uses and other sensitive receptors, including impacts related to the location and scale of buildings, lighting, noise, smell, and other environmental and environmental justice considerations. When development is incompatible, require adequate buffers and/or architectural consideration to protect residential areas, developed or undeveloped, from intrusion of nonresidential activities that may degrade the quality of life in such residential areas.

Action 2-A-4.b: As part of the City's development review process, continue to ensure that employment-generating projects are designed to minimize conflicts with residential uses, sensitive receptors, and disadvantaged communities. Review of employment-generating projects should ensure that the following design concepts are addressed in projects that abut residential areas, sensitive receptors, or disadvantaged communities:

- Appropriate building scale and/or siting.
- Site and structure design to avoid excessive glare or excessive impacts from light sources onto adjacent properties.

City of Pittsburg Zoning

The 2040 General Plan land use designation for the Plan Area is 'Employment Center Industrial'. The proposed overlay district would be consistent with the intent of the ECI land use designation in that the proposed allowable uses within the overlay would include technology-focused, employment-generating uses.

City of Pittsburg Municipal Code

Title 18 (Zoning) of Pittsburg Municipal Code (PMC), includes requirements for lighting and glass installation with the intent of minimizing the effects of lighting and glare. PMC Section 18.82.030, Glare, states:

- a) From Glass. Mirror or highly reflective glass may not cover more than 20 percent of a building surface visible from a street unless an applicant submits information demonstrating to the satisfaction of the city planner that use of such glass will not significantly increase glare visible from an adjacent street and property or pose a hazard for moving vehicles.
- b) From Outdoor Lighting. Parking lot lighting must comply with Pittsburgh Municipal Code 18.78.050(F). Security lighting may be indirect or diffused or be shielded or directed away from an R district within 100 feet. Lighting for outdoor court or field games within 300 feet of an R district requires approval of a use permit.

Chapter 18.36 PMC provides for a Design Review process for all development in the City. Pursuant to PMC Section 18.36.200, Design Review is required for all applications for land use and building permits in each land use district other than single family residential. Therefore, typical residential subdivision projects and any non-residential development projects are subject to Design Review by the City of Pittsburgh Planning Commission or delegated authority, during which it is determined whether the proposed project meets the design requirements of the PMC and any applicable plans (such as the proposed Specific Plan).

Pittsburg Development Review Design Guidelines

The City's Development Review Design Guidelines (DRDGs) contain development and architectural guidelines for future development. The DRDGs contain specific standards for residential, commercial and industrial uses. Generally, the Guidelines are intended to assure that individual development blend harmoniously with surrounding development and that new development is constructed of high-quality design and materials. Specifically, the DRDGs applicable to residential and commercial development call for relief and architectural treatment on all building elevations, variation in required yards, limitation on garage frontages and long expanses of blank walls, provision of a variety of building sizes and masses resulting in varying elevations from a streetscape perspective, location of parking lots so that they do not dominate the area adjacent to public right-of-way, screening of all utilities, inclusion of recyclable areas in trash enclosures, and design of building entries as focal points, among other provisions. The DRDGs will be superseded by the Specific Plan Design Guidelines and Development Standards once adopted.

3.1.3 METHODOLOGY AND THRESHOLDS OF SIGNIFICANCE

This section describes the impact analysis relating to aesthetics and visual resources for the proposed project. It describes the methods used to determine the impacts of the proposed project and lists the thresholds used to conclude whether an impact would be significant. Measures to mitigate (i.e., avoid, minimize, rectify, reduce, eliminate, or compensate for) significant impacts accompany each impact discussion, where applicable.

METHODOLOGY

In general, the potential character, quality, light, and glare impacts associated with projects are evaluated on a qualitative basis. The potential impacts to aesthetics and visual resources within the vicinity of the Plan Area were qualitatively evaluated based on the following criteria: (1) existing

visual quality and scenic attributes of the landscape; (2) location of sensitive receptors in the landscape; (3) assumptions about receptors' concern for scenery and sensitivity to changes in the landscape; (4) the magnitude of visual changes in the landscape that would be brought about by implementation, construction, and operation of the proposed project; (5) compliance with State and local policies for visual resources; and (6) the significance threshold questions in relation to aesthetics contained in Appendix G of CEQA Guidelines.

The following general steps were followed to conduct the visual analysis:

1. Identified potential key aesthetic resources in the Plan Area such as scenic views, viewsheds, and community aesthetic features through review of relevant documents, including the 2040 General Plan.
2. Performed a viewshed analysis of the Plan Area and identified representative viewpoint for field survey and creation of photo inventory.
3. Conducted a field survey of the Plan Area and photographed representative existing conditions.
4. Identified the visual character and presence of key aesthetic resources on or within proximity to the Plan Area.
5. Created visual simulation of the Plan Area using the photo inventory.
6. Assessed whether development of the Plan Area would result in a significant visual impact relative to each significance threshold (as explained below).

THRESHOLDS OF SIGNIFICANCE

Consistent with Appendix G of the CEQA Guidelines, the proposed project will have a significant impact on aesthetics if it will:

- Have a substantial adverse effect on a scenic vista;
- Substantially damage scenic resources, including, but not limited to, trees, rock outcroppings, and historic buildings within a state scenic highway;
- Have a conflict with applicable zoning and other regulations governing scenic quality in urbanized areas;
- Create a new source of substantial light or glare which would adversely affect day or nighttime views in the area.

3.1.4 IMPACTS AND MITIGATION MEASURES

Impact 3.1-1: Have a substantial adverse effect on a scenic vista (Less than Significant)

A scenic vista can be defined as a viewpoint that provides expansive views of a highly valued landscape for the public's benefit. The 2040 General Plan describes important views in the City,

3.1 AESTHETICS AND VISUAL RESOURCES

including open space, viewshed areas, ridgelines, hillsides, and creeks. However, it should be noted that the 2040 General Plan does not formally designate any scenic vistas or visual resources. Figure 3.1-1 presents viewsheds within the City as identified in the 2040 General Plan and shows approximately 5 acres of the Plan Area being located within the Railroad Ave/SR 4 viewshed. Therefore, it is assumed that portions of the Plan Area would be visible by motorist traveling on SR 4.

The Plan Area is surrounded by a variety of land uses, including residential developments to the north and rolling mountain ridgelines to the south. Figure 3.1-2 provides a simulation of conceptual buildout of the Plan Area from a representative viewpoint located at the corner of John Henry Johson Park on West Leland Road looking southeast towards the Plan Area. The simulation was generated based on approximate development that could occur under the development standards included in the proposed Specific Plan.

FIGURE 3.1-2. SIMULATION OF DEVELOPMENT ASSOCIATED WITH THE PLAN AREA FROM A REPRESENTATIVE VIEWPOINT.



As shown in Figure 3.1-2 above, future development would change the foreground views of the mountains as observed from viewers looking southeast from West Leland Road. Furthermore, future development would partially obstruct views of open space, ridgelines, and hillsides. Although these resources are not formally designated as scenic resources, it is recognized that they are considered important visual resources to the City. As such, future buildout of the Plan Area would add a new permanent visual element in the environment.

Implementation of the 2040 General Plan policies and compliance with Pittsburg Municipal Code would ensure that future buildout of the Plan Area would not substantially degrade scenic resources in the City. Additionally, Chapter 4 and Section 3.5 of the proposed Specific Plan includes design guidelines and development standards that address architecture, landscape, and lighting. These guidelines are intended to minimize the potential impacts of future development on visual and aesthetic resources as well as enhance the overall aesthetics of the Plan Area, which would in turn, improve the visual character of the City. These guidelines include, but are not limited to, the following:

Design guidelines related to building form:

As stated in the proposed Specific Plan, designing appropriate attributes for shape, size, proportions, and articulation of buildings within the Plan Area will help buildings blend into the natural character of the site and minimize the buildings' perceived size. As such, appropriate attributes for a building's design elements that are visible from a public viewing area should include:

- Articulated building facades as well as varying colors and materials to reduce the visual bulk of the building.
- Accentuated entrances through projected or recessed massing or features such as an overhang.
- Variation in roof lines or parapet heights. Note: Height shall be calculated from the proposed finished grade to top of roof membrane.
- Using architectural accents such as cornices, trim around windows, grooves in walls, and accent bands to create visual variation along building facades.

Design guidelines related to building materials:

Building materials, colors and textures should be used to add visual interest to buildings while blending with the natural character of the site. Building materials and color applications include the following:

- Exterior building materials should include one or more of the following:
 - Smooth concrete
 - Textured concrete
 - Masonry block with textured or sandblasted finishes
 - Glass and curtainwall glazing systems,
 - Natural and/or manufactured stone
 - Limited metal panel systems.
- Primary exterior building colors are encouraged to be light and warm tones. Darker and more intense colors should be utilized for accents and to accentuate entrances.
- Materials changes should occur at intersecting planes, preferably at the corners of wall plane changes or where architectural elements intersect. Material changes can also occur elsewhere within wall planes.
- Materials or color applications should terminate at a logical point in relation to architectural features or massing.
- Multiple buildings in a development should have complementary materials and color palettes.

Design guidelines related to buffering and screening:

Rooftop and ground equipment and truck docks shall be screened from adjacent parcels using fencing, landscaping, or materials consistent with building facades.

Design guidelines related to landscape design:

Landscape design should be intended to enhance site development with aesthetically pleasing and drought-tolerant landscaping. For example, landscape design should:

- be used to soften the appearance of buildings and provide a buffer with open areas and the roadway.
- blend with the natural environment.
- Include planting selection that follow City requirements and consist of predominantly drought-tolerant plants.
- Be integrated into storm water management including any required onsite detention.
- Include ground cover that is designed to have 100 percent coverage within one year.

While future development in the Plan Area would change the existing views towards the mountains, conformance with the 2040 General Plan, Pittsburg Municipal Code, and the proposed Specific Plan would minimize the potential for future development to have a substantial adverse effect on a scenic vista. Therefore, impacts would be **less than significant**, and no mitigation is required.

Impact 3.1-2: Substantially damage scenic resources, including but not limited to, trees, rock outcroppings, and historic buildings within a state scenic highway (No Impact)

As previously discussed, one highway section in Contra Costa County is listed as a Designated Scenic Highway by the Caltrans Scenic Highway Mapping System. The listed resource is a segment of SR-24 that begins in the east portal of the Caldecott Tunnel and terminates at SR-680 near Walnut Creek. This state scenic highway is not located within or near the City, and the Plan Area is not visible from this roadway segment. Additionally, there are no sections of this highway in the City's vicinity eligible for Scenic Highway designation. Furthermore, the City of Pittsburg General Plan does not designate any scenic corridors. Therefore, **no impact** would occur, and no mitigation is required.

Impact 3.1-3: Conflict with applicable zoning and other regulations governing scenic quality (No Impact)

The Plan Area is within the IL-O (Limited Industrial with Limited Overlay District) and comprises an approximately 76.38-acre portion of the former Delta View Golf Course. As previously stated, future development within the Plan Area would be subject to goals and policies in the 2040 General Plan, Pittsburg Municipal Code, and development standards and design guidelines provided in the proposed Specific Plan.

Adherence to identified policies and guidelines contained in the 2040 General Plan would help minimize potential adverse impacts on visual aesthetics of the community. The 2040 General Plan's Policy 4-P-1.2 supports high-quality design through ensuring standards and guidelines for commercial and industrial uses incorporate features and materials consistent with the City's history and character. Furthermore, as discussed under Impact 3.1-1, the proposed Specific Plan includes design guidelines that pertain to building form, building materials, landscaping, and screening in order to minimize impacts from future development on the existing visual character of the environment and to enhance visual harmony with the surrounding landscape. For more details on the proposed project's consistency with the 2040 General Plan goals and policies, please refer to Section 3.9, *Land Use and Planning* of this PEIR.

The proposed Specific Plan would implement ECI land use, as designated in the 2040 General Plan and the IL-O zoning district. Future development within the Plan Area would be required to conform to the 2040 General Plan, Pittsburg Municipal Code, and proposed Specific Plan development standards and design guidelines, thereby, subsequent development under the proposed Specific Plan would not conflict with zoning or other regulations governing scenic quality and would not result in substantial degradation of the Plan Area's visual character. Therefore, **no impact** would occur, and no mitigation is required.

Impact 3.1-4: Create a new source of substantial light or glare which would adversely affect day or nighttime views in the area (Less than Significant)

As previously described, sources of light and glare are predominantly from urban areas north of the Plan Area. The Plan Area is currently vacant and is occupied by vegetation and mature trees. Existing sources of light and glare do not exist in the Plan Area and are minimal in the immediate vicinity.

Future buildout of the Plan Area would introduce new sources of light and increase the amount of daytime glare. The two primary sources of new lighting from future development would be generated from light emanating from building interiors and light from exterior sources. Exterior sources could include exterior building illumination, parking lot lighting, security lighting, and landscape lighting. This exterior lighting would be present throughout the Plan Area and is likely to stay on throughout the night to ensure worker safety and security. New sources of light can be a nuisance to nearby residential areas and can diminish the clear night sky's view. Although future development would add new sources of light, adherence to PMC Section 18.82.030 (Glare) and implementation of the following proposed Specific Plan guidelines and policies would minimize the potential impact.

- **Maintaining Dark Sky:** Using fixtures that comply with dark sky principles and minimizing light pollution by preserving natural night sky will help maintain dark sky conditions. Best practices that help in maintaining dark sky and reducing glare include but is not limited to usage of:
 - Lower lumen output luminaires and lower illuminance;
 - Luminaires that spread luminance or brightness over an appropriate area;
 - Luminaires with less optical punch and less sharp cutoff in candlepower and

- Luminaires delivering warmer color light (usually lower than 4000K, and often below 3000K CCT).
- **Downward directed/shielded lighting:** All lighting used in the Plan Area is required to be directed and/or shielded to prevent the light from adversely affecting adjacent properties, and no structures or features that create adverse glare effects are permitted.
- **Maximum luminaire height:** The maximum permitted height of luminaires shall not exceed a height of 14 feet when there is no cutoff involved. If a ninety degree or greater cutoff is enacted, the maximum height shall not exceed that of 24 feet. Anything less than ninety degrees of cutoff, the maximum height of luminaire shall be 30 feet.
- **Nighttime lighting:** All parking facilities developed shall be provided with nighttime security lighting and designed to confine emitted light to the parking areas per Section 18.78.050(F).
- **Incorporating Motion Sensors and Emergency Lighting:** Incorporation of motion sensors or smart lighting in rest areas or areas that have more infrequent usage to optimize energy efficiency. Inclusion of emergency lighting at key points such as areas with potential hazards.

Section 4.2 of the proposed Specific Plan includes guidelines on the materials, colors, and textures of buildings/structures in the Plan Area. As described in Section 4.2 of the proposed Specific Plan, the primary exterior color of buildings shall be light and warm tones. Additionally, future development would use a variety of non-reflective building materials for building façades and screening materials. Although some new reflective materials, such as windows, would be introduced to the Plan Area, future development would not create a new source of glare, which would result in an adverse impact.

Given, all future development within the Plan Area is required to adhere to the design guidelines and development standards identified in the Specific Plan, and all applicable Building Code standards new sources of substantial light or glare would not adversely affect views in the area. Therefore, impacts would be **less than significant**, and no mitigation is required.

This section of the Program Environmental Impact Report (PEIR) identifies and analyzes the Pittsburg Technology Park Specific Plan's (proposed Specific Plan; proposed project) potential air quality impacts within the City of Pittsburg (City). This analysis is based on buildout of future development, as modeled generally using the California Emissions Estimator Model (CalEEMod), and trip generation provided in the Transportation Impact Analysis prepared for the project. The operational criteria air pollutant emissions modeling results for are included in Appendix D.

The primary sources of data referenced for this section are derived from the following:

- Pittsburg Technology Park Air Emissions Calculations (Ramboll, 2024; Appendix D).
- Pittsburg Technology Park Specific Plan Transportation Assessment (Fehr and Peers, April 2024; Appendix K).
- Association of Bay Area Governments, Metropolitan Transportation Commission, 2021. Draft Plan Bay Area 2050 Regional Transportation Plan (RTP)/ Sustainable Communities Strategy (SCS) Environmental Impact Report. State Clearinghouse No. 2020090519. June.
- Bay Area Air Quality Management District. 2017. Bay Area 2017 Clean Air Plan. Adopted April 19, 2017.
- Bay Area Air Quality Management District, 2022a. CEQA Air Quality Guidelines. April.
- Bay Area Air Quality Management District. 2022b. Community Air Risk Evaluation Program. April 15.
- Bay Area Air Quality Management District. 2022c. Justification Report: CEQA Thresholds for Evaluating the Significance of Climate Impacts From Land Use Projects and Plans. April.
- Bay Area Air Quality Management District. 2022d. Stationary Source Screening Map.
- Metropolitan Transportation Commission, 2006. Bay Area Regional Rail Plan Technical Memorandum 4a: Conditions, Configuration & Traffic on Existing System. November 15.
- Pittsburg 2040 General Plan Draft Environmental Impact Report. December 2023.

3.2.1 ENVIRONMENTAL SETTING

The Bay Area Air Quality Management District (BAAQMD) is the regional air quality agency for the San Francisco Bay Area Air Basin (SFBAAB), which comprises all of Alameda, Contra Costa, Marin, Napa, San Francisco, San Mateo, and Santa Clara counties, the southern portion of Sonoma, and the southwestern portion of Solano County. Air quality in this area is determined by such natural factors as topography, meteorology, and climate, in addition to the presence of existing air pollution sources and ambient conditions. These factors along with applicable regulations are discussed below.

CLIMATE, TOPOGRAPHY, AIR POLLUTION POTENTIAL

Air quality in the SFBAAB is determined by such natural factors as topography, meteorology, and climate, in addition to the presence of existing air pollution sources and ambient conditions. These factors along with applicable regulations are discussed below.

The SFBAAB is characterized by complex terrain, consisting of coastal mountain ranges, inland valleys, and bays, which distort normal wind flow patterns. The Coast Range splits resulting in a western coast gap, Golden Gate, and an eastern coast gap, Carquinez Strait, which allow air to flow in and out of the SFBAAB and the Central Valley. The Carquinez Strait subregion includes the lowlands bordering the strait to the north and south and includes the area adjoining Suisun Bay and the western part of the Sacramento-San Joaquin Delta as far east as Bethel Island.

Prevailing winds are from the west in the Carquinez Strait. During the summer and fall months, high pressure offshore coupled with low pressure in the Central Valley causes marine air to flow eastward through the Carquinez Strait. The wind is strongest in the afternoon. Afternoon wind speeds of 15 to 20 mph are common throughout the strait region. Annual average wind speeds are 8 mph in Martinez, and 9 to 10 mph further east. Sometimes atmospheric conditions cause air to flow from the east. East winds usually contain more pollutants than the cleaner marine air from the west. In the summer and fall months, this can cause elevated pollutant levels to move into the central SFBAAB through the strait. These high-pressure periods are usually accompanied by low wind speeds, shallow mixing depths, higher temperatures and little or no rainfall.

Summer mean maximum temperatures reach about 90° F. in the subregion. Mean minimum temperatures in the winter are in the high 30's. Temperature extremes are especially pronounced in sheltered areas farther from the moderating effects of the strait itself, e.g. at Fairfield.

Many industrial facilities with significant air pollutant emissions — e.g., chemical plants and refineries — are located within the Carquinez Strait Region. The pollution potential of this area is often moderated by high wind speeds. However, upsets at industrial facilities can lead to short-term pollution episodes, and emissions of unpleasant odors may occur at any time. Receptors downwind of these facilities could suffer more long-term exposure to air contaminants than individuals elsewhere. It is important that local governments and other Lead Agencies maintain buffers zones around sources of air pollution sufficient to avoid adverse health and nuisance impacts on nearby receptors. Areas of the subregion that are traversed by major roadways, e.g. Interstate 80, may also be subject to higher local concentrations of carbon monoxide and particulate matter, as well as certain toxic air contaminants such as benzene.

AMBIENT AIR QUALITY: CRITERIA AIR POLLUTANTS

The California Air Resources Board (CARB) and the U.S. Environmental Protection Agency (USEPA) currently focus on the following air pollutants as indicators of ambient air quality: ozone (O₃), particulate matter (PM), nitrogen dioxide (NO₂), CO, sulfur dioxide (SO₂), and lead. Because these are the most prevalent air pollutants known to be harmful to human health, they are commonly referred to as “criteria air pollutants.” Sources and health effects of the criteria air pollutants are summarized in Table 3.2-1.

TABLE 3.2-1: COMMON SOURCES OF HEALTH EFFECTS FOR CRITERIA AIR POLLUTANTS

POLLUTANTS	SOURCES	HEALTH EFFECTS
Ozone (O ₃)	Atmospheric reaction of organic gases with nitrogen oxides in sunlight	Aggravation of respiratory and cardiovascular diseases; reduced lung function; increased cough and chest discomfort; heart attacks; premature mortality
Fine Particulate Matter (PM ₁₀ and PM _{2.5})	Stationary combustion of solid fuels; construction activities; industrial processes; atmospheric chemical reactions	Reduced lung function; aggravation of respiratory and cardiovascular diseases; increased blood pressure; premature mortality
Nitrogen Dioxide (NO ₂)	Motor vehicle exhaust; high temperature stationary combustion; atmospheric reactions	Aggravation of respiratory illness
Carbon Monoxide (CO)	Incomplete combustion of fuels and other carbon-containing substances, such as motor vehicle exhaust; natural events, such as decomposition of organic matter	Aggravation of some heart diseases; reduced tolerance for exercise; impairment of mental function; birth defects; death at high levels of exposure
Sulfur Dioxide (SO ₂)	Combination of sulfur-containing fossil fuels; smelting of sulfur-bearing metal ore; industrial processes	Aggravation of respiratory diseases; reduced lung function
Lead	Contaminated soil	Behavioral and hearing disabilities in children; nervous system impairment

SOURCE: BAY AREA AIR QUALITY MANAGEMENT DISTRICT, 2017A.

Ozone (O₃), or smog, is not emitted directly into the environment, but is formed in the atmosphere by complex chemical reactions between ROG and NO_x in the presence of sunlight. Exposure to ozone can damage the lungs and aggravate respiratory conditions such as asthma, bronchitis, and emphysema. Motor vehicles and industrial sources are the largest sources of ozone precursors in the Bay Area. Emissions of ozone precursors have been greatly reduced in recent decades. As a result, Bay Area ozone levels and population exposure to harmful levels of smog have decreased substantially. Despite this progress, the Bay Area has not yet fully attained State and federal ozone standards. This is primarily due to the progressively tightened federal ozone standard, but also to the amount of population and economic growth occurring within the Bay Area.

Particulate Matter refers to a wide range of solid or liquid particles in the atmosphere, including smoke, dust, aerosols, and metallic oxides. Respirable particulate matter with an aerodynamic diameter of 10 micrometers or less is referred to as PM₁₀. PM₁₀ is primarily composed of large particles from sources such as road dust, residential wood burning, construction/demolition activities, and emissions from on- and off-road engines. PM_{2.5} includes a subgroup of finer particles that have an aerodynamic diameter of 2.5 micrometers or less. Some particulate matter, such as pollen, is naturally occurring. In the SFBAAB most particulate matter is caused by combustion, factories, construction, grading, demolition, agricultural activities, and motor vehicles. Extended exposure to particulate matter can increase the risk of chronic respiratory disease. PM₁₀ is of concern because it bypasses the body's natural filtration system more easily than larger particles

and can lodge deep in the lungs. PM_{2.5} poses an increased health risk because the particles can deposit deep in the lungs and contain substances that are particularly harmful to human health. Motor vehicles are currently responsible for about half of particulates in the SFBAAB. Wood burning in fireplaces and stoves is another large source of fine particulates.

Nitrogen Dioxide (NO₂) is a reddish-brown gas that is a by-product of combustion processes. Automobiles and industrial operations are the main sources of NO₂. Aside from its contribution to ozone formation, nitrogen dioxide can increase the risk of acute and chronic respiratory disease and reduce visibility. NO₂ may be visible as a coloring component of a brown cloud on high pollution days, especially in conjunction with high ozone levels. Most of the Bay Area's NO₂ comes from on-road motor vehicles. Since the year 2010, the Bay Area has had three exceedances of the national NO₂ standard in 2012, 2015, and 2017 (ABAG, 2021).

Carbon Monoxide (CO) is an odorless, colorless gas. It is formed by the incomplete combustion of fuels. The single largest source of CO in the SFBAAB is motor vehicles. Emissions are highest during cold starts, hard acceleration, stop-and-go driving, and when a vehicle is moving at low speeds. Findings indicate that CO emissions per mile are lowest at about 45 mph for the average light-duty motor vehicle and begin to increase again at higher speeds. When inhaled at high concentrations, CO combines with hemoglobin in the blood and reduces the oxygen-carrying capacity of the blood. This results in reduced oxygen reaching the brain, heart, and other body tissues. This condition is especially critical for people with cardiovascular diseases, chronic lung disease, or anemia, as well as fetuses. Even healthy people exposed to high CO concentrations can experience headaches, dizziness, fatigue, unconsciousness, and even death.

Sulfur Dioxide (SO₂) is a colorless acid gas with a pungent odor. It has potential to damage materials, and it can have health effects at high concentrations. It is produced by the combustion of sulfur-containing fuels, such as oil, coal, and diesel. SO₂ can irritate lung tissue and increase the risk of acute and chronic respiratory disease. Most of the Bay Area's SO₂ comes from petroleum refineries. Despite these major sources, the overall concentration of SO₂ in the region is low. Over the past 10 years, the Bay Area has not experienced any exceedances of either the national or the State SO₂ standard (ABAG, 2021).

Lead is a metal found naturally in the environment as well as in manufactured products. The major sources of lead emissions have historically been mobile and industrial sources. As a result of the phase-out of leaded gasoline, metal processing is currently the primary source of lead emissions. The highest levels of lead in air are generally found near lead smelters. Other stationary sources are waste incinerators, utilities, and lead-acid battery manufacturers.

In the early 1970s, the USEPA set national regulations to gradually reduce the lead content in gasoline. In 1975, unleaded gasoline was introduced for motor vehicles equipped with catalytic converters. The USEPA banned the use of leaded gasoline in highway vehicles in December 1995. As a result of the USEPA's regulatory efforts to remove lead from gasoline, emissions of lead from mobile sources decreased 89 percent between 1980 and 2010. In the Bay Area, aircraft exhaust and manufacturing are the major sources of lead emissions. Contact with lead-based paint in older buildings and demolition activities are also a health concern in the region (ABAG 2021).

AMBIENT AIR QUALITY STANDARDS AND DESIGNATIONS

Both the USEPA and the CARB have established ambient air quality standards for common pollutants. These ambient air quality standards represent safe levels of contaminants that avoid specific adverse health effects associated with each pollutant.

The federal and California state ambient air quality standards are summarized in Table 3.2-2 for important pollutants. The federal and state ambient standards were developed independently, although both processes attempted to avoid health-related effects. As a result, the federal and state standards differ in some cases.

The U.S. Environmental Protection Agency established new national air quality standards for ground-level ozone and for fine particulate matter in 1997. The 1-hour ozone standard was phased out and replaced by an 8-hour standard of 0.075 parts per million (ppm). Implementation of the 8-hour standard was delayed by litigation but was determined to be valid and enforceable by the U.S. Supreme Court in a decision issued, in February of 2001. In April 2005, the CARB approved a new eight-hour standard of 0.070 ppm and retained the one-hour ozone standard of 0.09 after an extensive review of the scientific literature. The USEPA signed a final rule for the federal ozone eight-hour standard of 0.070 ppm on October 1, 2015, and was effective as of December 28, 2015.

The current federal and state ambient air quality standards and attainment standards are presented in Table 3.2-2.

TABLE 3.2-2: FEDERAL AND STATE AMBIENT AIR QUALITY STANDARDS

<i>POLLUTANT</i>	<i>AVERAGING TIME</i>	<i>FEDERAL PRIMARY STANDARD</i>	<i>STATE STANDARD</i>
Ozone	1-Hour	--	0.09 ppm
	8-Hour	0.070 ppm	0.070 ppm
Carbon Monoxide	8-Hour	9.0 ppm	9.0 ppm
	1-Hour	35.0 ppm	20.0 ppm
Nitrogen Dioxide	Annual	0.053 ppm	0.03 ppm
	1-Hour	0.100 ppm	0.18 ppm
Sulfur Dioxide	Annual	0.03 ppm	--
	24-Hour	0.14 ppm	0.04 ppm
	1-Hour	0.075 ppm	0.25 ppm
PM ₁₀	Annual	--	20 ug/m ³
	24-Hour	150 ug/m ³	50 ug/m ³
PM _{2.5}	Annual	9 ug/m ³	12 ug/m ³
	24-Hour	35 ug/m ³	--
Lead	30-Day Avg.	--	1.5 ug/m ³
	3-Month Avg.	0.15 ug/m ³	--

SOURCE: CALIFORNIA AIR RESOURCES BOARD, 2024A, US EPA 2024A.

NOTES: PPM = PARTS PER MILLION, $\mu\text{G}/\text{M}^3$ = MICROGRAMS PER CUBIC METER

Monitoring Data

BAAQMD operates a regional air quality monitoring network that regularly measures the concentrations of the five major criteria air pollutants. Air quality conditions in the SFBAAB have improved significantly since the BAAQMD was created in 1955. Ambient concentrations and the number of days on which the region exceeds standards have declined dramatically. Neither federal nor state ambient air quality standards have been violated in recent decades for NO₂, SO₂, sulfates, lead, hydrogen sulfide, and vinyl chloride.

The CARB maintains air quality monitoring stations throughout California. Table 3.2-3 provides the aggregated statistics obtained from the monitoring sites in Contra Costa County, between 2020 and 2022, for ozone (1-hour and 8-hour), PM₁₀, and PM_{2.5}.

TABLE 3.2-3: AMBIENT AIR QUALITY MONITORING DATA (CONTRA COSTA COUNTY)

POLLUTANT	CALIFORNIA	FEDERAL	YEAR	DAYS EXCEEDED STATE/FEDERAL STANDARD
	PRIMARY STANDARD			
Ozone (O ₃) (1-hour)	0.09 ppm for 1 hour	NA	2020 2021 2022	2 / 0 1 / 0 0 / 0
Ozone (O ₃) (8-hour)	0.07 ppm for 8 hour	0.07 ppm for 8 hour	2020 2021 2022	3/ 3 4 /4 2 / 1
Particulate Matter (PM ₁₀)	50 µg/m ³ for 24 hours	150 µg/m ³ for 24 hours	2020 2021 2022	5.7 / 11.5 0/0 0 / 0
Fine Particulate Matter (PM _{2.5})	No 24 hour State Standard	35 ug/33 for 24 hours	2020 2021 2022	16.2 / 16.2 2.0 / 2.0 1.0/ 1.0

SOURCE: CALIFORNIA AIR RESOURCES BOARD (ADAM) AIR QUALITY DATA STATISTICS, 2024b.
[HTTPS://WWW.ARB.CA.GOV/ADAM/](https://www.arb.ca.gov/adam/).

NOTES: PPM = PARTS PER MILLION; µG/M³ = MICRONS PER CUBIC METER; NA= NOT APPLICABLE

EMISSIONS INVENTORY

The BAAQMD estimates emissions of criteria air pollutants from approximately nine hundred source categories. The estimates are based on BAAQMD permit information for stationary sources (e.g., manufacturing industries, refineries, dry-cleaning operations), plus more generalized estimates for area sources (e.g., space heating, landscaping activities, use of consumer products) and mobile sources (e.g., trains, ships and planes, as well as on-road and off-road motor vehicles).

AMBIENT AIR QUALITY: TOXIC AIR CONTAMINANTS

In addition to the criteria air pollutants listed above, another group of pollutants, commonly referred to as toxic air contaminants (TACs) or hazardous air pollutants can result in health effects that can be quite severe. Many TACs are confirmed or suspected carcinogens or are known or suspected to cause birth defects or neurological damage. Additionally, many TACs can be toxic at very low

concentrations. For some chemicals, such as carcinogens, there are no thresholds below which exposure can be considered risk-free.

Industrial facilities and mobile sources are significant sources of TACs; however, there are additional sources of TACs beyond these sources. Various common urban facilities also produce TAC emissions, such as gasoline stations (benzene), hospitals (ethylene oxide), and dry cleaners (perchloroethylene). Automobile exhaust also contains TACs such as benzene and 1,3-butadiene. Diesel particulate matter (PM) has also been identified as a TAC by CARB. Diesel PM differs from other TACs in that it is not a single substance, but rather a complex mixture of hundreds of substances. BAAQMD research indicates that mobile-source emissions of diesel PM, benzene, and 1,3-butadiene represent a substantial portion of the ambient background risk from TACs in the SFBAAB.

Sensitive receptors, which include children, the sick, and the elderly, may be especially impacted by TACs. Health risks from diesel PM are highest in areas of concentrated emissions, such as near ports, rail yards, freeways, or warehouse distribution centers. According to CARB, diesel engine emissions are responsible for the majority of California's known cancer risk from outdoor air pollutants. Those most vulnerable are children, whose lungs are still developing, and the elderly, who may have other serious health problems. Based on numerous studies, CARB has also stated that diesel PM is a contributing factor for premature death from heart and/or lung diseases. In addition, diesel PM reduces visibility and is a strong absorber of solar radiation that contributes to global warming.

According to CARB, levels of toxic air pollutants have decreased significantly with the adoption of airborne toxic control measures, stringent vehicle standards, requirements for low-emission vehicles, and cleaner fuels. As a result of these measures, more than 30,000 facilities in California have reduced their toxic emissions. This has led to the reduction of ambient cancer risk in California by about 80 percent since 1990. Several communities also have established community emission reduction plans that outline actions that stationary facilities and mobile sources can take to further reduce harmful air pollutants.

ODORS

Typically, odors are regarded as an annoyance rather than a health hazard. However, manifestations of a person's reaction to foul odors can range from psychological (e.g., irritation, anger, or anxiety) to physiological (e.g., circulatory and respiratory effects, nausea, vomiting, and headache).

With respect to odors, the human nose is the sole sensing device. The ability to detect odors varies considerably among the population and overall is quite subjective. Some individuals have the ability to smell minute quantities of specific substances; others may not have the same sensitivity but may have sensitivities to odors of other substances. In addition, people may have different reactions to the same odor; in fact, an odor that is offensive to one person (e.g., from a fast-food restaurant) may be perfectly acceptable to another.

It is also important to note that an unfamiliar odor is more easily detected and is more likely to cause complaints than a familiar one. This is because of the phenomenon known as odor fatigue, in which

a person can become desensitized to almost any odor and recognition only occurs with an alteration in the intensity.

When an odorous sample is progressively diluted, the odorant concentration decreases. As this occurs, the odor intensity weakens and eventually becomes so low that the detection or recognition of the odor is quite difficult. At some point during dilution, the concentration of the odorant reaches a detection threshold. An odorant concentration below the detection threshold means that the concentration in the air is not detectable by the average human.

SENSITIVE RECEPTORS

Sensitive receptors are considered land uses or other types of population groups that are more sensitive to air pollution than others due to their exposure. Sensitive population groups include children, the elderly, the acutely and chronically ill, and those with cardio-respiratory diseases. For CEQA purposes, a sensitive receptor would be a location where a sensitive individual could remain for 24-hours or longer, such as residences, hospitals, and schools (etc.).

The nearest sensitive receptors are the single-family residences located north of the Plan Area along Golf Club Road. Each sensitive receptor and proximity to the Plan Area are listed in Table 3.2-4.

TABLE 3.2-4: SENSITIVE RECEPTORS

<i>DESCRIPTION</i>	<i>PROXIMITY TO PLAN AREA</i>
<i>Residential</i>	
Low Density Residential	Adjacent to Plan Area, on Golf Club Road
Low Density Residential	85 feet northwest, on West Leland Road
Low Density Residential	800 feet east, and west of Crestview Drive
Low Density Residential	800+ feet west of Plan Area
<i>Schools</i>	
Ranch Medanos Junior High School	640 feet north on Range Road
<i>Churches</i>	
Church of Jesus Christ of Latter-day Saints	200 feet north of the site, on Golf Club Road
<i>Parks</i>	
John Henry Johnson Park	250 feet to the west, across West Leland Road
Proposed Park	Adjacent to Plan Area, 80 feet from westernmost corner of Phase II

3.2.2 REGULATORY SETTING

Air quality, with respect to criteria air pollutants and TACs within the SFBAAB, is regulated by such agencies as the BAAQMD, CARB, and the USEPA. Each of these agencies develops rules, regulations, policies, and/or goals to attain the goals or directives imposed through legislation. Although the USEPA regulations may not be superseded, both state and local regulations may be more stringent.

FEDERAL

Clean Air Act

The Federal Clean Air Act (FCAA) was first signed into law in 1970. In 1977, and again in 1990, the law was substantially amended. The FCAA is the foundation for a national air pollution control effort, and it is composed of the following basic elements: National Ambient Air Quality Standards (NAAQS) for criteria air pollutants, hazardous air pollutant standards, state attainment plans, motor vehicle emissions standards, stationary source emissions standards and permits, acid rain control measures, stratospheric ozone protection, and enforcement provisions.

The USEPA is responsible for administering the FCAA. The FCAA requires the USEPA to set NAAQS for several problem air pollutants based on human health and welfare criteria. Two types of NAAQS were established: primary standards, which protect public health (with an adequate margin of safety, including for sensitive populations such as children, the elderly, and individuals suffering from respiratory diseases), and secondary standards, which protect the public welfare from non-health-related adverse effects such as visibility reduction.

NAAQS standards define clean air and represent the maximum amount of pollution that can be present in outdoor air without any harmful effects on people and the environment. Existing violations of the ozone and PM_{2.5} ambient air quality standards indicate that certain individuals exposed to these pollutants may experience certain health effects, including increased incidence of cardiovascular and respiratory ailments.

NAAQS standards have been designed to accurately reflect the latest scientific knowledge and are reviewed every five years by a Clean Air Scientific Advisory Committee (CASAC), consisting of seven members appointed by the USEPA administrator. Reviewing NAAQS is a lengthy undertaking and includes the following major phases: Planning, Integrated Science Assessment (ISA), Risk/Exposure Assessment (REA), Policy Assessment (PA), and Rulemaking. The process starts with a comprehensive review of the relevant scientific literature. The literature is summarized, and conclusions are presented in the ISA. Based on the ISA, USEPA staff perform a risk and exposure assessment, which is summarized in the REA document. The third document, the PA, integrates the findings and conclusions of the ISA and REA into a policy context, and provides lines of reasoning that could be used to support retention or revision of the existing NAAQS, as well as several alternative standards that could be supported by the review findings. Each of these three documents is released for public comment and public peer review by CASAC. Members of CASAC are appointed by the USEPA Administrator for their expertise in one or more of the subject areas covered in the ISA. The committee's role is to peer review the NAAQS documents, ensure that they reflect the thinking of the scientific community, and advise the Administrator on the technical and scientific aspects of standard setting. Each document goes through two to three drafts before CASAC deems it to be final.

Although there is some variability among the health effects of the NAAQS pollutants, each has been linked to multiple adverse health effects including, among others, premature death, hospitalizations, and emergency department visits for exacerbated chronic disease, and increased

symptoms such as coughing and wheezing. NAAQS standards were last revised for each of the six criteria pollutants as listed below, with detail on what aspects of NAAQS changed during the most recent update:

- Ozone: On October 1, 2015, the USEPA lowered the national eight-hour standard from 0.075 ppm to 0.070 ppm, providing for a more stringent standard consistent with the current California State standard.
- CO: In 2011, the primary standards were retained from the original 1971 level, without revision.
- NO₂: The national NO₂ standard was most recently revised in 2010 following an exhaustive review of new literature pointed to evidence for adverse effects in asthmatics at lower NO₂ concentrations than the existing national standard.
- SO₂: On June 2, 2010, a new 1-hour SO₂ standard was established, and the existing 24-hour and annual primary standards were revoked. To attain the 1-hour national standard, the 3-year average of the annual 99th percentile of the 1-hour daily maximum concentrations at each site must not exceed 75 ppb.
- PM: the national annual average PM_{2.5} standard was most recently revised in 2012 following an exhaustive review of new literature pointed to evidence for increased risk of premature mortality at lower PM_{2.5} concentrations than the existing standard.
- Lead: The national standard for lead was revised on October 15, 2008, to a rolling 3-month average. In 2016, the primary and secondary standards were retained.

The law recognizes the importance for each state to locally carry out the requirements of the FCAA, as special consideration of local industries, geography, housing patterns, etc., are needed to have full comprehension of the local pollution control problems. As a result, the USEPA requires each state to develop a State Implementation Plan (SIP) that explains how each state will implement the FCAA within their jurisdiction. A SIP is a collection of rules and regulations that a particular state will implement to control air quality within their jurisdiction. The CARB is the state agency that is responsible for preparing and implementing the California SIP.

Federal Hazards Air Pollutants Program

The 1977 FCAA Amendments required the USEPA to identify National Emissions Standards for Hazardous Air Pollutants (NESHAPs) to protect the public health and welfare. Hazardous air pollutants include certain volatile organic compounds (VOCs), pesticides, herbicides, and radionuclides that present a tangible hazard, based on scientific studies of exposure to humans and other mammals. Under the 1990 FCAA Amendments, which expanded the control program for hazardous air pollutants, 189 substances and chemical families were identified as hazardous air pollutants.

Federal Heavy-duty Engines and Vehicles Fuel Efficiency Standards

In 2010, President Obama issued a memorandum directing federal agencies to establish additional standards regarding fuel efficiency and greenhouse gas (GHG) reduction, clean fuels, and advanced vehicle infrastructure. In response to this directive, the USEPA and National Highway Traffic Safety

Administration (NHTSA) proposed stringent, coordinated federal GHG and fuel economy standards, for model year 2017–2025 light-duty vehicles. The proposed standards are projected to achieve 163 grams/mile of CO₂ in model year 2025, on an average industry fleet-wide basis, which is equivalent to 54.5 miles per gallon (mpg) if this level were achieved solely through fuel efficiency. The final rule was adopted in 2012, for model years 2017–2021, and standards for model years 2022–2025 were adopted in 2018.

In addition to the regulations applicable to cars and light-duty trucks described above, in 2011, the USEPA and NHTSA announced fuel economy and GHG standards for medium- and heavy-duty trucks, for model years 2014–2018. The standards for CO₂ emissions and fuel consumption are tailored to three main vehicle categories: combination tractors, heavy-duty pickup trucks and vans, and vocational vehicles.

In August 2016, the USEPA and NHTSA announced the adoption of the phase two program related to the fuel economy and GHG standards for medium- and heavy-duty trucks. The phase two program will apply to vehicles with model year 2018 through 2027, for certain trailers, and model years 2021 through 2027, for semi-trucks, large pickup trucks, vans and all types of sizes of buses and work trucks. The final standards are expected to lower CO₂ emissions by approximately 1.1 billion metric tons (MT) and reduce oil consumption by up to two billion barrels over the lifetime of the vehicles sold under the program (USEPA and NHTSA 2016).

In August 2017, the USEPA asked for additional information and data relevant to assessing whether the GHG emissions standards, for model years 2022–2025, remain appropriate. In early 2018, the USEPA Administrator announced that the midterm evaluation for the GHG emissions standards for cars and light-duty trucks, for model years 2022–2025, was completed and stated his determination that the current standards should be revised in light of recent data. Subsequently, in April 2018, the USEPA and NHTSA proposed to amend certain existing Corporate Average Fuel Economy (CAFE) standards for passenger cars and light trucks and establish new standards, covering model years 2022–2025. Compared to maintaining the post-2020 standards now in place, the pending proposal would increase U.S. fuel consumption (NHTSA 2022). California and other states have announced their intent to challenge federal actions that would delay or eliminate GHG reductions. In April 2020, NHTSA and USEPA amended CAFE and GHG emissions standards for passenger cars and light trucks and established new less stringent standards, covering model years 2021 through 2026.

On September 27, 2019, the USEPA and NHTSA published the SAFE Rule (Part One) (USEPA and NHTSA 2019). The SAFE Rule (Part One) went into effect in November 2019, and revoked California's authority to set its own GHGs standards and set zero emission vehicle mandates in California. The SAFE Rule (Part One) freezes new zero emission vehicles (ZEV) sales at model year 2020 levels for year 2021 and beyond and will likely result in a lower number of future ZEVs and a corresponding greater number of future gasoline internal combustion engine vehicles. In response to the USEPA's adoption of the SAFE Rule (Part One), CARB has issued guidance regarding the adjustment of vehicle emissions factors to account for the rule's implications on criteria air pollutant and GHG emissions. The SAFE Rule is subject to ongoing litigation and on February 8, 2021, the D.C. Circuit Court of Appeals granted the Biden Administration's motion to stay litigation over SAFE Rule (Part 1). On April 22 and April 28, 2021, respectively, NHTSA and USEPA formally announced their intent to reconsider

the Safe Rule (Part One). In August 2021, USEPA proposed to revise existing national GHG emissions standards for passenger cars and light trucks, for model years 2023- 2026, to make the standards more stringent. On August 5, 2021, USEPA announced plans to reduce GHG emissions and other harmful air pollutants from heavy-duty trucks through a series of rulemakings over the next three years. The first rulemaking will apply to heavy-duty vehicles, starting in model year 2027, and will set new standards for criteria pollutants for the entire sector as well as targeted updates to the current GHG emissions standards.

Transportation Conformity

Transportation conformity requirements were added to the FCAA in the 1990 amendments, and the USEPA adopted implementing regulations in 1997. See Section 176 of the FCAA (42 U.S.C. Section 7506) and 40 CFR Part 93, Subpart A. Transportation conformity serves much the same purpose as general conformity: it ensures that transportation plans, transportation improvement programs, and projects that are developed, funded, or approved by the United States Department of Transportation or that are recipients of funds under the Federal Transit Act or from the Federal Highway Administration, conform to the SIP as approved or promulgated by USEPA.

Currently, transportation conformity applies in nonattainment areas and maintenance areas (maintenance areas are those areas that were in nonattainment that have been redesignated to attainment, under the FCCA). Under transportation conformity, a determination of conformity with the applicable SIP must be made by the agency responsible for the project, such as the Metropolitan Planning Organization, the Council of Governments, or a federal agency. The agency making the determination is also responsible for all the requirements relating to public participation. Generally, a project will be considered in conformance if it is in the transportation improvement plan and the transportation improvement plan is incorporated in the SIP. If an action is covered under transportation conformity, it does not need to be separately evaluated under general conformity.

Transportation Control Measures

One particular aspect of the SIP development process is the consideration of potential control measures as a part of making progress towards clean air goals. While most SIP control measures are aimed at reducing emissions from stationary sources, some are typically also created to address mobile or transportation sources. These are known as transportation control measures (TCMs). TCM strategies are designed to reduce vehicle miles traveled and trips, or vehicle idling and associated air pollution. These goals are achieved by developing attractive and convenient alternatives to single-occupant vehicle use. Examples of TCMs include ridesharing programs, transportation infrastructure improvements such as adding bicycle and carpool lanes, and expansion of public transit.

STATE

California Clean Air Act

The California Legislature enacted the California Clean Air Act (CCAA) in 1988, to address air quality issues of concern not adequately addressed by the FCAA at the time. California's air quality problems

were and continue to be some of the most severe in the nation and required additional actions beyond the federal mandates. CARB administers California Ambient Air Quality Standards (CAAQS) for the 10 air pollutants designated in the CCAA. The 10 state air pollutants are the six criteria pollutants subject to federal standards listed above, as well as visibility reducing particulates, hydrogen sulfide, sulfates, and vinyl chloride. The USEPA authorized California to adopt its own regulations for motor vehicles and other sources that are more stringent than similar regulations implementing the FCAA. Generally, the planning requirements of the FCAA are less stringent than the CCAA; therefore, consistency with the CCAA will also demonstrate consistency with the FCAA.

CARB Mobile-Source Regulation

The State of California is responsible for controlling emissions from the operation of motor vehicles in the state. Rather than mandating the use of specific technology or the reliance on a specific fuel, CARB motor vehicle standards specify the allowable grams of pollution per mile driven. In other words, the regulations focus on the reductions needed rather than on the manner in which they are achieved. Towards this end, the CARB has adopted regulations that require auto manufacturers to phase in less-polluting vehicles.

CARB Air Quality and Land Use Handbook

CARB's *Air Quality and Land Use Handbook: A Community Health Perspective* (CARB and CalEPA 2005) addresses the importance of considering health risk issues when siting sensitive land uses, including residential development, in the vicinity of intensive air pollutant emission sources including freeways or high-traffic roads, distribution centers, ports, petroleum refineries, chrome plating operations, dry cleaners, and gasoline dispensing facilities. The CARB Handbook draws upon studies evaluating the health effects of traffic traveling on major interstate highways in metropolitan California centers within Los Angeles (Interstate [I] 405 and I-710), the San Francisco Bay, and San Diego areas. The recommendations identified by CARB, including siting residential uses a minimum of 500 feet from freeways or other high-traffic roadways, are consistent with those adopted by the state for location of new schools. Specifically, the CARB Handbook recommends, "Avoid siting new sensitive land uses within 500 feet of a freeway, urban roads with 100,000 vehicles/day, or rural roads with 50,000 vehicles/day."

California Air Quality Standards

Although NAAQS are determined by the US. EPA, states have the ability to set standards that are more stringent than the federal standards. As such, California established more stringent ambient air quality standards. Federal and state ambient air quality standards have been established for ozone, CO, NO₂, SO₂, PM₁₀, and lead. In addition, California has created standards for pollutants that are not covered by federal standards. Although there is some variability among the health effects of the CAAQS pollutants, each has been linked to multiple adverse health effects including, among others, premature death, hospitalizations, and emergency department visits for exacerbated chronic disease, and increased symptoms such as coughing and wheezing. The existing state and federal primary standards for major pollutants are shown in Table 3.2-2.

Air quality standard setting in California commences with a critical review of all relevant peer-reviewed scientific literature. The Office of Environmental Health Hazard Assessment (OEHHA) uses the review of health literature to develop a recommendation for the standard. The recommendation can be for no change or can recommend a new standard. The review, including the OEHHA recommendation, is summarized in a document called the draft Initial Statement of Reasons (ISOR), which is released for comment by the public, and also for public peer review by the Air Quality Advisory Committee (AQAC). AQAC members are appointed by the President of the University of California for their expertise in the range of subjects covered in the ISOR, including health, exposure, air quality monitoring, atmospheric chemistry and physics, and effects on plants, trees, materials, and ecosystems. AQAC provides written comments on the draft ISOR. CARB staff next revises the ISOR based on comments from AQAC and the public. The revised ISOR is then released for a 45-day public comment period prior to consideration by the CARB at a regularly scheduled CARB hearing.

In June of 2002, CARB adopted revisions to the PM₁₀ standard and established a new PM_{2.5} annual standard. The new standards became effective in June 2003. Subsequently, staff reviewed the published scientific literature on ground-level ozone and NO₂, and the CARB adopted revisions to the standards for these two pollutants. Revised standards for ozone and NO₂ went into effect on May 17, 2006, and March 20, 2008, respectively. These revisions reflect the most recent changes to the CAAQS.

SENATE BILL 535

California's most pollution burdened communities, or otherwise known as disadvantaged communities (DACs), are specifically targeted for investments from the state's Cap-and-Trade program to improve public health, quality of life, and economic opportunity. Senate Bill 535 (SB 535) established the requirements for minimum funding and designated CalEPA as the responsible agency for identifying these communities. CalEPA utilizes CalEnviroScreen 4.0 to map indicators that reflect environmental conditions or a population's vulnerability to environmental pollutants. In May of 2022, CalEPA designated four categories of geographic areas as disadvantaged as follows:

1. Census tracts receiving the highest 25 percent of overall scores in CalEnviroScreen 4.0 .
2. Census tracts lacking overall scores in CalEnviroScreen 4.0 due to data gaps, but receiving the highest 5 percent of CalEnviroScreen 4.0 cumulative pollution burden scores (19 tracts).
3. Census tracts identified in the 2017 DAC designation as disadvantaged, regardless of their scores in CalEnviroScreen 4.0 (307 tracts).
4. Lands under the control of federally recognized Tribes. For purposes of this designation, a Tribe may establish that a particular area of land is under its control even if not represented as such on CalEPA's DAC map and therefore should be considered a DAC by requesting a consultation with the CalEPA Deputy Secretary for Environmental Justice, Tribal Affairs and Border Relations at TribalAffairs@calepa.ca.gov.

Tanner Air Toxics Act (TACs)

California regulates TACs primarily through the Tanner Air Toxics Act (AB 1807) and the Air Toxics Hot Spots Information and Assessment Act of 1987 (AB 2588). The Tanner Air Toxics Act sets forth a

formal procedure for CARB to designate substances as TACs. This includes research, public participation, and scientific peer review before CARB can designate a substance as a TAC. To date, CARB has identified more than 21 TACs and has adopted USEPA's list of Hazardous Air Pollutants (HAPs) as TACs. Most recently, diesel PM was added to the CARB list of TACs. Once a TAC is identified, CARB then adopts an Airborne Toxics Control Measure (ATCM) for sources that emit that particular TAC. If there is a safe threshold for a substance at which there is no toxic effect, the control measure must reduce exposure below that threshold. If there is no safe threshold, the measure must incorporate Best Available Control Technologies (BACT) to minimize emissions.

Toxic Air Contaminants Health Effects

A toxic air contaminant (TAC) is defined as an air pollutant that may cause or contribute to an increase in mortality or serious illness, or that may pose a hazard to human health. TACs are usually present in minute quantities in the ambient air; however, their high toxicity or health risk may pose a threat to public health even at low concentrations. The California Almanac of Emissions and Air Quality presents the relevant concentration and cancer risk data for the 10 TACs that pose the most substantial health risk in California based on available data. The 10 TACs are acetaldehyde, benzene, 1,3-butadiene, carbon tetrachloride, hexavalent chromium, para-dichlorobenzene, formaldehyde, methylene chloride, perchloroethylene, and diesel particulate matter (DPM).

Some studies indicate that DPM poses the greatest health risk among the TACs listed above. A 10-year research program demonstrated that DPM from diesel-fueled engines is a human carcinogen and that chronic (long-term) inhalation exposure to DPM poses a chronic health risk. In addition to increasing the risk of lung cancer, exposure to diesel exhaust can have other health effects. Diesel exhaust can irritate the eyes, nose, throat, and lungs, and it can cause coughs, headaches, lightheadedness, and nausea. Diesel exhaust is a major source of fine particulate pollution as well, and studies have linked elevated particle levels in the air to increased hospital admissions, emergency room visits, asthma attacks, and premature deaths among those suffering from respiratory problems.

DPM differs from other TACs in that it is not a single substance, but a complex mixture of hundreds of substances. Although DPM is emitted by diesel-fueled, internal combustion engines, the composition of the emissions varies, depending on engine type, operating conditions, fuel composition, lubricating oil, and whether an emission control system is present. Unlike the other TACs, however, no ambient monitoring data are available for DPM, because no routine measurement method currently exists. CARB has made preliminary concentration estimates based on a DPM exposure method. This method uses the CARB emissions inventory's PM₁₀ database, ambient PM₁₀ monitoring data, and the results from several studies to estimate concentrations of DPM.

Transportation Control Measures

The SIP describes the infrastructure (i.e., authorities, resources, and programs) California has in place to implement, maintain, and enforce the NAAQS. One particular aspect of the development process is the consideration of potential control measures as a part of making progress towards clean air goals. While most SIP control measures are aimed at reducing emissions from stationary

sources, some are typically also created to address mobile or transportation sources. These are known as TCMs, which are strategies designed to reduce vehicle miles traveled and trips or vehicle idling and associated air pollution. These goals are achieved by developing attractive and convenient alternatives to single-occupant vehicle use. Examples of TCMs include ridesharing programs, transportation infrastructure improvements such as adding bicycle and carpool lanes, and expansion of public transit.

Omnibus Low-NO_x Rule

CARB approved the Omnibus Low-NO_x Rule on August 28, 2020, which requires engine NO_x emissions to be cut to approximately 75 percent below current standards beginning in 2024, and 90 percent below current standards in 2027. The rule also places nine additional regulatory requirements on new heavy-duty trucks and engines. Those additional requirements include a 50 percent reduction in PM emissions, stringent new low-load and idle standards, a new in-use testing protocol, extended deterioration requirements, a new California-only credit program, and extended mandatory warranty requirements. The regulatory requirements in the Omnibus Low-NO_x Rule will first become effective in 2024, at the same time as the Advanced Clean Trucks regulations that CARB approved, requiring manufacturers to convert increasing percentages of their heavy-duty trucks sold in California to zero-emission vehicles.

Low Emission Vehicle Program

CARB first adopted Low Emission Vehicle (LEV) program standards in 1990. These first LEV standards ran from 1994 through 2003. LEV II regulations, running from 2004 through 2010, represent continuing progress in emission reductions. As the state's passenger vehicle fleet continues to grow, and more sport utility vehicles and pickup trucks are used as passenger cars rather than work vehicles, the more stringent LEV II standards were adopted to provide reductions necessary for California to meet federally mandated clean air goals outlined in the 1994 SIP. In 2012, CARB adopted the LEV III amendments to California's LEV regulations. These amendments, also known as the Advanced Clean Car Program, include more stringent emission standards, for model years 2017 through 2025, for both criteria pollutants and GHG emissions for new passenger vehicles.

On September 23, 2020, Governor Gavin Newsom issued Executive Order N-79-20, establishing a goal that 100 percent of new passenger cars and trucks sold in California shall be zero-emission by 2035. Executive Order N-79-20 also sets a goal that, where feasible, all operations include zero-emission medium- and heavy-duty trucks by 2045, and drayage trucks by 2035. Off-road vehicles have a goal to transition to 100 percent zero-emission vehicles by 2035, where feasible.

On-Road Heavy-Duty Vehicle Program

CARB has adopted standards for emissions from various types of new on-road heavy-duty vehicles. Section 1956.8, Title 13, California Code of Regulations contains California's emission standards for on-road heavy-duty engines and vehicles, and test procedures. CARB has also adopted programs to reduce emissions from in-use heavy-duty vehicles including the Heavy-Duty Diesel Vehicle Idling Reduction Program, the Heavy-Duty Diesel In-Use Compliance Program, the Public Bus Fleet Rule and Engine Standards, and the School Bus Program and others.

California Air Resources Board Regulation for In-Use Off-Road Diesel Vehicles

On July 26, 2007, CARB adopted a regulation to reduce DPM and NO_x emissions from in-use (existing) off-road heavy-duty diesel vehicles in California. Such vehicles are used in construction, mining, and industrial operations. The regulation limits idling to no more than five consecutive minutes, requires reporting and labeling of the applicable diesel vehicles, and requires disclosure of the regulation upon vehicle sale. CARB is enforcing that part of the rule with fines up to \$10,000 per day for each vehicle in violation. Performance requirements of the rule are based on a fleet's average NO_x emissions, which can be met by replacing older vehicles with newer, cleaner vehicles or by applying exhaust retrofits. The regulation was amended in 2010 to delay the original timeline of the performance requirements, making the first compliance deadline January 1, 2014, for large fleets (over 5,000 horsepower), 2017 for medium fleets (2,501-5,000 horsepower), and 2019 for small fleets (2,500 horsepower or less).

The latest amendments became effective on November 17, 2022. The amended regulation requires the phase-out of the oldest and highest-emitting off-road engines from operation, restricts the addition of vehicles with Tier 3 and 4 engines, requires contracting entities to obtain and retain a fleet's valid Certificate of Reported Compliance prior to awarding a contract or hiring a fleet, mandates the use of R99 or R100 Renewable Diesel for all fleets, provides voluntary compliance flexibility options for fleets that adopt zero-emission technology, and includes additional requirements to increase enforceability, provide clarity, and provide additional flexibility for permanent low-use vehicles.

The regulation applies to nearly all privately and federally owned diesel-fueled trucks and buses and to privately and publicly owned school buses with a gross vehicle weight rating greater than 14,000 pounds. The regulation provides a variety of flexibility options tailored to fleets operating low use vehicles, fleets operating in selected vocations like agricultural and construction, and small fleets of three or fewer trucks.

Diesel Risk Reduction Plan

CARB's Diesel Risk Reduction Plan has led to the adoption of new state regulatory standards for all new on-road, off-road, and stationary diesel-fueled engines and vehicles to reduce DPM emissions by about 90 percent overall from year 2000 levels. The projected emission benefits associated with the full implementation of CARB's Diesel Risk Reduction Plan, including federal measures, are reductions in DPM emissions and associated cancer risks of 75 percent by 2010 and 85 percent by 2020.

REGIONAL AND LOCAL

Bay Area Air Quality Management District

The BAAQMD is responsible for attaining and maintaining air quality conditions in the SFBAAB through a comprehensive program of planning, regulation, enforcement, technical innovation, and promotion of the understanding of air quality issues. The clean air strategy of the BAAQMD includes

the preparation of plans for the attainment of ambient air quality standards, adoption and enforcement of rules and regulations concerning sources of air pollution, and issuance of permits for stationary sources of air pollution. The BAAQMD also inspects stationary sources of air pollution and responds to citizen complaints, monitors ambient air quality and meteorological conditions, and implements programs and regulations required by the FCAA and the CCAA.

The BAAQMD has regulated TACs since the 1980s. At the local level, air pollution control or management districts may adopt and enforce CARB's control measures. Under Regulation 2-1 (General Permit Requirements), Regulation 2-2 (New Source Review), and Regulation 2-5 (New Source Review), all nonexempt sources that possess the potential to emit TACs are required to obtain permits from BAAQMD. Permits may be granted to these operations if they are constructed and operated in accordance with applicable regulations, including new source review standards and air TCMs. The BAAQMD limits emissions and public exposure to TACs through several programs. The BAAQMD prioritizes TAC-emitting stationary sources based on the quantity and toxicity of the TAC emissions and the proximity of the facilities to sensitive receptors. In addition, Regulation 11 Rules 2 and 14 address asbestos demolition renovation, manufacturing, and standards for asbestos containing serpentine.

BAAQMD AIR QUALITY PLANS

As stated above, the BAAQMD prepares plans to attain ambient air quality standards in the SFBAAB. The BAAQMD prepares ozone attainment plans (OAP) for the national ozone standard and clean air plans (CAP) for the California standard both in coordination with the Metropolitan Transportation Commission (MTC) and the Association of Bay Area Governments (ABAG).

With respect to applicable air quality plans, the BAAQMD prepared the 2017 CAP to address nonattainment of the national 1-hour ozone standard in the SFBAAB (BAAQMD 2017b). The 2017 Clean Air Plan is a roadmap for regional efforts to reduce air pollution and protect public health and the global climate. The 2017 Plan identifies potential rules, programs, and strategies to reduce GHG emissions and other harmful air pollutants in the Bay Area. The 2017 CAP complements and supports other important regional and state planning efforts, including Plan Bay Area and the State of California's 2030 Scoping Plan.

The 2017 CAP lays out 85 distinct control measures to decrease fossil fuel combustion, improve energy efficiency, and decrease emissions of potent GHGs and other pollutants. Numerous measures reduce multiple pollutants simultaneously, while others focus on a single type of pollutant – for example, “super-GHGs”, like methane and black carbon.

The goals of the 2017 CAP are to:

1. Protect local air quality and health at the regional and local scale
 - a. Attain all state and national air quality standards
 - b. Eliminate the disparities among Bay Area communities in cancer health risk from toxic air contaminants; and
2. Protect the climate:

- a. Reduce Bay Area GHG emissions 40 percent below 1990 levels by 2030, and 80 percent below 1990 levels by 2050

BAAQMD CEQA GUIDELINES

The BAAQMD most recently published CEQA Air Quality Guidelines (CEQA Guidelines) in 2022, to assist lead agencies in evaluating air quality impacts of projects and plans proposed in the SFBAAB (BAAQMD 2022a). BAAQMD's CEQA Air Quality Guidelines contain instructions on how to evaluate, measure, and mitigate air quality impacts generated for project-level and plan-level activities. The CEQA Air Quality Guidelines focus on criteria air pollutant, GHG, toxic air contaminant, and odor emissions generated from plans or projects. The CEQA Air Quality Guidelines are intended to help lead agencies navigate through the CEQA process and include non-binding recommendations. The CEQA Air Quality Guidelines offer step-by-step procedures for a thorough environmental impact analysis of adverse air emissions in the Bay Area. In 2022, the Air District Board of Directors adopted climate impacts thresholds that center best practices for Environmental Justice, health, and equity.

BAAQMD CARE PROGRAM

The BAAQMD CARE Program aims to identify locations with high toxic emissions and sensitive populations, and to use the information to help BAAQMD establish policies for the use of its incentive funding, regulatory authority, and other programs to reduce toxic emissions in areas with high TAC exposures and sensitive populations.

The goals of the CARE Program are to:

- Identify areas where air pollution contributes most to health impacts and where populations are most vulnerable to air pollution.
- Apply sound scientific methods and strategies to reduce health impacts in these areas.
- Engage community groups and other agencies to develop additional actions to reduce local health impacts.

The Plan Area is not located in an area designated by the CARE Program; therefore, the area is not identified as having air pollution conditions which contribute most to health impacts or where populations are most vulnerable to air pollution.

CALGreen and Building Energy Efficiency Standards

The California Green Building Standards Code (CALGreen) is a set of mandatory green building standards for new construction. CALGreen was first developed by the California Building Standards Commission in an effort to meet the goals of Assembly Bill (AB) 32, which established a comprehensive program of cost-effective reductions of GHGs to 1990 levels by 2020. CALGreen applies to the planning, design, operation, construction, use, and occupancy of every newly constructed building or structure on a statewide basis unless otherwise indicated. Additions and alterations to existing buildings which increase the building's conditioned area, interior volume, or size are also covered by the scope of CALGreen.

The California Building Standards Commission has the authority to propose CALGreen standards for nonresidential structures that include, but are not limited to, new buildings or portions of new buildings, additions and alterations, and all occupancies where no other state agency has the authority to adopt green building standards applicable to those occupancies.

Additionally, effective January 1, 2023, the latest (2022) version of the Title 24, Part 6 Energy Code updates took effect. The 2022 Building Energy Efficiency Standards focus on regulations for energy efficiency, water efficiency and conservation, material conservation and resource efficiency, environmental quality, as well as mandatory provisions for commercial, residential, and public school buildings, and appendices with voluntary provisions for all of these occupancies plus hospitals.

City of Pittsburg 2040 General Plan

The City of Pittsburg 2040 General Plan (2040 General Plan) contains the following goals, policies, and actions pertaining to air quality.

Land Use Element

Action 2-A-4.b: As part of the City's development review process, continue to ensure that employment-generating projects are designed to minimize conflicts with residential uses, sensitive receptors, and disadvantaged communities. Review of employment-generating projects should ensure that the following design concepts are addressed in projects that abut residential areas, sensitive receptors, or disadvantaged communities:

- Appropriate building scale and/or siting;
- Site design and features to protect residential uses and other sensitive receptors, developed or undeveloped, from impacts of non-residential development activities that may cause unwanted nuisances and health risks and to ensure that disadvantaged communities are not exposed to disproportionate environmental or health risks. The site design and features shall be based on best management practices as recommended by CARB, Bay Area Air Quality Management District (BAAQMD), and the California Attorney General;

Action 2-A-4.c: When industrial projects and other high intensity use projects, including warehouse projects, fulfillment centers, and other projects that may generate high volumes

of truck trips and/or air quality emissions are proposed within 1,000 feet of existing or planned residential uses or other sensitive receptors, the City shall require:

1. The preparation of a Health Risk Assessment (HRA) that meets the standards established by the Office of Environmental Health Hazard Assessment (OEHHA, and BAAQMD). Projects shall not be approved until it can be demonstrated that the project would not result in exceedance of the established thresholds of significance for public health risks at nearby sensitive receptors; and
2. The implementation of best management practices (BMPs) to reduce pollution exposure to sensitive receptors, particularly diesel particulate matter (DPM). The appropriate BMPs shall be established on a case-by-case basis, will be based on BMPs recommended by CARB, BAAQMD, and the California Attorney General, including the Warehouse Projects: Best Practices and Mitigation Measures to Comply with the California Environmental Quality Act and Good Neighbor Guidelines for Warehouse Distribution Facilities, and shall consider the following tools, methods, and approaches:
 - Creating physical, structural, and/or vegetative buffers that adequately prevent or substantially reduce pollutant dispersal between warehouses and any areas where sensitive receptors are likely to be present, such as homes, schools, daycare centers, hospitals, community centers, and parks.
 - Providing adequate areas for on-site parking, on-site queuing, and truck check-in that prevent trucks and other vehicles from parking or idling on public streets.
 - Placing facility entry and exit points from the public street away from sensitive receptors, e.g., placing these points on the north side of the facility if sensitive receptors are adjacent to the south side of the facility. Exceptions can be made for emergency vehicle access (EVA) points.
 - Locating warehouse dock doors and other onsite areas with significant truck traffic and noise away from sensitive receptors, e.g., placing these dock doors on the north side of the facility if sensitive receptors are adjacent to the south side of the facility.
 - Screening dock doors and onsite areas with significant truck traffic with physical, structural, and/or vegetative barriers that adequately prevent or substantially reduce pollutant dispersal from the facility towards sensitive receptors.
 - Posting signs clearly showing the designated entry and exit points from the public street for trucks and service vehicles.
 - Posting signs indicating that all parking and maintenance of trucks must be conducted within designated on-site areas and not within the surrounding community or public streets.

Environmental Justice Element

Action 8-A-2.a: Review all development proposals, planning projects, and infrastructure projects to ensure that potential adverse impacts to disadvantaged communities, such as

exposure to pollutants, including toxic air contaminants, and unacceptable levels of noise and vibration are reduced to the extent feasible and that measures to improve quality of life, such as connections to bicycle and pedestrian paths, community services, schools, and recreation facilities, access to healthy foods, and improvement of air quality are included in the project. The review shall address both the construction and operation phases of the project.

Resource Conservation Element

Goal-10-6: Support Federal, State, and regional efforts to reduce air pollution in order to protect human and environmental health and restore air quality in the area to a more healthful level.

Policy 10-P-6.6: Reduce the generation of TACs such as ozone, carbon monoxide, lead, and particulate matter to work toward improving air quality and meeting all Federal and State ambient air quality standards.

Action 10-A-06.h: Avoid siting new sensitive land uses within 500 feet of a freeway, urban roads with 100,000 vehicles/day, or rural roads with 50,000 vehicles/day, consistent with the CARB's Air Quality and Land Use Handbook recommendations, unless a site-specific analysis is conducted to determine the level of TAC and PM_{2.5} exposure would be below the applicable thresholds of significance for individual projects.

Safety Element

Policy 11-P-4.7: Ensure that Bay Area Air Quality Management District requirements are implemented in construction projects to reduce soil and particulate matter transport.

3.2.3 METHODOLOGY AND THRESHOLDS OF SIGNIFICANCE

CEQA requires the lead agency to evaluate individual and cumulative impacts of development projects, and all feasible mitigation measures must be incorporated within the proposed plan to reduce significant air quality impacts.

The BAAQMD CEQA Air Quality Guidelines provide guidance on how to evaluate air quality impacts associated with implementation of long-range plans prepared within the SFBAAB pursuant to CEQA. Air quality impacts from future development pursuant to the proposed Specific Plan can be divided into construction-related impacts and operational-related impacts. Construction-related impacts are associated with construction activities likely to occur in conjunction with future development allowed under the Plan. Operational-related impacts are associated with continued and future operation of developed land uses, including increased vehicle trips and energy use.

METHODOLOGY

Because the proposed Specific Plan does not include a detailed project design at this time (such as a design review request), the proposed Specific Plan was analyzed at a program-level. For purposes of this CEQA analysis, emissions were calculated for the total of the three phases of development with associated variations. Four buildout variations were considered in the air quality modeling in order to generate a conservative estimate of potential future emissions. Details of each of these

variations are included in Appendix D. For purposes of the analysis in the PEIR, the most conservative emissions scenario was used for impact discussion.

Emissions associated with the buildout for each of three phases were evaluated. Emissions from each phase were added together for a buildout scenario to compare to BAAQMD significance thresholds.

Construction activities associated with new land uses proposed under the proposed Specific Plan would result in emissions of fugitive dust from demolition and site grading activities, heavy construction equipment exhaust, and vehicle trips associated with workers commuting to and from the site and trucks hauling materials. Air pollutants generated by the construction of future projects within the Plan Area would vary depending on the type of projects occurring and the size of each project. The exact timing of future development project that could occur under the proposed Specific Plan is unknown.

Sources of operational emissions from Phase I include emergency generators, diesel storage tanks, architectural coatings, consumer products, landscaping, and mobile emissions. Emissions from the emergency generators and diesel storage tanks were calculated using emission factors from the US Environmental Protection Agency's (USEPA) AP-42: Compilation of Air Emissions Factors from Stationary Sources (USEPA 2024b). Emissions from architectural coatings, consumer products, landscaping, and mobile emissions were calculated with the California Emissions Estimator Model (CalEEMod) version 2022.1. Sources of operational emission from Phase II and Phase III included architectural coatings, consumer products, landscaping, building energy use, and mobile emissions, all of which were calculated with CalEEMod.

CalEEMod estimates operational activities based on the area of selected land use types. The inputs used for this analysis include building square footage and vehicle trips are summarized in Appendix D. The emissions modeling performed for the proposed Specific Plan included compliance with BAAQMD rules and regulations (i.e., low-volatile organic compound [VOC] paints, low-VOC cleaning supplies, wood-burning devices), as well as with the California Building Energy Efficiency Standards Code.

CRITERIA POLLUTANT EMISSIONS MODELING

Operational emissions of ROG, NO_x, PM₁₀, and PM_{2.5} would be generated by the proposed Specific Plan from both mobile and stationary sources. Day-to-day activities such as future employee commute trips to and from the Plan Area would make up the majority of the mobile emissions. Stationary source emissions would occur from area sources such as natural gas combustion from heating mechanisms, landscape maintenance equipment exhaust, and consumer products (e.g., deodorants, cleaning products, spray paint, etc.).

The proposed Specific Plan's daily unmitigated operational emissions have been estimated using CalEEMod and AP-42 emission factors. To estimate a conservative emissions scenario, the variation of each phase with the modeled emissions were added together to determine the operational

3.2 AIR QUALITY

emissions from full buildout of the Plan Area, as summarized in Table 3.2-5. All CalEEMod modeling results are included in Appendix D to this PEIR.

TABLE 3.2-5: ESTIMATED FULL BUILDOUT OPERATIONAL EMISSIONS BY PHASE

PHASE		EMISSIONS (TON/YEAR)				EMISSIONS (POUND/DAY)			
		ROG	NO _x	PM ₁₀ TOTAL	PM _{2.5} TOTAL	ROG	NO _x	PM ₁₀ TOTAL	PM _{2.5} TOTAL
Phase 1		3.7	4.6	0.5	0.3	19.9	25.0	2.8	1.4
Phase 2 – Variation B	Manufacturing	2.6	1.2	1.6	0.4	14.4	6.6	8.6	2.5
Phase 3 – Variation B	Manufacturing	2.8	1.3	1.7	0.5	15.2	7.1	9.2	2.6
Full Buildout		9.1	7.1	3.8	1.2	49.5	38.7	20.6	6.5
BAAQMD Significance Threshold		10	10	15	10	54	54	82	54

NOTES: ROG= REACTIVE ORGANIC GASES, NO_x = NITROGEN OXIDES, PM₁₀ = PARTICULATE MATTER LESS THAN 10 MICRONS, PM_{2.5} = PARTICULATE MATTER LESS THAN 2.5 MICRONS

THRESHOLDS OF SIGNIFICANCE

Per Appendix G of the CEQA Guidelines and BAAQMD recommendations, air quality impacts are considered significant if implementation of the proposed Specific Plan would:

- Conflict with or obstruct implementation of an applicable air quality plan;
- Result in a cumulatively considerable net increase of any criteria pollutant for which the project region is nonattainment under an applicable federal or state ambient air quality standard;
- Expose sensitive receptors to substantial pollutant concentrations; or
- Result in other emissions (such as those leading to odors) adversely affecting a substantial number of people.

3.2.4 IMPACTS AND MITIGATION MEASURES

Impact 3.2-1: Conflict with or obstruct implementation of the applicable air quality plan (Less than Significant)

The BAAQMD is the regional agency responsible for overseeing compliance with State and federal laws, regulations, and programs within the SFBAAB. The BAAQMD, with assistance from ABAG and MTC, has prepared and implemented specific plans to meet the applicable laws, regulations, and programs. The most recent and comprehensive of which is the Bay Area 2017 CAP (2017 CAP). The BAAQMD has also developed CEQA Air Quality Guidelines (most recently in 2022) to assist lead agencies in evaluating the significance of air quality impacts. In formulating compliance strategies, BAAQMD relies on planned land uses established by local general plans. Land use planning affects vehicle travel, which in turn affects region-wide emissions of air pollutants and GHGs.

CEQA requires lead agencies to determine whether a project is consistent with all applicable air quality plans. The 2022 BAAQMD CEQA Air Quality Guidelines recommend that lead agencies consider the following questions relative to this consistency determination:

1. Does the project support the primary goals of the 2017 CAP?
2. Does the project include applicable control measures from the 2017 CAP?
3. Does the project disrupt or hinder implementation of the 2017 CAP control measures?

The primary goals of the 2017 CAP are to protect public health and the climate. The 2017 CAP contains 85 individual control measures that describe specific actions to reduce emissions of air and climate pollutants from the full range of emission sources. The control measures are categorized based upon the economic sector framework used by the Air Resources Board for the AB 32 Scoping Plan Update. These sectors include:

- Stationary (Industrial) Sources
- Transportation
- Energy
- Buildings
- Agriculture
- Natural and Working Lands
- Waste Management
- Water
- Super-GHG Pollutants

As previously stated, BAAQMD relies on planned land uses established by local general plans to formulate compliance standards. The City of Pittsburg 2040 General Plan (2040 General Plan) proposes a land use plan and policy framework that are specifically aimed at improving air quality. The 2040 General Plan Circulation and Transportation Element and Resource Conservation and Open Space Element contain policies and actions that would reduce criteria pollutant emissions, odors, health risks, and other emissions, consistent with the issues recommended in the 2017 CAP. Therefore, the 2040 General Plan would support the primary goals of the 2017 CAP, it would include applicable control measures consistent with the 2017 CAP, and would not disrupt or hinder implementation of the 2017 CAP.

The proposed Specific Plan would implement the Employment Center Industrial (ECI) land use designation in the 2040 General Plan. The proposed Specific Plan and all subsequent development projects within the Plan Area would be subject to all relevant 2040 General Plan policies and actions that provide protections for air quality. Furthermore, implementation of the proposed Specific Plan would not cause the disruption, delay, or otherwise hinder the implementation of any quality plan control measure.

The BAAQMD's 2022 CEQA Air Quality Guidelines also identify project-level thresholds of significance for criteria air pollutants and precursors. As shown in Table 3.2-5, the annual and daily emissions from operations of buildout of the Plan Area would not exceed BAAQMD significance thresholds for any pollutant.

The analysis provided above demonstrates that the 2040 General Plan would be consistent with the current air quality plan control measures; and because the proposed Specific Plan would implement the ECI land use of the General Plan, the proposed Specific Plan would not conflict with or obstruct implementation of the applicable air quality plan, and this impact is considered **less than significant**.

Impact 3.2-2: Result in a cumulatively considerable net increase of any criteria pollutant for which the project region is nonattainment under an applicable federal or state ambient air quality standard (Less than Significant with Mitigation Incorporated)

SHORT-TERM CONSTRUCTION IMPACTS

Implementation of the proposed Specific Plan would result in short-term emissions from construction activities associated with subsequent development, including site grading, asphalt paving, building construction, and architectural coating. Emissions commonly associated with construction activities include fugitive dust from soil disturbance, fuel combustion from mobile heavy-duty diesel- and gasoline-powered equipment, portable auxiliary equipment, and worker commute trips. During construction, fugitive dust, the dominant source of PM₁₀ and PM_{2.5} emissions, is generated when wheels or blades disturb surface materials. Uncontrolled dust from construction can become a nuisance and potential health hazard to those living and working nearby.

Construction activities associated with the future development of the Plan Area would result in emissions of fugitive dust from demolition and site grading activities, heavy construction equipment exhaust, and vehicle trips associated with workers commuting to and from the site and trucks hauling materials. Air pollutant emissions generated during construction would vary depending on the specific land use and footprint details associated with the future development. The exact duration and activities required for construction that could occur under the proposed project are unknown.

Without appropriate project details to compare expected pollutant emissions to BAAQMD significance thresholds, construction-related impacts would be considered a **potentially significant** impact.

LONG-TERM OPERATIONAL IMPACTS

Operational emissions of ROG, NOX, PM₁₀, and PM_{2.5} would be generated by future buildout of the Plan Area from both mobile and stationary sources. Day-to-day activities such as employee vehicle trips to and from the project site would make up the majority of the mobile emissions. Emissions would occur from area sources such as natural gas combustion from heating mechanisms, landscape maintenance equipment exhaust, and consumer products (e.g., deodorants, cleaning products, spray paint, etc.).

The proposed Specific Plan's daily unmitigated operational emissions have been estimated as presented in Table 3.2-5 above, which concludes the future buildout of the Plan Area would result in operational emissions of all pollutants below the applicable thresholds of significance, based on the assumptions used in this analysis. It should be noted that future buildout of the Plan Area was

evaluated at a program-level, as detailed project designs have not yet been prepared. Because the environmental analysis included in this PEIR is intended to provide conservative estimated evaluation, actual project emissions may be less than what has been estimated. The analysis estimates mobile emissions from employee vehicle trips and truck trips.¹

Diesel truck exhaust is a significant source of NO_x emissions. The air quality analysis prepared for this PEIR made conservative assumptions for buildout and traffic generation (mobile sources). However, not every potential buildout scenario falls within these assumptions. Should future development within the Plan Area include a vehicle mix that includes a greater amount of truck traffic than analyzed in this PEIR for example, warehousing and logistics uses, then subsequent air quality analysis would be required, as detailed in **MM 3.2-4**.

Assuming future buildout of the Plan Area remains within the parameters described above, the proposed project would not result in criterial pollutant emissions that exceed BAAQMD's significance thresholds. However, if additional mobile emissions from truck trips are considered, buildout of the Plan Area has the potential to generate long-term operational criteria air pollutant emission in excess of thresholds. Therefore, this impact is considered **potentially significant**.

Mitigation Measures

Implementation of the proposed Specific Plan has been evaluated at a program-level and a guarantee cannot be made that emissions from future development of the Plan Area would not exceed the thresholds of significance. The impact is assumed to remain less than significant with the following mitigation measures.

MM 3.2-1: Subsequent Construction Air Quality Analysis.

Prior to approval of subsequent development applications by the Zoning Administrator, applicants shall provide a project-level construction air quality analysis to determine the significance of air quality impacts. Specific construction activities shall be compared to BAAQMD screening criteria to determine if a more detailed emissions analysis is required to determine significance. If a quantitative analysis of emissions during project construction is required, the estimated emissions shall be compared to BAAQMD significance thresholds. Mitigation measures necessary to reduce any significant impacts shall be developed in coordination with the BAAQMD and shall include BAAQMD's basic best management practices for construction-related fugitive dust emissions as follows:

- All exposed surfaces (e.g., parking areas, staging areas, soil piles, graded areas, and unpaved access roads) shall be watered two times per day.
- All haul trucks transporting soil, sand, or other loose material off-site shall be covered.

¹ CalEEMod assumes a fleet mix derived from CARB's EMFAC model, that's specific to the projected year and region. The vehicle assumptions are diverse and include several truck types, with the top three being LDA (passenger cars), LDT2 (light-duty trucks), MDV (medium-duty trucks).

- All visible mud or dirt trackout onto adjacent public roads shall be removed using wet power vacuum street sweepers at least once per day. The use of dry power sweeping is prohibited.
- All vehicle speeds on unpaved roads shall be limited to 15 mph.
- All roadways, driveways, and sidewalks to be paved shall be completed as soon as possible. Building pads shall be laid as soon as possible after grading unless seeding or soil binders are used.
- All excavation, grading, and/or demolition activities shall be suspended when average wind speeds exceed 20 mph.
- All trucks and equipment, including their tires, shall be washed off prior to leaving the site.
- Unpaved roads providing access to sites located 100 feet or further from a paved road shall be treated with a 6- to 12-inch layer of compacted layer of wood chips, mulch, or gravel.
- Publicly visible signs shall be posted with the telephone number and name of the person to contact at the lead agency regarding dust complaints. This person shall respond and take corrective action within 48 hours. The Air District's General Air Pollution Complaints number shall also be visible to ensure compliance with applicable regulations.

MM 3.2-2: Use of USEPA Tier 4 Engines

Prior to issuance of a grading permit, the project applicant shall show on the grading plans via notation that the contractor shall ensure that all offroad heavy-duty diesel-powered equipment larger than 100 horsepower (e.g., rubber tired dozers, excavators, graders, scrapers, pavers, paving equipment, and cranes) to be used for each phase of construction of the project (i.e., owned, leased, and subcontractor vehicles) shall meet USEPA emissions standards for Tier 4 engines or equivalent. The grading plans shall be submitted for review and approval by the City Engineer.

MM 3.2-3: Enhanced Best Management Practices for Fugitive Dust

To minimize emissions of fugitive dust, future development shall be required to implement the following enhanced best management practices, which shall be notated on grading plans prior to approval:

1. Limit the simultaneous occurrence of excavation, grading, and ground-disturbing construction activities.
2. Install wind breaks (e.g., trees, fences) on the windward side(s) of actively disturbed areas of construction. Wind breaks should have at maximum 50 percent air porosity.
3. Plant vegetative ground cover (e.g., fast-germinating native grass seed) in disturbed areas as soon as possible and watered appropriately until vegetation is established.

4. Install sandbags or other erosion control measures to prevent silt runoff to public roadways from sites with a slope greater than one percent.
5. Minimize the amount of excavated material or waste materials stored at the site.
6. Hydroseed or apply non-toxic soil stabilizers to construction areas, including previously graded areas, that are inactive for at least 10 calendar days.

Due to the potential for full project buildout to include land use types that generate diesel truck trips beyond what was estimated in the CalEEMod modeling analysis, the following conditional mitigation measure may be required.

MM 3.2-4: Subsequent Operational Air Quality Analysis

If a future development application includes a land use type that would generate diesel truck trips during project operation (such as logistics and warehousing), then prior to approval by the Zoning Administrator, a project-level air quality analysis shall be performed in conformance with General Plan Actions 2-A-4.b. and c. The analysis shall include, but not be limited to, quantification of operational criteria air pollutant emissions, a determination of operational air quality impacts, and identification of mitigation measures necessary to reduce any significant impacts.

Significance Determination

While criteria pollutant emissions generated from construction and operational uses are anticipated to remain below significance levels, implementation of **MM 3.2-1**, **MM 3.2-2**, and **MM 3.2-3** would ensure steps would be taken to reduce construction and/or operational criteria pollutant emissions to allowable thresholds. Any proposed development project that exceeds significance levels would be required to implement mitigation measures to minimize air quality impacts. Furthermore, should future development propose a greater amount of truck traffic (such as logistics and warehousing), then a subsequent emissions analysis would be required, as detailed in **MM 3.10-4**. Therefore, at the program-level of analysis, criteria pollutant emissions generated within the Plan Area would be **less than significant**.

Impact 3.2-3: Expose sensitive receptors to substantial pollutant concentrations (Less than Significant with Mitigation Incorporated)

The major pollutant concentrations of concern are TAC emissions. The CARB has identified DPM from diesel-fueled engines as a TAC; thus, high volume freeways, stationary diesel engines, and facilities attracting heavy and constant diesel vehicle traffic are identified as having the highest associated health risks from DPM. Health risks from TACs are a function of both the concentration of emissions and the duration of exposure.

Existing sensitive receptors in the vicinity of the project area include residences approximately 700 feet to the east of the project location and residences directly to the northwest of the project locations, specifically along Golf Club Road, Orinda Circle, and Brookshire Court. Five schools are located within one mile of the Plan Area: Royal Oaks Academy, Rancho Medanos Junior High School, Parkside Elementary School, Los Medanos Elementary School, and Heights Elementary School.

Furthermore, while the environmental indicators within the census tracts of the Plan Area do not designate it as a disadvantaged community, the larger geographic area of the City of Pittsburg is identified as a DAC, specifically in areas north of SR 4. Census tracts north of SR 4 scored high in exposure to diesel particulate matter, traffic, and toxic releases among other environmental and population indicators. Relative to other census tracts, the census tract that makes up the majority and central portion of the Plan Area scored 47th percentile of the CalEnviroScreen. The southern portion of the Plan Area scored 74th percentile, and the northern portion scored 54th percentile.

Construction activities have the potential to generate DPM emissions related to the number and types of equipment typically associated with construction. Off-road heavy-duty diesel equipment used for site grading, paving, and other construction activities result in the generation of DPM. The nearest sensitive receptors to the project site could become exposed to DPM emissions during construction activities. However, construction is temporary and occurs over a relatively short duration for each development phase. Health risks associated with exposure to DPM or any TAC are typically correlated with high concentrations over a long period of exposure. In addition, future buildout of the Plan Area would likely occur in phases, where only portions of the site would be disturbed at a time, with operation of construction equipment occurring intermittently throughout the course of a day. All construction equipment and operation thereof would be regulated per CARB's In-Use Off-Road Diesel-Fueled Fleets Regulation (Cal. Code Regs., tit. 13, §§ 2449 et seq.) Considering the intermittent nature of construction equipment operating within an influential distance to the nearest sensitive receptors, the relatively short duration of construction activities, the likelihood that sensitive receptors would be exposed to high concentrations of DPM for any extended period of time would be low. Thus, future buildout of the Plan Area would not be expected to expose sensitive receptors to substantial concentrations of TACs.

DPM emissions from proposed project operation would be from diesel generators and diesel truck trips. The BAAQMD considers a significant impact related to TACs to occur if an increase in cancer risk level of more than 10 persons in one million, a non-cancer hazard index of greater than 1.0 or an annual average PM_{2.5} concentration of 0.3µg/m³ or greater would result due to the proposed project. Cancer risk and pollutant concentrations can only be determined by performing a detailed dispersion modeling analysis that requires known locations of emissions sources.

Future development would be required to utilize best management practices to reduce pollution burden on surrounding communities of the Plan Area. Policies 8-P-1.4, 8-P-1.6, 8-P-1.12, 8-P-2.2 requires future development within the Plan Area to adhere to best management practices and not exceed BAAQMD air pollution standards, to consider the siting of industrial uses to reduce exposure to diesel particulate matter on sensitive communities, and identify and remedy any disproportionate impacts of environmental pollution on surrounding communities. Although future development in the Plan Area would be required to conform to these policies, since specific pollutant concentration source locations have not been identified as part of the proposed Specific Plan, a conclusion regarding TAC exposure cannot be drawn at this time. Therefore, this impact is **potentially significant**.

Mitigation Measures

Due to the potential for future buildout of the Plan Area to include land use types that generate diesel truck trips beyond what was estimated in the CalEEMod modeling analysis, the following conditional mitigation measure may be required.

MM 3.2-5: Health Impact Analysis

If a future development application includes a land use type that would generate diesel truck trips during project operation (such as logistics and warehousing), then prior to approval by the Zoning Administrator, then a Health Risk Assessment (HRA) shall be performed in conformance with 2040 General Plan Action 2-A-4.c . The analysis shall evaluate potential impacts from directly emitted TAC and PM2.5, as specified in Chapter 5 of BAAQMD's 2022 CEQA Guidelines. The guidelines recommend a tiered approach where at each successive step, the project's impacts (i.e., annual PM2.5 concentrations, cancer risks, and hazards), and the combined cumulative impacts from surrounding sources and the project, are compared to the appropriate thresholds of significance. Projects shall not be approved until it can be demonstrated that the project would not result in exceedance of the established thresholds of significance for public health risks at nearby sensitive receptors.

Impact 3.2-4: Result in other emissions (such as those leading to odors adversely affecting a substantial number of people) (Less than Significant)

Future construction activities within the Plan Area could result in odorous emissions from diesel exhaust associated with construction equipment. However, because of the temporary nature of these emissions and the highly diffusive properties of diesel exhaust, exposure of sensitive receptors to these emissions would be limited. Furthermore, the proposed project would be required to comply with CCR, Title 13, Sections 2449(d)(3) and 2485, which minimizes the idling time of construction equipment either by shutting it off when not in use or by reducing the time of idling to no more than five minutes. This would further reduce the detectable odors from heavy-duty equipment exhaust.

Subsequent land use activities associated with future buildout of the Plan Area could allow for the development of uses that have the potential to produce odorous emissions during operations. Data center operations would include the maintenance and testing of diesel generators and potentially for extended generator use during periods of power disruption. Operations of other industrial land use types could include diesel emissions from deliver trucks.

Significant sources of offending odors are typically identified based on complaint histories received and compiled by BAAQMD. According to the BAAQMD CEQA Guidelines, an odor source with five or more confirmed complaints per year, averaged over three years, is considered to have a significant impact. Typically, larger sources of odors that result in complaints are wastewater treatment facilities, landfills including composting operations, food processing facilities, and chemical plants. Other sources, such as restaurants, paint or body shops, and coffee roasters typically result in localized sources of odors. None of these uses are permitted within the Plan Area.

Table 3.2-6 identifies screening buffers included in the BAAQMD CEQA Air Quality Guidelines for those uses more typically associated with having the potential to be sources of odors. To avoid

3.2 AIR QUALITY

significant impacts, the BAAQMD CEQA Guidelines recommend that buffer zones to avoid adverse impacts from odors should be reflected in local plan policies, land use maps, or implementing ordinances.

TABLE 3.2-6: ODOR SCREENING DISTANCES FOR THE 2040 GENERAL PLAN

<i>LAND USE/TYPE OF OPERATION</i>	<i>PROJECT SCREENING DISTANCE</i>
Wastewater Treatment Plant	2 miles
Wastewater Pumping Facilities	1 mile
Sanitary Landfill	2 miles
Transfer Station	1 mile
Composting Facility	1 mile
Asphalt Batch Plant	2 miles
Chemical Manufacturing	2 miles
Fiberglass Manufacturing	1 mile
Painting/Coating Operations	1 mile
Coffee Roaster	1 mile
Food Processing Facility	1 mile
Green Waste and Recycling Operations	1 mile

The proposed Specific Plan includes potential odor sources that could affect new sensitive receptors. Most of these major existing sources are already buffered. However, it is possible that odors may be present. Responses to odors are subjective and vary by individual and type of use. Sensitive land uses that include outdoor uses, such as residences and possibly daycare facilities, are likely to be most affected by existing odors. The 2040 General Plan includes policies and actions that address potential conflicts in land uses that could result in odor complaints. For example, General Plan Resource Conservation and Open Space Element Policy 10-P-6.7 requires the City to reduce the potential for human discomfort or illness due to local concentrations of toxic contaminants, odors, and dust. Additionally, the policies and actions included as part of the 2040 General Plan (described above) would reduce mobile and stationary source emissions and odors associated with diesel fuel by focusing on land use patterns that improve air quality, reduce air pollution from stationary sources, and encourage/enable increased transit behavior. Policy 10-P-6.9 requires the City to coordinate land use planning to prevent odors and odor complaints. Action 10-A-6.j requires the City to consult with BAAQMD to identify the potential for odor sources from proposed development projects where the development could have the potential to adversely affect existing or planned sensitive receptors. Action 10-A-6.k requires the City to review proposed development and prohibit uses that may produce odors that have the potential to result in frequent odor complaints unless the development proposal can exhibit methods to mitigate such odors. Action 10-A-6.l requires the City to prohibit sensitive receptors from locating near odor sources where frequent odor complaints are likely to occur, unless it can be shown that potential odor complaints can be mitigated. Action 10-A-6.m requires the City to ensure buffer zones are provided for land uses that have the potential to be sources of odors, consistent with the latest BAAQMD guidance.

The analysis provided above demonstrates that odors resulting from Implementation of the 2040 General Plan would be not result in other emissions or odors; and because the proposed Specific Plan would implement the ECI land use designation of the General Plan, the future buildout of the

Plan Area would not result in other emissions (such as those leading to odors adversely affecting a substantial number of people) and impacts would be **less than significant**.

This section of the Program Environmental Impact Report (PEIR) evaluates the effects of buildout of the Pittsburg Technology Park Specific Plan (Specific Plan; project) associated with biological resources. This section provides a background discussion of the bioregions, regionally important habitat and wildlife, and special status species found in the vicinity of Pittsburg. This section is organized with an environmental setting, regulatory setting, and impact analysis and uses the following documents:

- City of Pittsburg. *Pittsburg 2040 General Plan*. Adopted May 2024.
- Vollmar Natural Lands Consulting. March 2024. *Biological Evaluation Report, Pittsburg Technology Park Specific Plan*. (Appendix E).

3.3.1 ENVIRONMENTAL SETTING

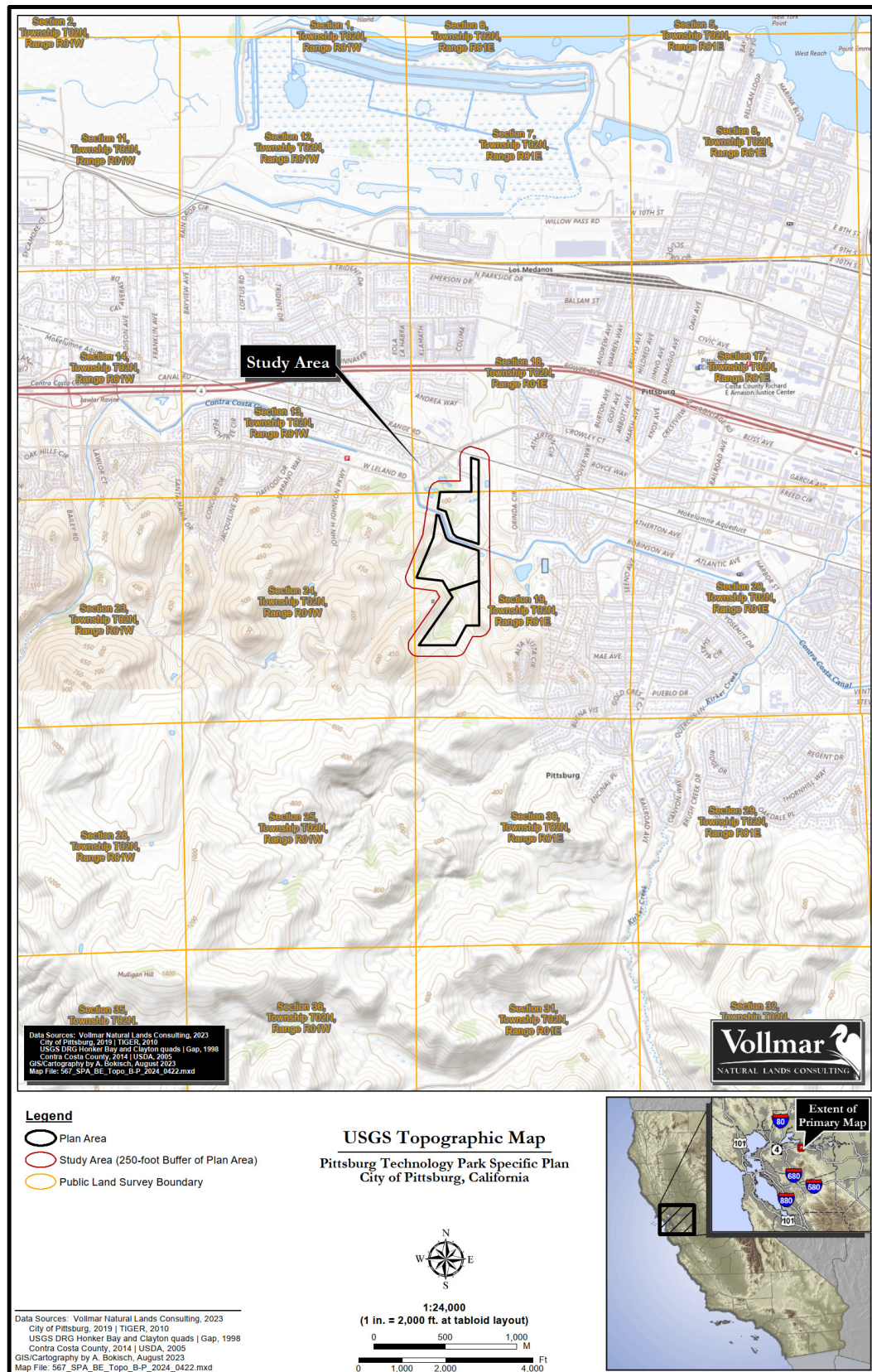
The following discussion is based on the information presented in the *Biological Evaluation Report* (BER) (Vollmar Natural Lands Consulting 2024). The Pittsburg Technology Park Specific Plan Area (Plan Area) is located on the outskirts of the City of Pittsburg. The Plan Area is approximately 76.3 acres, composed of two major project areas bisected by the Contra Costa Canal. The biological study area (study area) used for this section includes the entire Plan Area as well as a 250-foot buffer, yielding a total study area of approximately 151.8 acres (see Figure 3.3-1).

BIOREGIONS

Pittsburg is located within the Bay Area/Delta Bioregion. The Bay Area/Delta Bioregion extends from the Pacific Ocean to the Sacramento Valley and San Joaquin Valley bioregions to the northeast and southeast, and a short stretch of the eastern boundary joins the Sierra Bioregion at Amador and Calaveras Counties. The bioregion is bounded by the Klamath/North Coast on the north and the Central Coast Bioregion to the south. The Bay Area/Delta Bioregion is one of the most populous areas of the state, encompassing the San Francisco Bay Area and the Sacramento-San Joaquin River Delta. The water that flows through the Delta supplies two-thirds of California's drinking water, irrigating farmland, and sustaining fish and wildlife and their habitat. The bioregion fans out from San Francisco Bay in a jagged semi-circle that takes in all or part of 12 counties: Alameda, Contra Costa, Marin, Napa, San Francisco, San Joaquin, San Mateo, Santa Clara, Solano, Sonoma, and parts of Sacramento and Yolo. The habitats and vegetation of the Bay Area/Delta Bioregion are as varied as the geography.

3.3 BIOLOGICAL RESOURCES

FIGURE 3.3-1. BIOLOGICAL STUDY AREA



HABITATS

The study area is largely made up of the former Delta View Golf Course. It consists of both upland and wetland habitat types, ranging from formerly managed golf course turf and associated features, unmanaged remnant grasslands, patches of landscaping trees, seasonal and perennial wetlands, and annual grasslands outside the golf course (see Figure 3.3-2). The study area includes buildings, paved roads and parking areas as well. There are few specialized microhabitats in the study area. Where present, these are mainly areas of heavy clay soils; no rock outcrops, sandy soils (other than former golf course sand traps), alkaline soils or the like are present. There are ground squirrel burrows in the remnant grasslands and along the slopes of the annual grasslands outside of the golf course. Portions of the golf course area are bounded by chain link fencing. The fencing, which spans western and southern portions of the site, prevents larger wildlife from accessing the golf course area.

Upland Habitat

Upland habitat accounts for 143.38 acres of the total 151.8 acres in the study area. Much of the upland area consists of annual grasslands, covering 125.17 acres. Grassland area can be split into two categories, areas previously managed as a golf course and those not previously managed as such (see Figure 3.3-2).

Most of the uplands were managed as golf course from the late 1940's until the closure of the course in 2018. Management of the uplands included soils being replaced or amended, and a wide range of trees, shrubs and grasses being imported and maintained via irrigation, mowing and pruning. Since the end of golf course operations, the herb stratum has been colonized by a variety of invasive weeds, which at the time of the wetland delineation and rare plant surveys formed extensive, dense, and tall stands within the study area. Two distinct plant communities have formed within this area, wild oat and brome grasslands, and upland mustards or star-thistle fields.

Oat and brome grasslands within the study area are dominated by non-native annuals including Italian rye grass (*Festuca perennis*), ripgut brome (*Bromus diandrus*), and soft chess (*Bromus hordeaceus*), as well as wild oat (*Avena fatua*), Mediterranean barley (*Hordeum marinum* ssp. *gussoneanum*), wall barley (*Hordeum murinum*), horseweed (*Erigeron canadensis*), Italian thistle (*Carduus pycnocephalus* ssp. *pycnocephalus*), and bristly ox-tongue (*Helminthotheca echinoides*). Upland mustard or star-thistle fields were dominated by black mustard (*Brassica nigra*) and some cheeseweed (*Malva parviflora*) or yellow star-thistle (*Centaurea solstitialis*).

Grassland areas not previously managed as a golf course, mostly within the southern boundary of the study area (south of the Contra Costa Canal), contained a higher diversity of plants. This includes native wildflowers such as several species of lupine (*Lupinus affinis*, *L. bicolor*, *L. formosus* var. *formosus*, *L. nanus*), California poppy (*Eschscholzia californica*), purple owl's clover (*Castilleja exserta* ssp. *exserta*), and common fiddleneck (*Amsinckia menziesii*). The previously-described plant communities consisting of primarily non-native species are also present in these areas.

Landscaping trees comprise 9.72 acres of mostly exotic trees. These trees were planted as part of the golf course landscaping and have persisted after its closure. This community is dominated by Peruvian pepper tree (*Schinus mole*), with Bishop pine (*Pinus muricata*) and some lodgepole pine

(*Pinus contorta* ssp. *murrayana*) and ponderosa pine (*Pinus ponderosa*). Other species of tree likely planted as landscape plants include shamel ash (*Fraxinus uhdei*), Italian stone pine (*Pinus pinea*), and deodar cedar (*Cedrus deodara*). Several gum trees (*Eucalyptus camaldulensis*, *Eucalyptus sideroxylon*, and *E. globulus*). Scattered throughout these exotic species are a few coast live oaks (*Quercus agrifolia* var. *agrifolia*), valley oaks (*Quercus lobata*), and other upland tree species, which are native to the region. However, historical aerial photography of the area suggests that even the native species may not have existed in the area prior to the golf course. Many of the planted trees throughout the study area are mature and quite large. Since the end of golf course operation, several trees have died and fallen, making access to the area more difficult.

The 6.34 acres of paved area, mostly in the northern part of the study area, includes the now abandoned parking lot, sidewalks, and developed areas. This area has minimal vegetation, consisting of weedy species that have managed to grow through cracks such as black mustard, rough cat's-ear (*Hypochaeris radicata*), slender wild oat (*Avena barbata*), cheeseweed, yellow star-thistle, Mediterranean barley, and ripgut brome. Various landscaping plants are also present in planting strips within this area.

Riparian Habitat

Riparian habitat accounts for approximately 2.44 acres of the total study area. Riparian habitat in the study area includes 0.44 acre of Himalayan blackberry (*Rubus armeniacus*) thickets, 1.91 acres of Valley and Foothill Riparian, and 0.08 acre of Mexican fan palm (*Washingtonia robusta*) stands (see Figure 3.3-2).

Himalayan blackberry thickets are present in the northeast portion of the study area adjacent to a seasonal and perennial wetland drainage. Valley and Foothill Riparian is composed of riparian trees along the seasonal wetlands and seasonal wetland drainages identified in the 2023 wetland delineation, located primarily in the eastern portion of the study area. This habitat is dominated by Fremont cottonwood (*Populus fremontii*), Siberian elm (*Ulmus pumila*), northern California black walnut (*Juglans hindsii*), olive (*Olea europaea*), and occasional Bishop pine. Tree cover is intermittent in this habitat type (approximately 30% absolute cover). Mexican fan palm stands are found along a seasonal wetland drainage south of the Contra Costa Canal, along the eastern border of the study area. This habitat type has a similar landscape position and understory to the Valley Foothill Riparian habitat type but has an overstory of Mexican fan palm (*Washingtonia robusta*).

The Himalayan blackberry thickets, Valley Foothill Riparian areas, and Mexican fan palm stands are classified as a sensitive habitat due to their status as riparian areas; they may be subject to CDFW jurisdiction under the California Fish and Game Code §1600 et seq.

Aquatic Habitat

The study area encompasses a variety of natural, created, and enhanced wetlands and other Waters. Though there are natural drainages, the hydrology in the study area has been significantly altered to support and protect the golf course landscaping. This has resulted in the concentration of water in some areas at the expense of other areas.

Many of the basin and drainage features within the study area were variably vegetated as a function of hydroperiod, amount of scouring from water flow, and/or degree of water turbidity. Some features were sparsely vegetated as result of long ponding duration and/or high water turbidity, while stretches of narrow channel appeared to have limited plant growth as a result of scouring from water flow. Most of the basin features in the study area hold water for only short periods, or have sufficiently clear and/or shallow water that photosynthesis has enabled relatively dense plant growth.

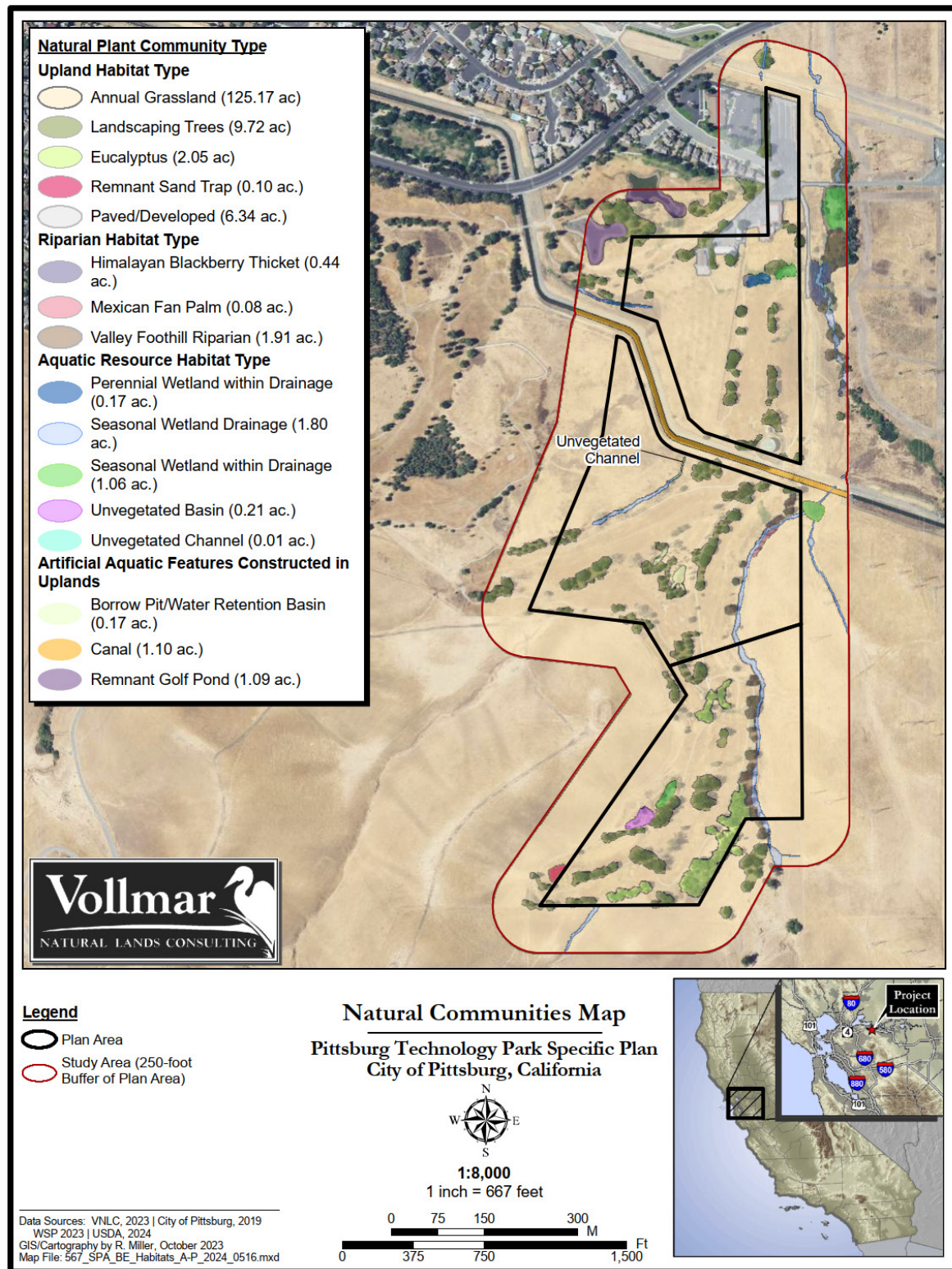
There are a total of 3.248 acres of potentially jurisdictional waters identified in the study area by VNLC during the 2023 wetland delineation. Identified natural aquatic habitats are all considered to be sensitive communities by CDFW. These habitats may be subject to CDFW jurisdiction under the California Fish and Game Code §1600 et seq (FGC 1600); they may also be Jurisdictional Waters of the State of California under the Porter-Cologne Water Quality Act (Porter-Cologne) and/or Jurisdictional Waters of the United States under the Clean Water Act (CWA).

Seasonal wetland drainage accounted for 1.799 acres and was concentrated in the eastern and southern portion of the study area. Perennial wetland within drainages accounted for 0.169-acre and was split between two wetlands, both in the northern portion of the study area. Seasonal wetland within drainages accounted for 1.061 acres spread throughout the study area, mainly along the eastern border. One unvegetated channel covering 0.011-acre occurs along the southwestern edge of the study area. An unvegetated basin covered 0.208-acre and is present in the southern portion of the study area.

In addition to the natural aquatic habitats identified, there are 2.357 acres of artificially constructed aquatic features. These aquatic features include the Contra Costa Canal, golf course landscaping ponds, and detention basins from golf course operations. These features are not likely to be considered Jurisdictional Waters of the United States as they do not obstruct natural flow of wetlands or waters of the U.S. or replace the original channel of wetlands or waters. They may be Jurisdictional Waters of the State of California.

3.3 BIOLOGICAL RESOURCES

FIGURE 3.3-2. NATURAL COMMUNITIES



WILDLIFE

Ruderal and annual grassland vegetation in the study area provides habitat for both common and special-status wildlife populations. For example, some commonly observed wildlife species in the region include California ground squirrel (*Otospermophilus beecheyi*), California vole (*Microtus californicus*), coyote (*Canis latrans*), raccoon (*Procyon lotor*), opossum (*Didelphis virginiana*), striped skunk (*Mephitis mephitis*), Red-tailed Hawk (*Buteo jamaicensis*), Northern Harrier (*Circus cyaneus*), and American Kestrel (*Falco sparverius*), as well as many native insect species. The landscaping trees in the study area also provide habitat for wildlife in the area. There are also several bat species in the region. Bats often feed on insects as they fly over agricultural and natural areas.

Locally common and abundant wildlife species are important components of the ecosystem. Due to habitat loss, many of these species must continually adapt to using agricultural, ruderal, and ornamental vegetation for cover, foraging, dispersal, and nesting.

SPECIAL-STATUS SPECIES

The plant and animal species known to occur in the vicinity of the study area are discussed below. This includes both plant and animal species identified in the 9-quad searches of the U.S. Geological Survey (USGS) 7.5' Honker Bay, Walnut Creek, Clayton, Antioch South, Vine Hill, Fairfield South, Denverton, Birds Landing, and Antioch North quadrangles, as well as species included in the Information for Planning and Consultation (IPaC) search (USFWS 2024).

Special-Status Plants

As indicated in Table 3.3-1, the study area provides limited or no habitat for special-status plant species known from the region. The study area is dominated by the former golf course, which features artificial soils over extensive areas and was intensively managed for over seven decades. With the exception of a few planted oaks and remnant cottonwoods and willows, all of the dominant plant species throughout the golf course area are exotic. Once golf course management ceased, nearly all areas where artificial soils predominate have been colonized by invasive weeds, which at the time of habitat surveys, formed tall, dense stands. Steeper slopes within the fenced portion of the study area, which were never managed as part of the golf course, feature seminatural habitats, with scattered planted trees and un-grazed annual grassland. The grasslands and understory areas are dominated by tall and dense exotic grasses as well as scattered invasive weeds. As with the majority of the study area where native soils remain, there are localized areas of heavy clay soils, but the soils are otherwise unspecialized—they are not derived from serpentine or limestone rock, and are not sandy, gravely, or alkaline. In general, where such areas are not actively managed for habitat values, there is very limited potential for special-status plants to occur. However, the southern portion of the study area that is outside of the fencing supports a moderate cover of native plant species, including a number of showy wildflowers.

Special-status plants include species that are designated as Rare, Threatened, or Endangered as well as candidate species for listing by the USFWS. Special-status plants also include species considered Rare or Endangered under the conditions of Section 15380 of the CEQA Guidelines, such as those plant species identified by the CNPS as California Rare Plant Rank (CRPR) 1A, 1B, and 2 in the

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Inventory of Rare and Endangered Vascular Plants of California by the CNPS. Finally, special-status plants may include other species that are considered sensitive or of special concern due to limited distribution or lack of adequate information to permit listing or rejection for state or federal status, such as those included as CRPR List 3 or 4 in the CNPS Inventory.

Table 3.3-1 provides a list of special-status plants evaluated as having potential to occur in the study area and their status.¹ Protocol-level surveys for special-status plants were conducted in 2023 and 2024, and none of these species were observed (Vollmar Natural Lands Consulting 2024). However, plant occurrences can vary from year to year depending on rainfall, temperature, and other factors; thus, the potential for these species to occur in future years over the lifespan of the Specific Plan cannot be entirely ruled out.

TABLE 3.3-1: SPECIAL-STATUS PLANTS WITH POTENTIAL TO OCCUR IN STUDY AREA

<i>PLANTS SPECIES LATIN NAME</i>	<i>PLANTS SPECIES COMMON NAME</i>	<i>FEDERAL STATUS</i>	<i>STATE STATUS</i>	<i>CRPR</i>
<i>Androsace elongata ssp. acuta</i>	California androsace*	None	None	4.2
<i>Blepharizonia plumosa</i>	big tarplant	None	None	1B.1
<i>Calochortus pulchellus</i>	Mt. Diablo fairy-lantern	None	None	1B.2
<i>Castilleja ambigua var. ambigua</i>	johnny-nip*	None	None	4.2
<i>Centromadia parryi ssp. parryi</i>	pappose tarplant*	None	None	1B.2
<i>Centromadia parryi ssp. rudis</i>	Parry's rough tarplant*	None	None	4.2
<i>Convolvulus simulans</i>	small-flowered morning-glory*	None	None	4.2
<i>Eriogonum truncatum</i>	Mt. Diablo buckwheat	None	None	1B.1
<i>Fritillaria agrestis</i>	stinkbells*	None	None	4.2
<i>Helianthella castanea</i>	Diablo helianthella	None	None	1B.2
<i>Hesperervax caulescens</i>	hogwallow starfish*	None	None	4.2
<i>Hibiscus lasiocarpus var. occidentalis</i>	woolly rose-mallow	None	None	1B.2
<i>Lessingia hololeuca</i>	woolly-headed lessingia*	None	None	3
<i>Madia radiata</i>	showy golden madia	None	None	1B.1
<i>Microseris sylvatica</i>	sylvan microseris*	None	None	4.2
<i>Myosurus minimus ssp. apus</i>	little mousetail	None	None	3.1
<i>Navarretia heterandra</i>	Tehama navarretia*	None	None	4.3
<i>Navarretia leucocephala ssp. bakeri</i>	Baker's navarretia*	None	None	1B.1
<i>Navarretia nigelliformis ssp. radians</i>	shining navarretia*	None	None	1B.2
<i>Puccinellia simplex</i>	California alkali grass*	None	None	1B.2
<i>Ranunculus lobbii</i>	Lobb's aquatic buttercup*	None	None	4.2

¹ Numerous other special-status plants are known from the project region but are not expected to occur within the Plan Area, due to the habitat available onsite, the species' geographic and elevational ranges, or other factors (Vollmar Natural Lands Consulting 2024). These are discussed in more detail in Appendix E.

<i>PLANTS SPECIES LATIN NAME</i>	<i>PLANTS SPECIES COMMON NAME</i>	<i>FEDERAL STATUS</i>	<i>STATE STATUS</i>	<i>CRPR</i>
<i>Sidalcea keckii</i>	Keck's checkerbloom*	FE	None	1B.1
<i>Streptanthus hispidus</i>	Mt. Diablo jewelflower	None	None	1B.3
<i>Trifolium hydrophilum</i>	saline clover*	None	None	1B.2

SOURCE: VOLLMAR NATURAL LANDS CONSULTING 2024

RARITY STATUS CODES:

E = FEDERALLY OR STATE LISTED AS ENDANGERED

T = FEDERALLY OR STATE LISTED AS THREATENED

R = STATE LISTED AS RARE

C = STATE CANDIDATE FOR LISTING

CRPR CODES

CRPR 1A: PLANTS PRESUMED EXTIRPATED IN CALIFORNIA AND EITHER RARE OR EXTINCT ELSEWHERE; CRPR LIST 1B = PLANTS RARE, THREATENED OR ENDANGERED IN CA AND ELSEWHERE; CRPR 2B = PLANTS RARE, THREATENED OR ENDANGERED IN CALIFORNIA BUT MORE COMMON ELSEWHERE;

CRPR 3 = MORE INFORMATION IS NEEDED ABOUT PLANT; CRPR 4 = PLANTS OF LIMITED DISTRIBUTION, A WATCH LIST

CRPR: '.1' = Seriously threatened in CA; '.2' = Fairly threatened in CA; '.3' = Not very threatened in CA

Special-Status Animals

Two special-status animals have been observed within the study area: White-tailed Kite, a California Fully Protected bird species, and Cooper's Hawk, a CDFW Watch List species, were each observed foraging in the vicinity of the study area during field surveys. Table 3.3-2 lists additional special-status animal species with potential to be present in the study area, based on their known geographic ranges and habitat requirements. Numerous additional species are known from the proposed project region but are not expected to be present in the study area, due to their documented ranges, a lack of suitable habitat onsite, or other factors (Vollmar Natural Lands Consulting 2024); this is discussed further in Appendix E.

TABLE 3.3-2: SPECIAL-STATUS ANIMALS WITH POTENTIAL TO OCCUR IN STUDY AREA

<i>ANIMAL SPECIES LATIN NAME</i>	<i>ANIMAL SPECIES COMMON NAME</i>	<i>FEDERAL STATUS</i>	<i>STATE STATUS</i>	<i>OTHER</i>
BIRDS				
<i>Accipiter cooperii</i>	Cooper's Hawk*	None	None	WL
<i>Agelaius tricolor</i>	Tricolored Blackbird	None	ST	BCC, SSC
<i>Aquila chrysaetos</i>	Golden Eagle	None	None	FP, WL
<i>Ardea alba</i>	Great Egret	None	None	SA
<i>Ardea herodias</i>	Great Blue Heron	None	None	SA
<i>Asio flammeus</i>	Short-eared Owl	None	None	BCC, SSC
<i>Athene cunicularia</i>	Burrowing Owl	None	None	BCC, SSC
<i>Botaurus lentiginosus</i>	American Bittern	None	None	SA
<i>Buteo regalis</i>	Ferruginous Hawk	None	None	WL
<i>Circus hudsonius</i>	Northern Harrier	None	None	BCC, SSC
<i>Elanus leucurus</i>	White-tailed Kite	None	None	FP
<i>Eremophila alpestris actia</i>	California Horned Lark	None	None	WL
<i>Falco columbarius</i>	Merlin*	None	None	WL
<i>Falco mexicanus</i>	Prairie Falcon*	None	None	WL

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<i>ANIMAL SPECIES LATIN NAME</i>	<i>ANIMAL SPECIES COMMON NAME</i>	<i>FEDERAL STATUS</i>	<i>STATE STATUS</i>	<i>OTHER</i>
<i>Falco peregrinus anatum</i>	American Peregrine Falcon	None	None	SA (delisted)
<i>Haliaeetus leucocephalus</i>	Bald Eagle	None	SE	FP
<i>Lanius ludovicianus</i>	Loggerhead Shrike	None	None	SSC
<i>Larus californicus</i>	California Gull*	None	None	BCC, WL
<i>Nycticorax nycticorax</i>	Black-crowned Night Heron	None	None	SA
<i>Pica nuttalli</i>	Yellow-billed Magpie	None	None	SA
MAMMALS				
<i>Antrozous pallidus</i>	Pallid bat*	None	None	SSC
<i>Lasiurus frantzii</i> [L. blossevillei]	Western red bat*	None	None	SSC
<i>Lasiurus cinereus</i>	Hoary bat*	None	None	SA
<i>Myotis thysanodes</i>	Fringed myotis	None	None	SA
<i>Perognathus inornatus</i>	San Joaquin pocket mouse	None	None	SA
<i>Taxidea taxus</i>	American badger*	None	None	SSC
<i>Vulpes macrotis mutica</i>	San Joaquin kit fox	FE	ST	None
REPTILES AND AMPHIBIANS				
<i>Ambystoma californiense pop. 1</i>	California tiger salamander	FT	ST	WL
<i>Emys marmorata</i>	Western pond turtle	FPT	None	SSC
<i>Rana draytonii</i>	California red-legged frog	FT	None	SSC
INSECTS				
<i>Bombus caliginosus</i>	Obscure bumble bee*	None	None	SA
<i>Bombus crotchii</i>	Crotch bumble bee*	None	SCE	None
<i>Bombus pensylvanicus</i>	American bumble bee*	None	None	SA
<i>Danaus plexippus plexippus pop.1</i>	Monarch butterfly – California overwintering population	FC	None	None

SOURCE: VOLLMAR NATURAL LANDS CONSULTING 2024.

SPECIES MARKED WITH “*” HAVE POTENTIAL TO OCCUR BUT ARE NOT COVERED BY THE HCP/NCCP.

FT- FEDERAL THREATENED; FE- FEDERAL ENDANGERED; FC – FEDERAL CANDIDATE; ST – STATE THREATENED; SE – STATE ENDANGERED; SCE – STATE CANDIDATE ENDANGERED; BCC – USFWS BIRD OF CONSERVATION CONCERN; SSC – CDFW SPECIES SPECIAL CONCERN; FP – CDFW FULLY PROTECTED; WL – CDFW WATCH LIST; SA – CDFW SPECIAL ANIMALS LIST (2024).

The study area also has potential to support the nesting of protected migratory birds not included in the above list. The potential for these species to occur within the study area, as well as potential impacts to these species from significant disturbances within the study area, are discussed below.

SENSITIVE PLANT COMMUNITIES

Sensitive plant communities are communities that are of limited distribution statewide or within a county or region and are often vulnerable to environmental effects of projects. These communities may or may not contain special-status species or their habitat. The most current version of the CDFW's *List of California Terrestrial Natural Communities* as well as the *Manual of California Vegetation* (Sawyer et al. 2009) indicate which natural communities are of special status given the current state of the California classification. As previously discussed, the study area is dominated by annual grasslands and disturbed habitats associated with the golf course development, which are

not considered sensitive plant communities. However, the Himalayan blackberry thickets and Valley Foothill Riparian areas are classified as a sensitive habitat due to their status as riparian areas and may be subject to CDFW jurisdiction under the California Fish and Game Code §1600 et seq.

WETLANDS AND WATERS

Wetlands are areas that are periodically or permanently inundated by surface or groundwater, and support vegetation adapted to life in saturated soil. Section 404 jurisdictional wetlands are vegetated areas that meet specific vegetation, soil, and hydrologic criteria defined by the United States Army Corps of Engineers (USACE) Wetlands Delineation Manual and Regional Supplement.

As previously described under the *Habitats* section, potential jurisdictional waters and wetlands were identified in the study area. The acreage of each potential jurisdictional water type is listed in Table 3.3-3 below.

TABLE 3.3-3: POTENTIAL JURISDICTIONAL WATERS AND OTHER FEATURES WITHIN THE STUDY AREA

<i>HABITAT TYPE</i>	<i>ACREAGE</i>
<i>POTENTIALLY JURISDICTIONAL WETLANDS</i>	
Seasonal Wetland Drainage	1.799
Perennial Wetland within Drainage	0.169
Seasonal Wetland within Drainage	1.061
Total	3.029
<i>OTHER POTENTIALLY JURISDICTIONAL FEATURES</i>	
Un-Vegetated Channels	0.011
Un-Vegetated Basins	0.208
Total	0.219
Total Potentially Jurisdictional Waters	3.248
<i>ARTIFICIAL FEATURES CONSTRUCTED IN UPLANDS (PRESUMED NON-FEDERAL-JURISDICTIONAL)</i>	
Borrow Pit	0.173
Canals	0.905
Undergrounded Canal	0.193
Golf Course Landscape Pond	1.086
Total	2.357

SOURCE: VOLLMAR NATURAL LANDS CONSULTING 2024. APPENDIX E

The delineation also identified 0.17 acres of borrow pits that were constructed in upland habitats. Basin features in the study area include golf course landscape ponds. The borrow pit is an isolated feature that is unlikely to be considered jurisdictional as Waters of the United States under current rules but may qualify as Waters of the State of California.

WILDLIFE MOVEMENT CORRIDORS AND NURSERY SITES

Wildlife corridors are linear features that connect large patches of natural open space and provide avenues for the migration and dispersal of terrestrial animal species. Wildlife corridors contribute to population viability by ensuring continual exchange of genes between populations, providing access to adjacent habitat areas for foraging and mating, and providing routes for recolonization of habitat after local extirpation or ecological catastrophes (e.g., wildfires). Small patches of habitats that serve to connect larger blocks of habitat can often serve as movement corridors and help reduce the adverse effects of habitat fragmentation. Such linkages may be continuous habitat or discrete habitat islands that function as steppingstones for dispersal.

The California Essential Habitat Connectivity Project which identifies major habitat corridors connecting large areas of open space, was reviewed for the proposed project. No such regional wildlife corridors have been identified within the study area. The two closest documented corridors are on the north side of Suisun Bay, and approximately 10 miles southwest of the study area in the East Bay Hills.

The ECC HCP/NCCP also emphasizes smaller, local corridors, particularly riparian corridors. As previously described, the study area is located at the southern edge of the City of Pittsburg. North of the study area lies suburban development and State Route 4. To the west lies an additional portion of the former golf course. Extensive fencing remains from the former golf course use and fencing is also present along the Canal, precluding wildlife movement from adjacent open areas. Golf course barrier netting also remains in place along a portion of the eastern boundary of the study area. To the south of the study area is privately-owned grazing land.

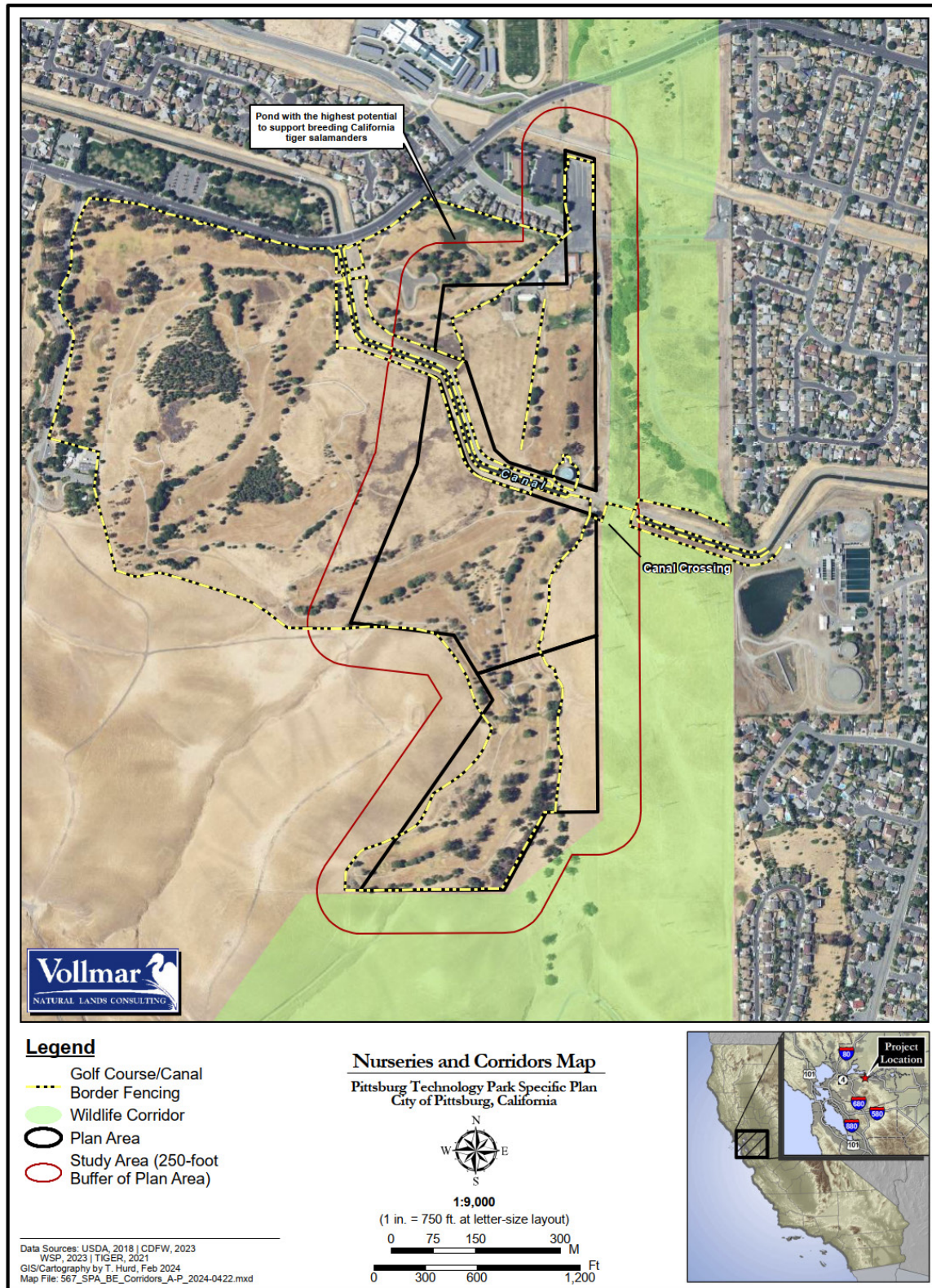
However, to the east of the study area lies the PG&E transmission line corridor that is generally open and contains a stream. This corridor provides direct connectivity from the Diablo Range Hills directly to the Bayland edge. As such, it represents a potentially significant wildlife movement corridor. Other than this corridor, the study area itself provides little opportunity for wildlife to move due to the barriers along the northern, western, and southern edges. Figure 3.3-3 displays the wildlife corridors and barriers on and around the study area.

North-south habitat connectivity in the project vicinity (including along the corridor described above) is partially obstructed by the Contra Costa Canal, which has relatively few crossings accessible to wildlife. However, one of the largest crossings accessible to wildlife is in the study area where the PG&E transmission corridor intersects the Canal. This crossing location may represent an important location along the PG&E corridor for wildlife connectivity. Construction of barriers to wildlife movement in this location could significantly impact the habitat value of the entire corridor. The Plan Area itself generally does not encroach on this crossing.

Nursery sites may include sites where animals breed, lay eggs, or rear young. These can include features as diverse as nesting trees, estuaries, ponds, caves, and structures. Trees in the study area provide potential nesting habitat for birds and bats. Similarly, the ability of ponds and wetlands on the site to support amphibian breeding is discussed above. No other special nursery sites are present within the study area.

3.3 BIOLOGICAL RESOURCES

FIGURE 3.3-3. WILDLIFE CORRIDORS AND NURSERIES



3.3.2 REGULATORY SETTING

There are a number of regulatory agencies whose responsibility includes the oversight of the natural resources of the State and nation including the CDFW, the USFWS, the USACE, and the National Marine Fisheries Service (NMFS). These agencies often respond to declines in the quantity of a particular habitat or plant or animal species by developing protective measures for those species or habitat type. The following is an overview of the federal, state, and local regulations that are applicable to implementing the General Plan.

FEDERAL

Federal Endangered Species Act

The Federal Endangered Species Act (FESA), passed in 1973, defines an endangered species as any species or subspecies that is in danger of extinction throughout all or a significant portion of its range. A threatened species is defined as any species or subspecies that is likely to become an endangered species within the foreseeable future throughout all or a significant portion of its range.

Once a species is listed, it is protected from a “take” unless a take permit is issued by the USFWS. A take is defined as the harassing, harming, pursuing, hunting, shooting, wounding, killing, trapping, capturing, or collecting wildlife species or any attempt to engage in such conduct, including modification of its habitat (16 USC 1532, 50 CFR 17.3). Proposed endangered or threatened species are those species for which a proposed regulation, but not a final rule, has been published in the Federal Register.

Migratory Bird Treaty Act

The Migratory Bird Treaty Act (MBTA) (16 U.S.C. 703 et seq.) is a federal statute that implements treaties with several countries on the conservation and protection of migratory birds. The list of bird species covered by the MBTA is extensive and is detailed in 50 CFR 10.13. The regulatory definition of “migratory bird” is broad and includes any mutation or hybrid of a listed species, including any part, egg, or nest of such a bird (50 CFR 10.12). Migratory birds are not necessarily federally listed endangered or threatened birds under the ESA. The MBTA, which is enforced by USFWS, makes it unlawful “by any means or in any manner, to pursue, hunt, take, capture, [or] kill” any migratory bird or attempt such actions, except as permitted by regulation. The applicable regulations prohibit the take, possession, import, export, transport, sale, purchase, barter, or offering of these activities, except under a valid permit or as permitted in the implementing regulations (50 CFR 21.11). To kill, possess, or trade a migratory bird, bird part, nest, or egg is a violation of the Federal Migratory Bird Treaty Act (FMBTA: 16 U.S.C., §703, Supp. I, 1989), unless it is in accordance with the regulations that have been set forth by the Secretary of the Interior.

Bald and Golden Eagle Protection Act

The Bald and Golden Eagle Protection Act (BGEPA) of 1940 prohibits any form of possession or take of bald eagles and golden eagles, including actions to “pursue, shoot, shoot at, poison, wound, kill, capture, trap, collect, molest or disturb” an eagle (16 USC 668c). To disturb a bald and golden eagle means “to agitate or bother a bald or golden eagle to a degree that causes, or is likely to cause,

based on the best scientific information available: (1) injury to an eagle; (2) a decrease in its productivity, by substantially interfering with normal breeding, feeding, or sheltering behavior; or (3) nest abandonment, by substantially interfering with normal breeding, feeding, or sheltering behavior” (72 FR 31132; 50 CFR 22.3). A 1962 amendment created a specific exemption for possession of an eagle or eagle parts (e.g., feathers) for religious purposes of Indian tribes.

Clean Water Act – Section 404

The federal Clean Water Act (CWA) was enacted to protect the nation’s waters. Section 404 of the CWA authorizes the Secretary of the Army, acting through the U.S. Army Corps of Engineers (USACE), to issue permits regulating the discharge of dredged or fill materials into “navigable waters at specified disposal sites.” Waters of the United States (WOTUS) are defined in CFR, Title 33, Section 328.3, subdivision (a) to include navigable waters, perennial and intermittent streams, lakes, rivers, and ponds, as well as wetlands, marshes, and wet meadows. The CWA extends additional protection to certain sensitive aquatic habitats, including wetlands. Authorization to discharge dredge or fill materials into sensitive aquatic habitats requires that an applicant demonstrate the proposed activity represents the least environmentally damaging practicable alternative for the proposed project. A proposed discharge into federally regulated wetlands must also not result in a net loss of wetland functions or values (USACE, DoD, and EPA 2008, and Executive Order 11990). All authorizations to discharge dredge or fill materials into WOTUS must demonstrate that the proposed projects have been designed to avoid, minimize and mitigate for all unavoidable effects on water of the United States.

The location and extent of WOTUS are formally identified by the USACE through a jurisdictional delineation process applying technical criteria described in various guidance documents issued by the USACE, including the 1987 Corps of Engineers Wetlands Delineation Manual (Environmental Laboratory 1987), the Regional Supplement to the Corps of Engineers Wetland Delineation Manual: Arid West Region (Version 2) (USACE 2010), A Field Guide to the Identification of the Ordinary High Water Mark in the Arid West Region of the Western United States (Lichvar and McColley 2008), and in USACE Regulatory Guidance Letter No. 05-05 (USACE 2005).

The section 404 permit program also applies to the dredge and fill of federal wetlands. Physically, a federal wetland must meet three specified criteria:

- (i) less permeable soils more likely to cause rainwater and other surface water flows to pond;
- (ii) seasonal ponding during specified types of rain events; and
- (iii) the presence of plants that are consistent with seasonally ponding. The extent to which a wetland area that meets the applicable criteria is federally jurisdictional, however, is subject to considerable legal uncertainty.

On Dec. 30, 2022, the U.S. Environmental Protection Agency (EPA) and Department of the Army (the agencies) announced a final rule founded upon the pre-2015 definition of “waters of the United States,” updated to reflect consideration of Supreme Court decisions, the science, and the agencies’ technical expertise. The rule restores fundamental protections so that the nation will be closer to achieving Congress’ direction in the CWA that our waters be fishable and swimmable. It also ensures

that our waters support recreation and wildlife. In this rule, consistent with the general framework of the 1986 regulations, the agencies interpret the term “waters of the United States” to include:

- traditional navigable waters, the territorial seas, and interstate waters (“paragraph (a)(1) waters”);
- impoundments of “waters of the United States” (“paragraph (a)(2) impoundments”);
- tributaries to traditional navigable waters, the territorial seas, interstate waters, or paragraph (a)(2) impoundments when the tributaries meet either the relatively permanent standard or the significant nexus standard (“jurisdictional tributaries”);
- wetlands adjacent to paragraph (a)(1) waters, wetlands adjacent to and with a continuous surface connection to relatively permanent paragraph (a)(2) impoundments, wetlands adjacent to tributaries that meet the relatively permanent standard, and wetlands adjacent to paragraph (a)(2) impoundments or jurisdictional tributaries when the wetlands meet the significant nexus standard (“jurisdictional adjacent wetlands”); and
- intrastate lakes and ponds, streams, or wetlands not identified in paragraphs (a)(1) through (4) that meet either the relatively permanent standard or the significant nexus standard (“paragraph (a)(5) waters”).

In addition, this rule codifies several exclusions from the definition of “waters of the United States,” including longstanding exclusions for prior converted cropland and waste treatment systems, and for features that were generally considered non-jurisdictional under the pre-2015 regulatory regime (USEPA 2024).

Clean Water Act – Section 401

Section 401 of the CWA requires any applicant for a federal license or permit to conduct any activity that may result in a discharge of a pollutant into Waters of the U.S. to obtain a certification from the Regional Water Quality Control Board (RWQCB). The certification will ensure that the discharge will comply with the applicable effluent limitations and water quality standards. Permits requiring Section 401 certification include USACE Section 404 permits and National Pollutant Discharge Elimination System (NPDES) permits issued by the U.S. Environmental Protection Agency (EPA) under Section 402 of the CWA. NPDES permits are issued by the applicable RWQCB. The City of Pittsburg is in the jurisdiction of the the San Francisco Bay RWQCB.

Rivers and Harbors Act of 1899

The Rivers and Harbors Act prohibits the obstruction or alteration of any navigable water of the United States. The Rivers and Harbors Act requires authorization from the USACE for any excavation or deposition of materials into these waters or for any work that could affect the course, location, condition, or capacity of rivers or harbors.

STATE

California Endangered Species Act

The California Endangered Species Act (CESA) protects certain plant and animal species when they are of special ecological, educational, historical, recreational, aesthetic, economic, and scientific value to the people of the State. CESA established that it is state policy to conserve, protect, restore, and enhance endangered species and their habitats.

CESA was expanded upon the original Native Plant Protection Act and enhanced legal protection for plants. To be consistent with federal regulations, CESA created the categories of "threatened" and "endangered" species. It converted all "rare" animals into CESA as threatened species but did not do so for rare plants. Thus, there are three listing categories for plants in California: rare, threatened, and endangered. Under state law, plant and animal species may be formally designated through official listing by the California Fish and Game Commission.

Fish and Game Code

Several provisions of the CFGC protect avian species, nests, and eggs. Section 3503 provides that it is unlawful "to take, possess, or needlessly destroy the nest or eggs of any bird, except as otherwise provided by this code or any regulation made pursuant thereto." Section 3503.5 extends these statutory protections more specifically to raptors and birds of prey (Falconiformes or Strigiformes). The CDFW has not implemented ITP programs for Sections 3503 or 3503.5. Section 3513 makes it unlawful to "possess any migratory nongame bird as designated in the Migratory Bird Treaty Act or any part of such migratory nongame bird except as provided by rules and regulations adopted by the Secretary of the Interior under provisions of the Migratory Treaty Act." As discussed above, apart from certain limited exceptions, the USFWS has not implemented an incidental take program for the MBTA.

Sections 3511, 4700, 5050, and 5515 of the CFGC prohibit the take or possession of certain birds, mammals, fish, and reptiles. These species are commonly referred to as "fully protected" under state law and state agencies are prohibited from permitting actions that would result in the incidental take of these species except under the auspices of an approved Natural Community Conservation Plan or for certain utility and transportation projects.

Under the California Fish and Game Code, all predatory birds in the order Falconiformes or Strigiformes in California, generally called "raptors," are protected. The California Fish and Game Code indicates that it is unlawful to take, possess, or destroy the nest or eggs of any such bird unless it is in accordance with the code. Any activity that would cause a nest to be abandoned or cause a reduction or loss in a reproductive effort is considered a take. This generally includes construction activities.

Fish and Game Code §1601-1603 – Streambed Alteration

Under the California Fish and Game Code, CDFW has jurisdiction over any proposed activities that would divert or obstruct the natural flow or change the bed, channel, or bank of any lake or stream. Private landowners or project proponents must notify and obtain a "Streambed Alteration

Agreement” from CDFW prior to any alteration of a lakebed, stream channel, or their banks. Through this agreement, the CDFW may impose conditions to limit and fully mitigate impacts on fish and wildlife resources. These agreements are usually initiated through the local CDFW warden and will specify timing and construction conditions, including any mitigation necessary to protect fish and wildlife from impacts of the work.

Public Resources Code § 21000 - California Environmental Quality Act

Public Resources Code Section 21000 enacts CEQA and identifies that a species that is not listed on the federal or state endangered species list may be considered rare or endangered if the species meets certain criteria. Under CEQA, public agencies must determine if a project would adversely affect a species that is not protected by FESA or CESA. Species that are not listed under FESA or CESA, but are otherwise eligible for listing (i.e., candidate or proposed) may be protected by the local government until the opportunity to list the species arises for the responsible agency.

Species that may be considered for review are included on a list of “Species of Special Concern,” developed by the CDFW. Additionally, the CNPS maintains a list of plant species native to California that have low numbers, limited distribution, or are otherwise threatened with extinction. This information is published in the Inventory of Rare and Endangered Vascular Plants of California. List 1A contains plants that are believed to be extinct. List 1B contains plants that are rare, threatened, or endangered in California and elsewhere. List 2 contains plants that are rare, threatened, or endangered in California, but more numerous elsewhere. List 3 contains plants where additional information is needed. List 4 contains plants with a limited distribution.

California Native Plant Protection Act of 1977; California Fish and Game Code §1900 et seq.

In 1977, the state legislature passed the California Native Plant Protection Act (NPPA) in recognition of rare and endangered plants of the state. The intent of the law was to preserve, protect, and enhance endangered plants. The NPPA gave the California Fish and Game Commission the power to designate native plants as endangered or rare, and to require permits for collecting, transporting, or selling such plants. The NPPA includes provisions that prohibit the taking of plants designated as "rare" from the wild, and a salvage mandate for landowners, which requires notification of the CDFW 10 days in advance of approving a building site.

Additionally, the California Native Plant Society maintains a list of plant species native to California that have low numbers, limited distribution, or are otherwise threatened with extinction. This information is published in the Inventory of Rare and Endangered Vascular Plants of California.

Natural Community Conservation Planning Act (Fish and Game Code 2800 et seq.)

In 1991 California enacted the Natural Community Conservation Planning Act (CFGF Section 2800 et seq.) to authorize the creation and implementation of natural community conservation plans (NCCPs) to conserve natural communities at the ecosystem level while accommodating compatible land use. The act was revised in 2003 and has been subsequently amended. An NCCP is intended to

function much like a federal HCP and provide for the long-term conservation of wildlife and plant communities in regional locations in manner that also allows for economic development and growth. Section 2805(e) allows the incidental take of fully protected species that are covered under an approved NCCP.

LOCAL

San Francisco Bay Basin (Region 2) Water Quality Control Plan

The San Francisco Bay Region (Region) is approximately 4,603 square miles in area, which is roughly the size of the State of Connecticut. It is characterized by its dominant feature, consisting of 1,100 square miles of the 1,600-square-mile San Francisco Bay Estuary (Estuary), the largest estuary on the west coast of the United States, where fresh waters from California's Central Valley mix with the saline waters of the Pacific Ocean. The Region also includes coastal portions of Marin and San Mateo counties, from Tomales Bay in the north to Pescadero and Butano Creeks in the south.

The San Francisco Bay Basin (Region 2) Water Quality Control Plan (Basin Plan) includes a summary of beneficial water uses, water quality objectives needed to protect the identified beneficial uses, and actions. The Basin Plan establishes water quality standards for all the ground and surface waters of the region. The term "water quality standards," as used in the CWA, includes both the beneficial uses of specific water bodies and the levels of quality that must be met and maintained to protect those uses. The Basin Plan includes an implementation plan describing the actions by the RWQCB and others that are necessary to achieve and maintain the water quality standards.

The RWQCB regulates waste discharges to minimize and control their effects on the quality of the region's ground and surface water. Permits are issued under several programs and authorities. The terms and conditions of these discharge permits are enforced through a variety of technical, administrative, and legal means. Water quality problems in the region are listed in the Basin Plan, along with the causes, where they are known. For water bodies with quality below the levels necessary to allow all the beneficial uses of the water to be met, plans for improving water quality are included. The Basin Plan reflects, incorporates, and implements applicable portions of several national and statewide water quality plans and policies, including the California Water Code and the CWA.

City of Pittsburg 2040 General Plan

The City of Pittsburg 2040 General Plan (2040 General Plan) was comprehensively updated in May of 2024. The following goals, policies, and action items pertain to biological resources.

Resource Conservation & Open Space Element

Goal 10-2: Conserve biological and ecological resources, particularly the health of Suisun Bay and Marsh (Bay) and the Sacramento-San Joaquin Delta (Delta), special status species, including species that are State or Federally listed as endangered, threatened, or rare, habitats that support special status species, and sensitive habitats.

Policy: 10-P-2.5: Conserve natural terrain, native vegetation, and sensitive habitats and recognize the role of native vegetation, natural terrain and green infrastructure in natural resource and watershed management.

Policy: 10-P-2.6: Support efforts to protect and enhance the Bay and Delta ecosystem and Pittsburg's creeks in perpetuity for their value in providing visual amenity, drainage capacity, and habitat value, through a variety of measures including local conservation efforts that improve adequate water supply and quality.

Policy 10-P-2.7: Preserve large areas of naturally vegetated habitat to allow for water infiltration and reduce flood hazards in the Kirker Creek watershed by requiring that new development minimizes paved areas.

Policy 10-P-2.8: Require new development projects and expansion of existing uses to conserve sensitive habitat, including special status species.

Policy: 10-P-2.11: Encourage the preservation of wildlife corridors to ensure the integrity of habitat linkages.

Policy: 10-P-2.12: Continue to support and implement the East Contra Costa County Habitat Conservation Plan (Eastern County HCP).

Policy: 10-P-2.14: Collaborate with developers to maintain, and where feasible establish enhancements to, creeks, marshes, wetlands, and riparian corridors in the design of new development.

Policy: 10-P-2.15: Protect and restore threatened natural resources, such as wildlife, estuaries, tidal zones, marine life, wetlands, and waterfowl habitat.

Policy: 10-P-2.16: Limit dredging and filling of wetlands and marshlands, particularly adjacent to Browns Islands Preserve.

Policy: 10-P-2.18: Recognize that climate change impacts may influence future guidance, and best available data, and continue to ensure that up-to-date information is consulted when reviewing projects for potential impacts to biological resources, including the Bay, Delta, and sensitive habitats.

Action 10-A-2.a: Conduct site-specific biological resources assessment as required by CEQA for development located in or adjacent to potential habitat or ecologically sensitive areas. If any special-status species or sensitive habitats are identified, contact the appropriate resource agencies and establish appropriate management strategies to reduce impacts on sensitive habitat and special status species.

Action 10-A-2.b: Continue to require projects to comply with the requirements of the Eastern County HCP when reviewing proposed public and private land use changes.

Action 10-A-2.f: Establish an on-going program to remove and prevent the re-establishment of invasive species and restore native species as part of development approval on sites that include ecologically sensitive habitat and require that revegetation of cut-and-fill slopes for new development includes native plant species.

3.3 BIOLOGICAL RESOURCES

Action 10-A-2.g: Intermix areas of pavement with naturally vegetated infiltration sites to minimize the concentration of stormwater runoff from pavement and structures.

Action 10-A-2.h: Require an encroachment permit from Contra Costa Water District (CCWD) for any storm drain facility or increase in runoff, as determined by a hydrological study, that will add load to existing facilities crossing or encroaching onto Contra Costa Canal rights-of-way.

Action 10-A-2.i: Require all crossings to be constructed in accordance with CCWD standards and requirements.

Action 10-A-2.j: Establish development standards for new construction adjacent to riparian zones to reduce sedimentation and flooding. Standards should include:

- Requirements that low berms or other temporary structures such as protection fences be built between a construction site and riparian corridor to preclude sheet-flooding stormwater from entering the corridors during the construction period.
- Requirements for installation of storm sewers before construction occurs to collect stormwater runoff during construction.

Action 10-A-2.k: Establish regulations as part of the Zoning Code to require that:

- (a) Revegetation of cut-and-fill slopes for new development includes native plant species
- (b) Mature trees are preserved, including measures for the replacement of all mature trees removed
- (c) Building pads and structural elements are located at least 150 feet (horizontally) away from the crest of a major ridgeline in order to preserve viewsheds of the southern hills
- (d) Creek setbacks are established along riparian corridors. Development standards shall include expanded setback buffers as needed to preserve habitat areas of identified special status species and wetlands (50-150 feet on each side), prohibition of development within creek setback areas (except as part of greenway (trails and bikeways, etc.) enhancement), and preservation of land where endangered species habits exist.

Goal-10-4: Promote the conservation and efficient use of surface water and groundwater and protect the quality of Pittsburg's waterways and groundwater resources.

Policy 10-P-4.6: Encourage rehabilitation and revegetation of riparian corridors and wetlands throughout the City to contribute to bioremediation and improved water quality.

Policy 10-P-4.9: Require projects to comply with best management practices for development and construction on sites where the erosion potential is moderate to severe or which may affect riparian areas, which may include:

- Use of bench terraces where areas of long slopes may create a stormwater gradient flow;

- Construction of berms between any riparian corridor and the construction site to preclude sediment in stormwaters and sheet-floods from entering riparian zones; and
- Completing the storm drainage system in the early phase of construction to manage stormwater runoff during construction.

Goal-12-7: Ensure the development of public infrastructure for energy, telecommunications, and other utilities meets the long-term needs of the community and ensure infrastructure is available at the time such facilities are needed.

Policy 12-P-7.1: Require all development projects to demonstrate how storm water runoff will be detained or retained on-site and/or conveyed to the nearest drainage facility as part of the development review process, including consideration of the near-term and cumulative capacity of the system serving the drainage area, and as required by the City's NPDES Municipal Regional Permit. Project applicants shall mitigate any drainage impacts as necessary and shall demonstrate that the project will not result in any increase in off-site runoff during rain and flood events.

Policy 12-P-7.2: Assure through the City standards, including the Master Drainage Plan and development ordinances, that proposed new development (residential, commercial, or industrial) adequately provides for on-site and downstream mitigation of potential flood hazards, including construction of required drainage improvements.

Policy 12-P-7.3: Ensure adequate minimum setbacks to reduce potential for property damage from storm flooding.

Policy 12-P-7.4: Reduce the risk of localized and downstream flooding and runoff through the use best management practices to minimize runoff from the site to the storm drainage system, including

- High infiltration measures, including the maximization of permeable landscape,
- Using permeable surfaces for parking lots, sidewalks, and bike paths,
- Where feasible, using roof runoff as irrigation.

Policy 12-P-7.5: During the review of development plans, require all commercial projects to construct on-site retention facilities. Such facilities could be in the form of landscape features or underground swells.

Policy 12-P-7.6: Allow the construction of detention basins as mitigation in new developments. Ensure that detention basins located in residential neighborhoods, schools, or child-care facilities are surrounded by a gated enclosure, or protected by other safety measures.

Action 12-A-7.a: As part of project review and CEQA documentation, require an assessment of downstream drainage (creeks and channels) and City storm-water facilities impacted by potential project runoff and require development to include measures, including on-site improvements, to ensure that off-site runoff is not increased during rain and flood events.

East Contra Costa County Habitat Conservation Plan/Natural Community Conservation Plan

The East Contra Costa County Habitat Conservation Plan/Natural Community Conservation Plan (HCP/NCCP) is intended to provide regional conservation and development guidelines to protect natural resources while improving and streamlining the permit process for endangered species and wetland regulations. It lays out a conservation strategy to protect and recover listed species whose take is authorized via the HCP/NCCP process (“covered species”); central to this is an extensive preserve system compensating for habitat losses due to projects implemented under the HCP/NCCP (East Contra Costa County Habitat Conservation Plan Association 2006).

The heart of the conservation strategy is a system of new preserves linked to existing protected lands to form a network of protected land outside the area where new urban growth will be covered under the HCP/NCCP. The conservation strategy is designed to create a preserve system that will:

- Preserve approximately 23,800 acres of land under the initial urban development area or approximately 30,300 acres of land under the maximum urban development area for the benefit of covered species, natural communities, biological diversity, and ecosystem function.
- Preserve major habitat connections linking existing protected lands.
- Enable management of habitats to enhance populations of covered species and maintain ecosystem processes.

Under the ECC HCP/NCCP, the participating entities—the County of Contra Costa, Contra Costa County Flood Control and Water Conservation District, East Bay Regional Park District, and the Cities of Pittsburg, Brentwood, Clayton, and Oakley—are empowered to issue take permits for specific types of projects whose impacts on listed species are analyzed in the Plan document (“covered projects”). Project proponents seeking take authorization under the ECC HCP/NCCP pay development fees to the East Contra Costa County Habitat Conservancy (Conservancy) that are then pooled to fund various activities, including the acquisition and management of compensatory preserve lands. Fees are calculated on a per-acre basis and include a per-acre surcharge for impacts to jurisdictional wetlands and waters, to ensure that compensation is proportional in extent and kind to losses incurred due to covered projects (East Contra Costa County Habitat Conservation Plan Association 2006).

Projects that obtain coverage under the ECC HCP/NCCP are also required to implement specific avoidance and minimization measures, as follows (East Contra Costa County Habitat Conservation Plan Association 2006).

- For all covered projects: planning surveys. Planning surveys are conducted early in project development to identify the resources (species and habitats) potentially affected by the project and determine whether additional preconstruction surveys for particular species or other resources will be necessary. Planning surveys also quantify the extent of various habitat resources impacted by the project (acres by habitat type); the HCP/NCCP Implementing Entity tracks these data and uses them to make sure the preserve system

keeps pace with or exceeds total impact acreages and continues to provide adequate compensation for covered projects' aggregate impacts. Accordingly, planning surveys are required for all covered projects except those that have no permanent impacts and only minimal temporary impacts.

- For projects with the potential to impact certain covered species: preconstruction surveys. Because the ECC HCP/NCCP assumes (and provides compensation for) some take of covered species, preconstruction surveys are limited to the species that are expected to benefit most from minimizing take of individuals.
- For projects that warrant it, based on results of planning or preconstruction surveys: construction monitoring by qualified biologist staff.

By proactively addressing the long-term conservation needs, the HCP/NCCP strengthens local control over land use and provides greater flexibility in meeting other needs such as housing, transportation, and economic growth in the area.

City of Pittsburg Street Tree Ordinance

Chapter 12.32, Street Trees, of the City of Pittsburg Municipal Code (PMC) outlines the Street Tree Ordinance. As outlined in PMC Section 12.32.070, no person may plant, cut, trim, remove, prune, shape, injure, interfere with or do maintenance work on a street tree without first obtaining a street tree permit from the City Public Works Department. The permit shall be issued only for work to be done in compliance with the chapter, and shall be issued without a fee. The Public Works Department shall supervise work done under a permit. Additionally, if a person obtains a building permit or other permit from the Community and Economic Development Department under PMC Section 12.32.110 or 12.32.120, and street tree work is required or authorized under that permit, the person need not obtain a separate street tree permit. The Community and Economic Development Department shall notify the Public Works Department of any permit requiring street tree work. The Public Works Department shall supervise street tree work under the permit.

Further, as a condition of approval of a parcel map, tentative map, conditional use permit, architectural review permit or building permit, the applicant shall plant trees on the property in accordance with this chapter. Before the final inspection for occupancy, the applicant shall either have the trees planted or deposit security (cash or bond) with the city in an amount to cover the cost of planting the required trees. The city may use the security deposit to defray the cost of planting trees if the applicant fails to do so.

Chapter 15.108 PMC, Habitat Conservation Plan/Natural Community Conservation Plan Implementation, establishes the procedures to implement the East Contra Costa County HCP/NCCP. Chapter 15.108 PMC applies to all development projects in the city that are within the urban development area except for the following:

1. Any development project that will permanently disturb less than one acre. The "acreage of land permanently disturbed" by a project, as that term is defined in Chapter 9.3.1 of the HCP/NCCP, shall be determined by the city planner.

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2. Any development project that the city planner determines is contained entirely within an area mapped as urban, turf, landfill and/or aqueduct land cover types in the HCP/NCCP, as generally depicted on Exhibit A of the HCP/NCCP and in the map data used to create Exhibit A, attached to the ordinance codified in this chapter, both of which are incorporated here by reference.
3. Any development project of a type not covered by the HCP/NCCP within the urban development area, as set forth in Chapter 2.3.1 of the HCP/NCCP.
4. Development projects with vested rights as established by California law including Government Code Sections 65864 through 65869 (development agreements) and Sections 66498.1 through 66498.9 (vesting tentative maps) where such rights vested prior to adoption of the ordinance codified in this chapter.
5. Development projects exempt under any provision of law.
6. Development projects where the city council determines based on written evidence submitted by the project applicant that application of the chapter would deprive the project applicant of all reasonable economic use of the property in violation of federal or state constitutional prohibitions against the taking of property without just compensation.
7. Any development project with all city entitlements approved prior to the adoption of the ordinance codified in this chapter.

Further, Article XIX of Title 18 (Sections 18.84.825-18.84.870 PMC) regulates tree preservation and protection in the City. The purpose of Article XIX is to promote the health, safety, welfare, and quality of life of the residents of the city through the protection of specified trees located on private property within the city, and the establishment of standards for removal, maintenance, and planting of trees. In establishing these procedures and standards, it is the city's intent to encourage the preservation of trees.

Subsection 18.84.835(F) PMC defined a "protected tree" as any of the following:

1. A California native tree, as identified in the Calflora online database of wild California plants, that measures at least 50 inches in circumference (15.6 inches diameter) at four and one-half feet above grade, regardless of location or health; or
2. A tree of a species other than a California native that measures at least 50 inches in circumference at four and one-half feet above grade and is either on an undeveloped property, located on public property or within the right-of-way, or located on private property and is found to provide benefits to the subject property as well as neighboring properties, subject to determination by the city planner; or
3. A tree required to be planted, relocated, or preserved as a condition of approval of a tree removal permit or other discretionary permit, and/or as environmental mitigation for a discretionary permit.

Pursuant to Section 18.84.845 PMC, a protected tree may only be removed, including a cut-down, destruction, removal or relocation of any protected tree growing on property other than city-owned property or other public right-of-way within the city limits, upon approval of a tree removal permit issued by the Zoning Administrator, planning commission or city council, as applicable. Additionally,

the removal or relocation of a protected tree is exempt from the provisions of Article XIX in the following circumstances:

1. In cases of emergency when a tree is hazardous or dangerous to life or property, it may be removed by order of the chief of police, by the chief of the Contra Costa County fire protection district, by the Zoning Administrator, director of community and economic development or his or her designee, or by the director of public works or his or her designee;
2. Any tree whose removal was specifically approved as a part of an approved development plan, subdivision, other discretionary project or a building permit, approved prior to the effective date of the ordinance codified in the chapter.

The tree removal permit procedures and requirements are outlined in Section 18.84.850 PMC. The replacement tree requirements are outlined in Section 18.84.855 PMC. Standards for development on sites with protected trees not approved for removal are outlined in Section 18.84.860 PMC.

3.3.3 METHODOLOGY AND THRESHOLDS OF SIGNIFICANCE

METHODOLOGY

This section analyzes impacts on biological resources from the implementation of the proposed project based on changes to the environmental setting as described above. The proposed project's potential impacts to biological resources have been evaluated using the Biological Evaluation Report prepared for the proposed project, available online resources, published documents, the 2040 General Plan, and professional judgment. Impacts were analyzed according to CEQA significance criteria described below.

THRESHOLDS OF SIGNIFICANCE

Consistent with Appendix G of the CEQA Guidelines, the proposed project will have a significant impact on biological resources if it would:

- Have a substantial adverse effect, either directly or through habitat modifications, on any species identified as a candidate, sensitive, or special status species in local or regional plans, policies, or regulations, or by the California Department of Fish and Wildlife or U.S. Fish and Wildlife Service;
- Have a substantial adverse effect on any riparian habitat or other sensitive natural community identified in local or regional plans, policies, regulations or by the California Department of Fish and Wildlife or US Fish and Wildlife Service;
- Have a substantial adverse effect on state or federally protected wetlands (including, but not limited to, marsh, vernal pool, coastal, etc.) through direct removal, filling, hydrological interruption, or other means;
- Interfere substantially with the movement of any native resident or migratory fish or wildlife species or with established native resident or migratory wildlife corridors, or impede the use of native wildlife nursery sites;
- Conflict with any local policies or ordinances protecting biological resources, such as a tree preservation policy or ordinance; or

- Conflict with the provisions of an adopted Habitat Conservation Plan, Natural Community Conservation Plan, or other approved local, regional, or state habitat conservation plan.

3.3.4 IMPACTS AND MITIGATION

Impact 3.3-1: Have a substantial adverse effect, either directly or through habitat modifications, on any species identified as a candidate, sensitive, or special status species in local or regional plans, policies, or regulations, or by the California Department of Fish and Wildlife or U.S. Fish and Wildlife Service (Less than Significant with Mitigation Incorporated)

SPECIAL-STATUS PLANT SPECIES

Direct and Indirect Impacts

As previously discussed, the study area provides limited or no habitat for special-status plant species known from the region, and none were observed onsite during protocol-level surveys conducted in 2023 (Vollmar Natural Lands Consulting 2024). The study area is dominated by the former golf course, which features artificial soils over extensive areas and was intensively managed for over seven decades. Therefore, there is low potential for direct or indirect impacts to special-status plant species from future buildout of the Plan Area. Nevertheless, mitigation measures (MM) **MM 3.3-1** through **3.3-4** would be implemented further reduce the potential for any impacts to special-status plants. These measures would require future development projects accommodated by the proposed Specific Plan to adhere to the East Contra Costa HCP/NCCP, obtain necessary permits, provide worker awareness training for biological resources, and conduct rare plant surveys.

SPECIAL-STATUS ANIMAL SPECIES

As previously indicated, numerous special-status animals have been documented nearby and are considered to have some potential to occur in the study area (see Table 3.3-3). Appendix E provides a detailed description of each species and assessment of the likelihood of occurrence of each species within the study area, which is based on the distribution of regional occurrences (if any), habitat suitability, and field observations.

The following evaluates the proposed project's potential direct and indirect effects on special-status animal species that have been observed or have a moderate potential to occur within the study area. There is no designated critical habitat within the study area, aside from Delta smelt, a fish species with no potential to occur in the study area.

Direct Impacts

FEDERAL AND/OR STATE LISTED SPECIES

TRI-COLORED BLACKBIRD

Tricolored Blackbird is listed as Threatened under CESA, and is a USFWS BCC and CDFW SSC. This species is covered by the East Contra Costa County HCP/NCCP.

There are no mapped occurrences of Tricolored Blackbird in the vicinity of the study area, though the study area is within mapped primary foraging habitat by the HCP/NCCP. The nearest occurrence of Tricolored Blackbird is 7.2 miles north of the study area. The area where the occurrence is located is predominately in a wetland/riparian zone. Though the study area is near Suisun Bay, there is only marginal wetland/riparian habitat for the species in the study area. Furthermore, the wetlands within the study area are too small to provide suitable nesting habitat for Tricolored Blackbird. However, open areas within the study area provide potential foraging habitat.

Direct impacts on Tri-Colored Blackbird during construction and operations/maintenance activities are considered unlikely as the species is highly mobile. However, future construction activities could result in direct mortality of special status-species, such as by cutting of trees with active nests. To further reduce potential impacts to the species, **MM 3.3-1, 3.3-2, 3.3-3, and 3.3-8** would be implemented and addresses this impact by requiring pre-construction surveys, limited construction windows, avoidance, awareness training, habitat compensation, and other mitigation.

BALD EAGLE

Bald Eagle is state listed as Endangered and is a CDFW Fully Protected species. This species is not covered by the East Contra Costa County HCP/NCCP. The study area provides limited suitable foraging habitat for the species in the form of grassland. Scattered mature trees provide limited suitable nesting habitat. Nonetheless, a conservative evaluation is that Bald Eagles could forage or nest in the study area.

Direct impacts on adult Bald Eagle during construction and operation/maintenance activities are considered unlikely as the species is highly mobile. However, future construction activities could result in direct mortality of special status-species, such as by cutting of trees with active nests. To further reduce potential impacts to the species, **MM 3.3-1, 3.3-2, 3.3-3, and 3.3-9** would be implemented and addresses this impact by requiring pre-construction surveys, limited construction windows, avoidance, awareness training, habitat compensation, and other mitigation.

CALIFORNIA RED-LEGGED FROG

California red-legged frog (CRF) is a federally listed Threatened species and a CDFW SSC. This species is covered by the East Contra Costa County HCP/NCCP. CRF have been documented at multiple locations in the vicinity of the study area, and the area is within habitat identified as suitable for the species by the HCP/NCCP. The study area has two ponds that hold water long enough to potentially support breeding CRF. No CRF were detected in either pond or any other features in the study area. Should future construction activities occur when frogs are present, individual CRF could be harmed by construction activities. Impacts have the potential to rise to a significant level. However, to further reduce potential impacts to this species, **MM 3.3-1 through 3.3-3** would be implemented and addresses this impact by requiring limited construction windows, avoidance, awareness training, habitat compensation, and other mitigation.

CALIFORNIA TIGER SALAMANDER

California tiger salamander (CTS) – Central California Distinct Population Segment is a federally and state listed Threatened species. The study area is not within designated critical habitat for California tiger salamander. This species is covered by the East Contra Costa County HCP/NCCP, and the study

3.3 BIOLOGICAL RESOURCES

area is modeled in the HCP/NCCP as having suitable migration and aestivation habitat for the species. Additionally, CTS have been documented at numerous locations in the vicinity of the study area. At least one pond within the study area provides potential breeding habitat for CTS. The study area also provides potential upland dispersal and aestivation habitat.

Potential CTS breeding habitat within the study area is fairly limited, though most of the entire study area provides potential upland refuge/aestivation and dispersal habitat. The pond which provides potentially suitable CTS breeding habitat is not within the study area. However, individual CTS may also be present in subterranean refuge habitat on portions of the study area and could be harmed by future construction activities. Following any future development of the site, CTS could still move on or off the site during breeding migrations and could be subject to harm or mortality while crossing roads. Impacts have the potential to rise to a significant level. However, to further reduce potential impacts to this species, **MM 3.3-1** through **3.3-3** would be implemented and addresses this impact by requiring limited construction windows, avoidance, awareness training, habitat compensation, and other mitigation.

SAN JOAQUIN KIT FOX

San Joaquin kit fox (SJKF) is a federally listed Endangered and state listed Threatened species. This species is covered by the East Contra Costa County HCP/NCCP. The study area is located to the north of the commonly accepted range of the species and there have been no recent documented occurrences in the study area vicinity. Therefore, it is considered unlikely that the species would occur within the study area. However, the potential of a kit fox to occasionally wander outside of its expected range and to occur within the study area cannot be completely ruled out.

The available evidence indicates that a resident or breeding SJKF population does not occur on or near the study area, and that potential use of the study area and surrounding area by the species would be limited to very occasional dispersal. Should an individual SJKF move through the study area during future construction periods, the animal could be harmed. In addition, while considered unlikely, an individual SJKF could also temporarily occupy a den within the study area. If the species is present during future construction activities, result in the loss of one or more kit foxes could occur. Therefore, direct impacts have the potential to rise to a significant level. However, to further reduce potential impacts to this species, **MM 3.3-1** through **3.3-3** would be implemented and addresses this impact by requiring limited construction windows, avoidance, awareness training, habitat compensation, and other mitigation.

CROTCH'S BUMBLE BEE

Crotch's bumble bee is a CESA candidate Endangered species. This species is not covered by the East Contra Costa County HCP/NCCP. The study area provides suitable grassland habitat for the species as well as plants accessible to short-tongued bees. Specifically, milkweed and multiple species of lupine in the study area provide food for Crotch's bumble bee. Though the occurrences in the vicinity are historical, the plant species present could provide enough foraging habitat for the bee to occur within the study area.

While the grasslands offer marginal habitat for Crotch's bumble bee, the species has potential to be found in the study area and project-related disturbance could impact the species. Crotch's bumble

bee is also a ground nester so any ground disturbing activities could negatively impact the species. The bee could also be disturbed by future construction activities if they are conducted while the bee is in flying season. Direct impacts to this species has the potential to rise to a significant level. To further reduce potential impacts to the species, **MM 3.3-1** through **3.3-3**, and **3.3-5** would be implemented and addresses this impact by requiring pre-construction surveys, limited construction windows, avoidance, awareness training, habitat compensation, and other mitigation.

WESTERN POND TURTLE

Western pond turtle is a CDFW SSC and is proposed for listing as Threatened under ESA. This species is covered by the East Contra Costa County HCP/NCCP. "Movement Habitat" is documented adjacent to the study area by the HCP/NCCP. However, there is limited aquatic habitat suitable for the species within the study area. Nonetheless, future development could interrupt potential movement habitat for this species, and if present, the species could be harmed or disturbed by construction activities. Impacts have the potential to rise to a significant level. To further reduce potential impacts to the species, **MM 3.3-1** through **3.3-3**, and **3.3-7** would be implemented and addresses this impact by requiring pre-construction surveys, limited construction windows, avoidance, awareness training, habitat compensation, and other mitigation.

OTHER SPECIAL-STATUS SPECIES

WHITE-TAILED KITE

White-tailed Kite is a CDFW Fully Protected species. This species was observed foraging within the study area, near the southern edge. The study area also provides suitable nesting habitat for the species. Direct impacts on adult White-tailed Kite during future construction and operations/maintenance activities are considered unlikely as the species is highly mobile. However, future construction activities could result in direct mortality of special status-species, such as by cutting of trees with active nests. To further reduce potential impacts to the species, **MM 3.3-1** through **3.3-3**, and **3.3-8** would be implemented and addresses this impact by requiring pre-construction surveys, limited construction windows, avoidance, awareness training, habitat compensation, and other mitigation.

COOPER'S HAWK

Cooper's Hawk is a CDFW Watch List species. The study area provides marginally suitable habitat for this species to nest and forage. Additionally, a Cooper's Hawk was observed foraging over the study area during field surveys. Direct impacts on adult Cooper's Hawks during construction and operations/maintenance are considered unlikely as the species is highly mobile. However, future construction activities could result in direct mortality of special status-species, such as by cutting of trees with active nests. To further reduce potential impacts to the species, **MM 3.3-1** through **3.3-3**, and **3.3-8** would be implemented and addresses this impact by requiring pre-construction surveys, limited construction windows, avoidance, awareness training, habitat compensation, and other mitigation.

GOLDEN EAGLE

Golden Eagle is a CDFW Fully Protected species and is covered by the East Contra Costa County HCP/NCCP. The study area provides suitable foraging habitat for the species and mature trees provide limited suitable nesting habitat. Direct impacts to the species during construction and

operations/maintenance are considered unlikely as the species is highly mobile. However, future construction activities could result in direct mortality of special status-species, such as by cutting of trees with active nests. To further reduce potential impacts to the species, **MM 3.3-1** through **3.3-3**, and **3.3-8** would be implemented and addresses this impact by requiring pre-construction surveys, limited construction windows, avoidance, awareness training, habitat compensation, and other mitigation.

BURROWING OWL

Burrowing Owl is a USFWS Bird of Conservation Concern and CDFW Species of Special Concern. This species is covered by the East Contra Costa County HCP/NCCP. The species is known from the vicinity of the study area and there is suitable habitat in the study area. No evidence of Burrowing Owls was observed during reconnaissance level habitat and wildlife surveys or other surveys within the study area. Regardless, focused surveys may result in documentation of this species within the study area. If present, construction could result in direct mortality of special status-species, such as by vehicle strikes, or earthwork in areas with sensitive plants or burrows hosting sensitive wildlife. To further reduce potential impacts to the species, **MM 3.3-1** through **3.3-3**, and **3.3-8** would be implemented and addresses this impact by requiring pre-construction surveys, limited construction windows, avoidance, awareness training, habitat compensation, and other mitigation.

LOGGERHEAD SHRIKE

Loggerhead Shrike is a CDFW SSC. This species could potentially nest and forage within the study area. Direct impacts to the species during construction and operations/maintenance are considered unlikely as the species is highly mobile. However, construction could result in direct mortality of special status-species, such as by cutting of trees with active nests. To further reduce potential impacts to the species, **MM 3.3-1** through **3.3-3**, and **3.3-8** would be implemented and addresses this impact by requiring pre-construction surveys, limited construction windows, avoidance, awareness training, habitat compensation, and other mitigation.

CALIFORNIA GULL

California Gull is a USFWS BCC and CDFW Watch List species. While the study area does not provide suitable nesting habitat, it does provide suitable foraging habitat for the species. Future construction activities could result in direct mortality of special status-species, such as by cutting of trees with active nests. To further reduce potential impacts to the species, **MM 3.3-1** through **3.3-3**, and **3.3-8** would be implemented and addresses this impact by requiring pre-construction surveys, limited construction windows, avoidance, awareness training, habitat compensation, and other mitigation.

SPECIAL-STATUS BATS

The Pallid Bat and Western red bat are both CDFW Species of Special Concern. The Hoary bat is also included on the CDFW Special Animals List. All three bat species have the potential to roost and/or forage within the study area. The study area provides marginal roosting habitat for the Pallid bat and provides suitable foraging habitat. While a bridge is present in the study area (over the Contra Costa Canal), the bridge is low-hanging over the water, and thus, is not suitable for bat roosting. The Western red bat has limited roosting habitat due to few mature riparian trees in the study area. The hoary bat is a solitary rooster and roosts exclusively in trees.

Future construction activities could result in direct mortality of special status-species, such as by cutting of trees with active nests or earthworks in areas hosting sensitive wildlife. To further reduce potential impacts to the species, **MM 3.3-1** through **3.3-3**, and **3.3-10** would be implemented and addresses this impact by requiring pre-construction surveys, limited construction windows, avoidance, awareness training, habitat compensation, and other mitigation.

AMERICAN BADGER

American badger is a CDFW SSC. This species is not covered by the East Contra Costa County HCP/NCCP. No badger occurrences are documented the vicinity of the study area, and no potential dens were observed within the study area. In addition, soils within the study area are not particularly suitable for the species to use for burrowing. However, the species is known from the broader vicinity, and based on overall habitats present, there is some potential that a badger could be present in the study area. If present, construction activities could result in direct mortality of special status-species, such as by vehicle strikes, or earthwork in areas with sensitive plants or burrows hosting sensitive wildlife. To further reduce potential impacts to the species, **MM 3.3-1** through **3.3-3**, and **3.3-12** would be implemented and addresses this impact by requiring pre-construction surveys, limited construction windows, avoidance, awareness training, habitat compensation, and other mitigation.

SAN JOAQUIN POCKET MOUSE

San Joaquin pocket mouse is included on the CDFW Special Animals List. This species is not covered by the East Contra Costa County HCP/NCCP. The study area does not contain the characteristic friable soils required by the species, and therefore, onsite habitat is considered of lower quality. This species has been documented approximately 3.3 miles southeast of the study area. Given that the species is known from areas with habitat connectivity to the study area, it could potentially occur in the study area. If present, construction activities could result in direct mortality of special status-species, such as by vehicle strikes, or earthwork in areas with sensitive plants or burrows hosting sensitive wildlife. To further reduce potential impacts to the species, **MM 3.3-1** through **3.3-3**, and **3.3-11** would be implemented and addresses this impact by requiring pre-construction surveys, limited construction windows, avoidance, awareness training, habitat compensation, and other mitigation.

MONARCH BUTTERFLY

Monarch butterfly is an ESA candidate species. Monarch butterfly was not observed during field surveys. However, with milkweed present in and around the study area, there is potential for monarch butterflies and their larvae to be present. Impacts have the potential to rise to a significant level. If present, construction activities could result in direct mortality of special status-species, such as by vehicle strikes, or earthwork in areas with sensitive plants hosting sensitive wildlife. To further reduce potential impacts to the species, **MM 3.3-1** through **3.3-3**, and **3.3-6** would be implemented and addresses this impact by requiring pre-construction surveys, limited construction windows, avoidance, awareness training, habitat compensation, and other mitigation.

Indirect Impacts

FEDERAL AND/OR STATE LISTED SPECIES

TRI-COLORED BLACKBIRD

The study area provides marginal foraging habitat for Tricolored Blackbird. Project construction could destroy habitats or other resources utilized by special-status species, indirectly impacting their populations. Project construction could also degrade habitat either temporarily or permanently through indirect means such as on- or off-site water quality impacts, fugitive dust, and increased noise levels due to heavy equipment operations. Ongoing operation of the projects could result in off-site impacts to special-status species and their habitats. For example, noise or light from operations could disturb wildlife behavior patterns. Implementation of **MM 3.3-1** and **3.3-3** would address this impact by requiring water-quality protections, limited construction windows, avoidance, awareness training, setbacks from off-site open space and providing compensation for lost habitat.

BALD EAGLE

The study area provides limited suitable foraging habitat for the species. Project construction could destroy habitats or other resources utilized by special-status species, indirectly impacting their populations. Project construction could also degrade habitat either temporarily or permanently through indirect means such as on- or off-site water quality impacts, fugitive dust, and increased noise levels due to heavy equipment operations. Ongoing operation of the projects could result in off-site impacts to special-status species and their habitats. For example, noise or light from operations could disturb wildlife behavior patterns. Implementation of **MM 3.3-1** and **3.3-3** would address this impact by requiring water-quality protections, limited construction windows, avoidance, awareness training, setbacks from off-site open space and providing compensation for lost habitat.

CALIFORNIA RED-LEGGED FROG

The study area is within dispersal distance of a documented breeding pond, and the proposed project could eliminate or degrade upland habitat that may be used by CRF for dispersal and/or refugia. Project construction could also degrade habitat either temporarily or permanently through indirect means such as on- or off-site water quality impacts, fugitive dust, and increased noise levels due to heavy equipment operations. Ongoing operation of the projects could result in off-site impacts to special-status species and their habitats. For example, noise or light from operations could disturb wildlife behavior patterns. Implementation of **MM 3.3-1** and **3.3-3** would address this impact by requiring water-quality protections, limited construction windows, avoidance, awareness training, setbacks from off-site open space and providing compensation for lost habitat.

CALIFORNIA TIGER SALAMANDER

Development of the study area would reduce upland habitat available to CTS breeding in nearby ponds. Project construction could also degrade habitat either temporarily or permanently through indirect means such as on- or off-site water quality impacts, fugitive dust, and increased noise levels due to heavy equipment operations. Ongoing operation of the projects could result in off-site impacts to special-status species and their habitats. For example, noise or light from operations could disturb wildlife behavior patterns. Implementation of **MM 3.3-1** and **3.3-3** would address this

impact by requiring water-quality protections, limited construction windows, avoidance, awareness training, setbacks from off-site open space and providing compensation for lost habitat.

SAN JOAQUIN KIT FOX

Project construction could destroy habitats or other resources utilized by this species, indirectly impacting their populations. Project construction could also degrade their habitat either temporarily or permanently through indirect means such as on- or off-site water quality impacts, fugitive dust, and increased noise levels due to heavy equipment operations. Ongoing operation of the projects could result in off-site impacts to this species and their habitats. For example, noise or light from operations could disturb wildlife behavior patterns. Implementation of **MM 3.3-1** and **3.3-3** would address this impact by requiring water-quality protections, limited construction windows, avoidance, awareness training, setbacks from off-site open space and providing compensation for lost habitat.

CROTCH'S BUMBLE BEE

Project construction could destroy habitats or other resources utilized by this species, indirectly impacting their populations. Project construction could also degrade their habitat either temporarily or permanently through indirect means such as on- or off-site water quality impacts, fugitive dust, and increased noise levels due to heavy equipment operations. Ongoing operation of the projects could result in off-site impacts to this species and their habitats. For example, noise or light from operations could disturb wildlife behavior patterns. Implementation of **MM 3.3-1** and **3.3-3** would address this impact by requiring water-quality protections, limited construction windows, avoidance, awareness training, setbacks from off-site open space and providing compensation for lost habitat.

WESTERN POND TURTLE

Project construction could destroy habitats or other resources utilized by this species, indirectly impacting their populations. Project construction could also degrade their habitat either temporarily or permanently through indirect means such as on- or off-site water quality impacts, fugitive dust, and increased noise levels due to heavy equipment operations. Ongoing operation of the projects could result in off-site impacts to this species and their habitats. For example, noise or light from operations could disturb wildlife behavior patterns. Implementation of **MM 3.3-1** and **3.3-3** would address this impact by requiring water-quality protections, limited construction windows, avoidance, awareness training, setbacks from off-site open space and providing compensation for lost habitat.

OTHER SPECIAL-STATUS SPECIES

WHITE-TAILED KITE

Future project-related disturbance could potentially impact the onsite foraging and nesting habitat for White-tailed Kite. Indirect impacts to the onsite foraging and nesting habitat for the species could also result in loss of their nests, eggs, and young. Impacts have the potential to rise to a significant level. However, to reduce the potential indirect impacts to this species and its habitat, **MM 3.3-1** and **3.3-3** would be implemented. These measures address this impact by requiring limited construction windows, avoidance, awareness training, setbacks from off-site open space and providing compensation for lost habitat.

3.3 BIOLOGICAL RESOURCES

COOPER'S HAWK

Future development projects in the Plan Area could have an indirect impact to the species by disturbing, removing, or modifying suitable habitat for the species. Indirect impacts to the onsite foraging and nesting habitat for Cooper's Hawk could also result in loss of Cooper's Hawk nests, eggs, and young. Impacts have the potential to rise to a significant level. However, to reduce the potential indirect impacts to this species and its habitat, **MM 3.3-1** and **3.3-3** would be implemented. These measures address this impact by requiring limited construction windows, avoidance, awareness training, setbacks from off-site open space and providing compensation for lost habitat.

GOLDEN EAGLE

Future development projects in the Plan Area could have an indirect impact on the species by disturbing, removing, or modifying suitable habitat. Indirect impacts to the onsite foraging and nesting habitat for Golden Eagle could also result in loss of nests, eggs, and young. Impacts have the potential to rise to a significant level. However, to reduce the potential indirect impacts to this species and its habitat, **MM 3.3-1** and **3.3-3** would be implemented. These measures address this impact by requiring limited construction windows, avoidance, awareness training, setbacks from off-site open space and providing compensation for lost habitat.

BURROWING OWL

Subsequent development projects within the Plan Area could have an indirect impact on Burrowing Owls by destroying or degrading potential habitat for this species. Indirect impacts to the onsite foraging and nesting habitat for Burrowing Owls could also result in loss of nests, eggs, and young. Impacts have the potential to rise to a significant level. However, to reduce the potential indirect impacts to this species and its habitat, **MM 3.3-1** and **3.3-3** would be implemented. These measures address this impact by requiring limited construction windows, avoidance, awareness training, setbacks from off-site open space and providing compensation for lost habitat.

LOGGERHEAD SHRIKE

Future development projects in the Plan Area could have an indirect impact to the species by disturbing, removing, or modifying suitable habitat. Indirect impacts to the onsite foraging and nesting habitat for Loggerhead Shrike could also result in loss of nests, eggs, and young. Impacts have the potential to rise to a significant level. However, to reduce the potential indirect impacts to this species and its habitat, **MM 3.3-1** and **3.3-3** would be implemented. These measures address this impact by requiring limited construction windows, avoidance, awareness training, setbacks from off-site open space and providing compensation for lost habitat.

CALIFORNIA GULL

Future project-related disturbance could potentially impact the onsite foraging habitat for California Gull. Therefore, the loss of a nest of foraging habitat is considered a potentially significant impact. However, to reduce the potential indirect impacts to this species and its habitat, **MM 3.3-1** and **3.3-3** would be implemented. These measures address this impact by requiring limited construction windows, avoidance, awareness training, setbacks from off-site open space and providing compensation for lost habitat.

SPECIAL-STATUS BATS

Future development projects in the Plan Area could have an indirect impact to special-status bat species by disturbing, removing, or modifying suitable roosting and foraging habitat. Impacts to special-status bat habitat could rise to a significant level. However, to reduce the potential indirect impacts to this species and its habitat, **MM 3.3-1** and **3.3-3** would be implemented. These measures address this impact by requiring limited construction windows, avoidance, awareness training, setbacks from off-site open space and providing compensation for lost habitat.

AMERICAN BADGER

Project construction could destroy habitats or other resources utilized by this species, indirectly impacting their populations. Project construction could also degrade their habitat either temporarily or permanently through indirect means such as on- or off-site water quality impacts, fugitive dust, and increased noise levels due to heavy equipment operations. Ongoing operation of the projects could result in off-site impacts to this species and their habitats. For example, noise or light from operations could disturb wildlife behavior patterns. Implementation of **MM 3.3-1** and **3.3-3** would address this impact by requiring water-quality protections, limited construction windows, avoidance, awareness training, setbacks from off-site open space and providing compensation for lost habitat.

SAN JOAQUIN POCKET MOUSE

Project construction could destroy habitats or other resources utilized by this species, indirectly impacting their populations. Project construction could also degrade their habitat either temporarily or permanently through indirect means such as on- or off-site water quality impacts, fugitive dust, and increased noise levels due to heavy equipment operations. Ongoing operation of the projects could result in off-site impacts to this species and their habitats. For example, noise or light from operations could disturb wildlife behavior patterns. Implementation of **MM 3.3-1** and **3.3-3** would address this impact by requiring water-quality protections, limited construction windows, avoidance, awareness training, setbacks from off-site open space and providing compensation for lost habitat.

MONARCH BUTTERFLY

Project construction could destroy habitats or other resources utilized by this species, indirectly impacting their populations. Project construction could also degrade their habitat either temporarily or permanently through indirect means such as on- or off-site water quality impacts, fugitive dust, and increased noise levels due to heavy equipment operations. Ongoing operation of the projects could result in off-site impacts to this species and their habitats. For example, noise or light from operations could disturb wildlife behavior patterns. Implementation of **MM 3.3-1** and **3.3-3** would address this impact by requiring water-quality protections, limited construction windows, avoidance, awareness training, setbacks from off-site open space and providing compensation for lost habitat.

Conclusion

Future development projects within the Plan Area could result in the direct loss or indirect disturbance of special-status plants or animal species and/or their habitats. Impacts to special-status species and/or their habitats could result in a substantial reduction in local population size, lowered

reproductive success, or habitat fragmentation. Potentially significant impacts on special-status species associated with individual subsequent projects could include:

- direct mortality from the collapse of underground burrows, resulting from soil compaction;
- direct mortality resulting from the movement of equipment and vehicles through the Plan Area;
- direct mortality resulting from removal of trees with active nests;
- direct mortality or loss of suitable habitat resulting from the trimming or removal of obligate host plants;
- direct mortality resulting from fill of wetlands features;
- loss of breeding and foraging habitat resulting from the filling of seasonal or perennial wetlands;
- loss of breeding, foraging, and refuge habitat resulting from the permanent removal of riparian vegetation;
- loss of suitable habitat for vernal pool invertebrates resulting from the destruction or degradation seasonal wetlands;
- abandoned eggs or young and subsequent nest failure for special status nesting birds, including raptors, and other non-special status migratory birds resulting from construction-related noises;
- loss or disturbance of rookeries and other colonial nests;
- loss of suitable foraging habitat for special status raptor species;
- loss of migration corridors resulting from the construction of permanent structures or features; and
- impacts to species associated with waterways.

The proposed Specific Plan sets policies and actions for future development in the Plan Area, but it does not envision or authorize any specific development project. Because of this, the site-specific details of potential future development projects are currently unknown and analysis of potential impacts of specific projects is not feasible. Without mitigation measures incorporated, future development has the potential to result in **significant impacts** to protected special-status plant and animal species, and their habitat.

Mitigation Measures

MM 3.3-1: Project Coverage under ECC HCP/NCCP

Each applicant will be required to obtain coverage for the project under the East Contra Costa HCP/NCCP. This shall include submittal of all required application materials per HCP/NCCP Section 6.2.1 and payment of a Development Fee and applicable fees for wetland impacts and/or stream corridor encroachments consistent with current HCP/NCCP requirements. Alternatively, the applicant may, in accordance with the terms of Chapter 15.108 PMC, offer to dedicate land in lieu of some or all of the HCP/NCCP Development Fee.

All applicable fees shall be paid, and/or an “in-lieu-of-fee” agreement fully executed, prior to the issuance of a grading permit for the project. If a grading permit is not required, fee

payment and/or an “in-lieu-of-fee” agreement shall be fully executed prior to issuance of the project’s building permit. Proof of applicable fees and/or “in-lieu-of-fee” agreement shall be provided to the City of Pittsburg Community and Economic Development Director as a condition of approval for future projects under the Specific Plan.

MM 3.3-2: Worker Awareness Training for Biological Resources

Each applicant will be required to provide Worker Environmental Awareness training to all construction personnel. The WEAP shall include the following information.

- The sensitive habitats on the study area.
- Special-status species known or potentially present within the study area, including their:
 - Listing status and causes of decline,
 - Habitat preferences, and
 - Distinguishing physical characteristics.
- The measures (AMMs and East Contra Costa HCP/NCCP measures) required to protect sensitive habitats and special-status species, including next steps and notifications in the event of a special-status species sighting.

The WEAP shall include a hard copy handout that summarizes information presented in the training and includes photographs of habitat resources and species to facilitate identification in the field by construction personnel.

Each applicant shall ensure that all construction personnel undergo WEAP training before they begin work. Training shall be delivered by a qualified biologist approved by the City of Pittsburg Community Development Director and shall be provided bilingually in English and Spanish if appropriate.

MM 3.3-3: Adherence to ECC HCP/NCCP Requirements

Each applicant shall ensure that the project adheres to all applicable East Contra Costa HCP/NCCP requirements.

Pre-Construction Surveys

Planning surveys per HCP/NCCP Section 6.3.1 were completed in 2018 – 2023. Based on the outcomes of the planning surveys, preconstruction surveys by USFWS- and CDFW-approved biologists shall be conducted for the following species per HCP/NCCP Sections 6.3.2:

- Golden Eagle
- Burrowing Owl
- Swainson’s Hawk
- San Joaquin kit fox

If preconstruction surveys determine that any of the above species is present on the site (or, for the bird species, within a distance where they could be disturbed by construction

activity), the biologist may recommend construction monitoring; if so, then each applicant shall ensure that monitoring is conducted per HCP/NCCP Section 6.3.3. This will include submittal of a Construction Monitoring Plan (CMP) to the East Contra Costa County Habitat Conservancy for approval; the CMP must be submitted and approved prior to issuance of the grading permit (or, if no grading permit is required, the building permit) for the proposed project.

Based on results of the planning surveys, which indicate that no suitable habitat is available in the study area, preconstruction surveys and construction monitoring are not required for the following species:

- Covered shrimp species
- Giant garter snake
- Townsend's big-eared bat

Jurisdiction Delineations

A delineation of jurisdictional wetlands and other waters shall be conducted within the study area per HCP Sections 6.2.1 and 6.3.1.

Each applicant shall also comply with all applicable provisions of East Contra Costa HCP/NCCP Section 6.4, Specific Conditions on Covered Activities, as follows:

- **Section 6.4.1: Landscape-Level Measures**
 - Conservation Measure 1.10 – Maintain Hydrologic Conditions and Minimize Erosion
 - Conservation Measure 1.11 – Avoid Direct Impacts on Extremely Rare Plants, Fully Protected Wildlife Species [and] Covered Migratory Birds
 - Conservation Measure 1.7 – Establish Stream Setbacks
 - Conservation Measure 1.14 – Design Requirements for Covered Roads outside the UDA
- **Section 6.4.2: Natural Community-Level Measures**
 - Conservation Measure 2.12 – Wetland, Pond, and Stream Avoidance and Minimization
- **Section 6.4.3: Species-Level Measures for the following species**
 - California tiger salamander
 - Burrowing Owl
 - Golden Eagle
 - Swainson's Hawk
 - San Joaquin kit fox
 - California Red-legged Frog

MM 3.3-4: Rare Plant Survey & Protection

MM 3.3-4a. If project construction begins in 2025 or later, an updated protocol-level rare plant survey shall be conducted by a qualified biologist/botanist who is familiar with the rare

plants of the project region. Surveys shall be submitted to the City of Pittsburg Community and Economic Development Director and approved by the Conservancy. Surveys shall be conducted prior to construction, with enough lead time to allow for the follow-up actions described below, if they are warranted. Surveys shall be conducted during the peak blooming periods of the target species and shall cover all potentially suitable habitats within the study area and surrounding 250-foot-wide buffer. Target species and blooming periods are listed in the table below; the table is highlighted to group species with similar blooming periods. If no special-status plants are documented within the area to be disturbed for project construction (including staging and access), no further action is required.

<i>SPECIES</i>	<i>BLOOMING PERIOD</i>
Lobb's aquatic buttercup (<i>Ranunculus lobbii</i>)	February – May
Johnny-nip (<i>Castilleja ambigua</i> var. <i>ambigua</i>)	March – August
Showy golden madia (<i>Madia radiata</i>)	March – May
California alkali grass (<i>Puccinellia simplex</i>)	March – May
California androsace (<i>Androsace elongata</i> ssp. <i>acuta</i>)	March – June
Stinkbells (<i>Fritillaria agrestis</i>)	March – June
Diablo helianthella (<i>Helianthella castanea</i>)	March – June
Hogwallow starfish (<i>Hesperis matronalis</i>)	March – June
Stinkbells (<i>Fritillaria agrestis</i>)	March – June
Mt. Diablo jewelflower (<i>Streptanthus hispidus</i>)	March – June
Sylvan microseris (<i>Microseris sylvatica</i>)	March – June
Little mouse-tail (<i>Myosurus minimus</i> ssp. <i>apus</i>)	March – June
Small-flowered morning-glory (<i>Convolvulus simulans</i>)	March – July
Keck's checkerbloom (<i>Sidalcea keckii</i>)	April – May, sometimes into June
Mt. Diablo fairy-lantern (<i>Calochortus pulchellus</i>)	April – June
Tehama navarretia (<i>Navarretia heterandra</i>)	April – June
Adobe navarretia (<i>Navarretia nigelliformis</i> ssp. <i>nigelliformis</i>)	April – June
Saline clover (<i>Trifolium hydrophilum</i>)	April – June
Baker's navarretia (<i>Navarretia leucocephala</i> ssp. <i>bakeri</i>)	April – July
Shining navarretia (<i>Navarretia nigelliformis</i> ssp. <i>radians</i>)	April – July
Pappose tarplant (<i>Centromadia parryi</i> ssp. <i>parryi</i>)	May – November
Parry's rough tarplant (<i>Centromadia parryi</i> ssp. <i>rudis</i>)	May – October
Woolly-headed lessingia (<i>Lessingia hololeuca</i>)	June – October
Big tarplant (<i>Blepharizonia plumosa</i>)	July – October
Mt. Diablo buckwheat (<i>Eriogonum truncatum</i>)	September, sometimes into November/December

MM 3.3-4b. If special-status plants covered by the East Contra Costa HCP/NCCP, or plants designated as “no take” by the East Contra Costa HCP/NCCP, are present in the Plan Area, the relevant survey report(s) shall be submitted to the City of Pittsburg community and Economic Development Director and approved by the Conservancy per HCP/NCCP Section 6.3.1.

If any of the following species covered by the East Contra Costa HCP/NCCP are found to be present in the Plan Area, each applicant shall promptly notify the City of Pittsburg Community and Economic Development Director and the Conservancy of the species’ presence and the planned construction schedule, to enable the Conservancy to salvage the occurrence(s) in accordance with HCP/NCCP Conservation Measure 3.10 (Plant Salvage when Impacts Are Unavoidable). Each applicant shall confirm with the City and the Conservancy that the take limits established by the HCP/NCCP for the species in question have not been breached:

- Big tarplant
- Mount Diablo fairy lantern
- Diablo helianthella
- Showy golden madia
- Adobe navarretia

Under no circumstance shall any of the following HCP/NCCP “no-take” plants be harmed:

- Large-flowered fiddleneck
- Alkali milkvetch
- Mt. Diablo buckwheat
- Diamond-petaled poppy
- Contra Costa goldfields
- Caper-fruited tropidocarpum

Due to their extreme rarity, none of these species listed above are expected to be present within the Plan Area, but if any are found, each applicant shall notify the city of Pittsburg Community and Economic Development Department and the Conservancy immediately and shall work with the Conservancy to determine and execute the appropriate course of action.

MM 3.3-4c. If any special-status plant not covered by the East Contra Costa HCP/NCCP is found to be present, the occurrence(s) shall be avoided and protected in place to the extent feasible. If the occurrence(s) cannot be entirely avoided, then a Plant Salvage and Mitigation Plan shall be prepared and implemented. The Plan shall be prepared by a qualified biologist/botanist who is familiar with the rare plants of the project region and has experience conducting rare plant salvage operations. Plant salvage techniques shall be consistent with those outlined in HCP/NCCP Conservation Measure 3.10. The plan shall, at a minimum, include the following.

- Quantity and species of plants to be planted or transplanted
- Location of the mitigation/transplant site(s)
- Salvage methods, such as relocation/transplantation, seed collection, etc., including storage locations and methods to preserve the plants
- Procedures for propagating collected seed, including storage methods
- Planting procedures, including the use of soil preparation and irrigation
- Schedule and action plan to maintain and monitor the mitigation/transplant site for a minimum 3-year period
- Interim and final success criteria and corrective action thresholds (e.g., growth, plant cover, survivorship)
- Potential corrective actions/contingency measures in the event interim success criteria are not being met (e.g., weed removal, supplemental irrigation, supplemental plantings, etc.).
- Reporting requirements and procedures, including the contents of annual progress reports, report submittals, review/approval responsibilities, etc.

Each applicant shall be responsible for ensuring that the Plant Salvage and Mitigation Plan is implemented. The Plan shall be implemented under the oversight of the biologist/botanist who prepared it or another individual with equivalent qualifications. The biologist shall be approved by the City of Pittsburgh Community and Economic Development Department Director.

MM 3.3-5: Special-Status Bumble Bee Surveys & Protection

No more than one year prior to the initiation of vegetation removal and grading in the project area, each applicant shall retain an appropriately qualified biologist (see next paragraph) who has been approved by the City of Pittsburgh Community and Economic Development Department Director to conduct surveys for Crotch bumble bee, obscure bumble bee, and American bumble bee. Biologist qualifications for bumble bee surveys will conform to current CDFW guidance prevailing at the time surveys are performed.

Surveys shall be performed by a qualified entomologist familiar with the species' behavior. If surveys are performed prior to CESA (and if applicable, ESA) listing for any species, they shall comprise the following activities, consistent with CDFW's *Survey Considerations for CESA Candidate Bumble Bee Species*. In the event any bumble bee species is listed at the time of survey, surveys will instead adhere to the protocol(s) adopted by the listing agency/agencies (CDFW and/or USFWS).

- Surveys shall be conducted during each species' peak worker activity period. Surveys shall cover all areas of onsite habitat determined by the biologist to be suitable for any of the three target bumble bee species, based on habitat mapping conducted for the project to date. A minimum of three to four surveys shall be conducted, spaced two weeks apart; the total number, timing, and duration of surveys performed shall depend on the biologist's judgment, in consideration of weather, site conditions, and protocol requirements. Surveys shall be designed to

identify all foraging bumble bee species; a single survey may be used to detect all species with peak activity periods including the survey date.

- If Crotch bumble bee, obscure bumble bee, or American bumble bee is observed onsite during the surveys, an additional survey or surveys shall be conducted to determine whether a nest or colony is present, unless the biologist is satisfied that the initial survey(s) were sufficient to rule out the presence of nests/colonies.
- If a nest or colony is present onsite, the biologist shall establish an appropriate avoidance buffer determined in consideration of site conditions, the species involved, and the construction activities planned prior to the close of the nesting season. No entry into the buffer shall be permitted. The buffer shall be delineated in the field using orange construction fencing or another appropriate medium, under the biologist's oversight, and shall remain in place until the end of the nesting species' gyne flying season, or until the qualified biologist determines that the nest has been abandoned.
- If no nest/colony is present onsite, no further action will be taken. However, all workers shall be required to avoid injury and mortality to bumble bees they may encounter; this requirement shall be discussed during the WEAP training and shall be reiterated to all workers if special-status bumble bees are confirmed onsite.
- To support improved understanding and conservation of all three bumble bee species, survey results, including negative findings, shall be submitted to CDFW prior to implementing project-related ground-disturbing activities. At a minimum, the survey report shall include the following information.
 1. A description and map of the survey area, focusing on areas that could provide suitable habitat for Crotch bumble bee, obscure bumble bee, or American bumble bee
 2. Field survey conditions, including name(s) of qualified entomologist(s) and brief qualifications; date(s) and time(s) of survey; survey duration; general weather conditions; survey goals; and species searched
 3. Map(s) showing the location of nests/colonies, if any
 4. A description of physical (e.g., soil, moisture, slope) and biological (e.g., plant composition) conditions where each nest/colony is found, including native plant composition (e.g., density, cover, and abundance) within impacted habitat (e.g., species list separated by vegetation class; density, cover, and abundance of each species)
 5. The measures that will be implemented to avoid adverse effects on the bumble bee species present
 6. An assessment of potential project effects on special-status bumble bees during project construction and project operation/maintenance, with avoidance and minimization measures in place.

MM 3.3-6: Monarch Butterfly Protection

The following measures will be required to protect monarch butterflies prior to ESA (and, if applicable, CESA) listing. In the event monarch butterfly is ESA- and/or CESA-listed at the time of project construction, monarch butterfly protection requirements will instead adhere to the protocol(s) adopted by the listing agency/agencies (CDFW and/or USFWS).

- No more than two days prior to the initiation of vegetation trimming or removal for construction, each applicant shall ensure that a qualified biologist approved by the City of Pittsburgh Community Development Director surveys all areas of potentially suitable habitat for monarch butterfly larval host plants.
- If host plants are found, the biologist shall survey all host plants for monarch eggs, larvae, and pupae. If no eggs, larvae, or pupae are found, plants may be removed within two days.
- If eggs, larvae, or pupae are present, host plants shall be protected in place until the biologist has determined that no more eggs, larvae, or pupae are present.

MM 3.3-7: Western Pond Turtle Protection

The following measures will be required to protect western pond turtles prior to ESA (and, if applicable, CESA) listing. In the event western pond turtle is ESA- and/or CESA-listed at the time of project construction, western pond turtle protections will instead adhere to the protocol(s) adopted by the listing agency/agencies (CDFW and/or USFWS).

- Prior to the start of construction activities, each applicant shall ensure that a qualified biologist approved by the City of Pittsburgh Community Development Director conducts a pedestrian preconstruction survey of the study area and adjacent suitable habitat for western pond turtle.
- The survey shall be conducted no more than 24 hours prior to start of work and shall include walking the work area limits and interior and investigating all areas that could be used by the species.
- If western pond turtle individuals are found, the biologist shall relocate them to suitable habitat outside the disturbance area and far enough away that they would not be expected to return.
- If the biologist determines that it is warranted, exclusion measures shall be implemented to prevent individuals returning to the active work site.

The same requirements will apply for operations and maintenance activities with the potential to affect western pond turtle habitat.

MM 3.3-8: Nesting Bird Protection (General)

If project-related disturbance (e.g., vegetation removal or trimming, clearing/grubbing, grading) commences any time during the nesting/breeding season of native bird species potentially nesting in or near the Plan Area (February 1 – August 31 for most species; January 1 through August 31 for Golden Eagle; March 15 – September 15 for Swainson’s Hawk), a preconstruction survey for nesting birds shall be conducted by a qualified biologist approved by the City of Pittsburgh Community Development Director, using binoculars. The survey shall take place no more than two weeks prior to the initiation of work.

If active nests are found in areas that could be directly affected or are within 300 feet of disturbance activities and would be subject to prolonged noise, a no-disturbance buffer zone shall be created around active nests for the remainder of the breeding season or until the biologist determines that all young have fledged or that the nest has been abandoned. No entry into the no-activity buffer shall be permitted. The no-activity buffer shall be delineated in the field by or under the supervision of the biologist, using temporary construction fencing or another suitable low-impact medium. The size of the buffer zone(s) shall be determined by the biologist based on the species involved, the amount of vegetative and other screening between the nest and areas where construction activity shall take place, and, if appropriate, other site-specific factors. The minimum buffer width shall be 50 feet for species other than raptors, and a minimum of 500 feet for raptor species other than Golden Eagle and Swainson’s Hawk, and may be enlarged by taking into account factors such as the following:

- Noise and human disturbance levels at the construction site at the time of the survey and the noise and disturbance expected during the construction activity.
- Sensitivity of nesting species and behaviors of the individual nesting birds.

If nesting Swainson’s Hawk or Golden Eagle are observed, buffers and other avoidance measures shall conform to Species-Level Measures for these species as laid out in East Contra Costa HCP/NCCP Section 6.4.3. or current CDFW requirements, whichever is greater.

MM 3.3-9: Nesting Bird Protection (Bald Eagle)

The following requirements apply to construction and to operations and maintenance that involves disturbance that could affect nesting activity, such as vegetation removal or trimming, clearing/grubbing, and grading.

Bald Eagle nests may be built throughout the year. Consequently, each applicant shall retain a qualified biologist approved by the City of Pittsburgh Community Development Director to conduct a preconstruction survey for nesting Bald Eagles prior to the initiation of work at the site (including vegetation removal or trimming, clearing/grubbing, grading, etc.). The survey shall be conducted using binoculars and shall take place no more than two weeks prior to the initiation of work.

If an occupied or active nest is present, construction-related activity shall be prohibited within 0.5 mile of the nest unless site-specific conditions or the nature of the construction activity (e.g., dense vegetation, limited noise generation, limited activities) indicate that a smaller buffer could be appropriate or that a larger buffer should be implemented. The biologist shall coordinate with the East Contra Costa County Habitat Conservancy, CDFW, and USFWS to determine the appropriate buffer size.

The nest buffer shall be delineated in the field using temporary construction fencing or another suitable low-impact medium. Buffer fencing shall be placed only on the Plan Area; the buffer shall not be put in place on neighboring properties not involved in project construction and staging.

Construction shall be monitored by a qualified biologist to ensure that the buffer remains in place and that no construction activities occur within the buffer zone until the biologist has determined that the young have fledged or that the nest has been abandoned.

MM 3.3-10: Special-Status Bat Survey & Protection

Prior to the initiation of any activity that could disturb roosting bats (including vegetation trimming/removal, surveys involving the use of lasers that produce high-frequency sounds, drilling, or other activity producing high-frequency sounds, a qualified biologist (as stipulated in Section 5 of H.T. Harvey & Associates 2019, and subject to approval by the City of Pittsburg Community Development Director) shall conduct a habitat evaluation for special-status bats, focusing on the needs of pallid bat, western red bat, and hoary bat, the species identified by planning surveys as having potential to be present on the site. For purposes of this AMM, high frequency sound is defined as sound in the 20 kHz – 50 kHz frequency range, based on bat disturbance information in California Department of Transportation (Caltrans) bat mitigation guidelines (ibid). If Caltrans guidance is updated, or if frequency sensitivity information relevant to the bat species with potential to occur becomes available prior to project construction, this definition shall be updated accordingly.

Surveys shall include the entirety of the study area plus a 400-foot-wide buffer. If no roosting habitat suitable for these species is present on the study area, no further action is required. If roosting habitat is present, the following additional requirements shall apply. Any potential roost trees/other potential roosting habitat shall also be considered potential bat maternity roosts.

- Before any activities with the potential to disturb roosting bats begin, the approved biologist(s) shall conduct focused surveys for roost occupancy. These shall be conducted at least two weeks prior to the start of work and shall include:
 - Daytime visual surveys for bats and evidence of bat presence such as guano or urine staining
 - Evening emergence and acoustic surveys

If bat presence is confirmed, the species, number of individuals, and roost type (maternity/non-maternity) shall be documented and reported to the CNDDDB. Bats shall not be disturbed or relocated during the surveys.

- Confirmed non-maternity roosts shall be protected by buffers. Buffers shall be delineated in the field with temporary construction fencing or another suitable measure, installed under biologist oversight. Note that buffer distances vary depending on the species and the type of noise/disturbance involved. (If bat species other than those addressed here are encountered, buffer distances shall be consistent with H.T. Harvey & Associates 2019). The biologist shall coordinate with construction staff to determine the appropriate buffer width; if there is uncertainty, the more conservative buffer width shall prevail.

If a confirmed roost must be removed or trimmed for construction, or if work must occur within the buffers laid out above, work shall be restricted to daylight hours when the CDFW approved biologist has confirmed that it the roost is not occupied, and shall be overseen by the biologist to prevent injury or mortality. The biologist shall have authority to divert or stop work in the event of excessive risk to bats.

- Confirmed maternity roosts shall be protected by the same buffers identified above. Maternity roosts shall not be removed unless removal cannot be avoided, and in no case shall a confirmed maternity roost be removed during the breeding/non-volant season (April – August). If removal of a maternity roost is necessary, each applicant shall consult with CDFW to determine appropriate compensatory mitigation such as the provision of bat boxes and shall submit a Bat Habitat Mitigation Plan for DFW approval. Consultation and submittal of the Mitigation Plan shall occur prior to the removal, and the removal shall not take place until CDFW has approved the Plan. Each applicant shall then be responsible for implementing CDFW-approved mitigation for removal of bat maternity roost habitat.

MM 3.3-11: San Joaquin Pocket Mouse Protection

Vegetation removal, clearing/grubbing, and grading activities shall be conducted in a uniform direction to allow mobile animals such as San Joaquin pocket mouse the ability to escape the disturbance area into adjacent undisturbed habitat. Project construction shall also avoid the creation of fragmented islands of habitat where individuals may become trapped, isolated from resources, and at risk from eventual clearing/grading operations.

MM 3.3-12: American Badger Survey & Protection

Each applicant shall ensure that a qualified biologist approved by the City of Pittsburgh Community Development Director conduct a preconstruction survey for American badger den sites. The survey shall be conducted no more than four weeks before the commencement of ground disturbance.

If an occupied den is found, and young are not present, then any badgers present shall be removed from the den either by the use of appropriate exclusionary devices or by trapping

and relocation. The removal method shall be approved by CDFW prior to implementation; if trapping and relocation are used, it shall be carried out by biologist(s) with all required permits for badger handling. Any trapped badgers shall be relocated to other suitable habitat at least 500 feet outside the study area boundary. Once any badgers are excluded or trapped and relocated, den(s) shall be excavated by hand and backfilled to prevent reoccupation. Exclusion shall continue until the badgers are successfully removed from the site, as determined by the biologist.

Badgers shall not be excluded or relocated if it is determined by the biologist that young are or may be present. Any occupied dens shall be protected with a 50-foot-wide no-activity buffer. The buffer shall be delineated in the field by a qualified biologist, using temporary construction fencing or another appropriate low-impact medium, and shall remain in place until the biologist has determined that the young are no longer dependent on their mother and the den site. No entry into the buffer area shall be permitted.

Significance Determination

Implementation of **MM 3.3-1** through **MM 3.3-12** by future phases of development within the Plan Area would ensure steps would be taken to reduce direct and indirect impacts to biological resources. For each development, application for coverage under and adherence to the East Contra Costa HCP/NCCP would ensure the Plan Area obtains all required permits necessary for redevelopment. As any development project begins, workers would be trained on environmental awareness on the possibility of encountering sensitive habitats and/or special-status species during construction and the protocols to follow if they are discovered. Preconstruction surveys conducted for species covered under the East Contra Costa HCP/NCCP would be required for each development project. If any of these species are found within the Plan Area, the scientist will follow the necessary protocols for species protection. Furthermore, indirect impacts due to habitat loss would be addressed through support of the East Contra Costa HCP/NCCP preserve system. These mitigation measures would reduce this impact to a **less than significant** level.

Impact 3.3-2: Have a substantial adverse effect on any riparian habitat or other sensitive natural community identified in local or regional plans, policies, regulations or by the California Department of Fish and Wildlife or U.S. Fish and Wildlife Service (Less than Significant with Mitigation Incorporated)

CDFW considers sensitive natural communities to have significant biotic value, with species of plants and animals unique to each community. Sensitive plant communities are communities that are of limited distribution statewide or within a county or region and are often vulnerable to environmental effects of projects. These communities may or may not support special-status species or their habitat. The most current version of the CDFW's *List of California Terrestrial Natural Communities* as well as the Manual of California Vegetation indicate which natural communities are of special status given the current state of the California classification. As previously discussed, the study area is dominated by annual grasslands and disturbed habitats associated with the golf course development, which are not considered sensitive plant communities. Both the Himalayan blackberry

thickets and Valley Foothill Riparian areas are classified as a sensitive habitat due to their status as riparian areas; they may be subject to CDFW jurisdiction under the California Fish and Game Code §1600 et seq. These habitats occur along the streams in the eastern and southern portions of the study area.

Future development construction within the Plan Area may result in direct impacts to sensitive natural communities by cutting of City-protected trees or riparian vegetation, or other encroachment into riparian areas which could affect habitat for fish and other wildlife dependent on the stream. Furthermore, operation of future development facilities could require trimming or other modification of protected trees or riparian habitats, potentially reducing their values. Direct impacts to protected trees would be addressed through compliance with the City's tree removal permit procedures and requirements outlined in PMC Sections 18.84.825-18.84.870.

As with aquatic resources, future development within the Plan Area could result in improper stormwater or other runoff (e.g. dust control water) treatment, which could impact riparian plant communities. Future development in the Plan Area could also result in stormwater or landscape irrigation discharge, which could impact riparian communities. Ongoing landscape management could result in indirect effects on protected trees through changes to irrigation, fertilization, and use of herbicides. However, future development projects would implement **MM 3.3-1** through **MM 3.3-3**, which would address this impact by requiring setbacks from streams and off-site open space, stormwater best management practices for activities that could impact water quality and requires the development of stormwater treatment controls and controls on peak runoff and flow volumes. Furthermore, future development projects would be required to comply with Policies 10-P-4.6 and 10-P-4.9 of the 2040 General Plan. Impacts would be **less than significant** with these measures in place.

Impact 3.3-3: Have a substantial adverse effect on state or federally protected wetlands (including, but not limited to, marsh, vernal pool, coastal, etc.) through direct removal, filling, hydrological interruption, or other means (Less than Significant with Mitigation Incorporated)

The aquatic resources delineation identified a total of 3.248 acres of potential jurisdictional waters and wetlands within the study area.

Construction of future development projects within the Plan Area may result in direct fill of wetlands or waters, such as for grading of pads or construction of stream crossings. Once future development projects are constructed, it is not anticipated for direct impacts to wetlands occur. Implementation of **MM 3.3-1** through **3.3-3** would address this impact by requiring a wetland delineation and associated permitting and mitigation.

Construction of future development projects may result in indirect impacts to wetlands through improperly controlled runoff, introduction of weed seed, or modification of hydrology. Post-construction, discharge of runoff from developed areas into aquatic habitats could introduce sediment or other pollutants. Increased hardscape could result in channel erosion, and could also modify hydroperiods of streams and wetlands, causing them to fill and dry more quickly. Future

development projects would be required to comply with Policies 12-P-7.1 through 12-P-7.6 to ensure all storm water runoff would not impact existing hydrologic features, including wetlands. Furthermore, implementation of **MM 3.3-1** through **3.3-3** would require setbacks from streams and off-site open space, stormwater best management practices (BMPs) for activities that could impact water quality, and development of stormwater treatment controls and controls on peak runoff and flow volumes. Impacts to wetlands are therefore considered less than significant with implementation **MM 3.3-1** and **3.3-3**.

Impact 3.3-4: Interfere substantially with the movement of any native resident or migratory fish or wildlife species or with established native resident or migratory wildlife corridors, or impede the use of native wildlife nursery sites (Less than Significant with Mitigation Incorporated)

WILDLIFE CORRIDORS

As previously described, the Plan Area currently limits wildlife passage due to the remaining golf course fencing. However, the open space provided by the PG&E transmission line corridor that contains a stream and the crossing over the Contra Costa Canal provides a potentially significant wildlife passage.

It is anticipated that future buildout of the Plan Area would require reconstructing a portion of the Contra Costa Canal crossing to provide a structurally sufficient extension of Golf Club Road to Phases II and III of the Plan Area. Although a portion of the crossing over the Contra Costa Canal would be upgraded, a large portion of the existing crossing to the east would remain intact and would allow continued wildlife connectivity. It is anticipated that the extension of Golf Club Road would be constructed to avoid the stream that runs along the eastern edge of the Plan Area. Avoiding impacts to the stream would allow for continued use by wildlife species. Furthermore, the PG&E transmission line corridor would continue to provide a wildlife connectivity corridor. To further ensure future development would not have a significant impact to wildlife connectivity, **MM 3.3-1** through **3.3-3** would be required. **MM 3.3-1** through **3.3-3** address this impact by imposing design requirements for wildlife movement on roads outside the Urban Development Area.

Future construction activities taking place adjacent to wildlife corridors could result in indirect impacts by reducing wildlife use of corridors via noise or lighting. Once future development projects are constructed, human activity, light, and noise adjacent to wildlife corridors could still result in decreased corridor use. **MM 3.3-1** through **3.3-3** address this impact by providing design parameters to reduce indirect impacts from development adjacent to open space. With these measures in place, impacts on wildlife corridors would be **less than significant**.

WILDLIFE NURSERIES

Wildlife nursery sites include locations or areas where animals breed, lay eggs, or rear young. These can include features as diverse as nesting trees, estuaries, ponds, caves, and structures. As previously described, trees in the study area provide potential nesting habitat for birds and may also offer maternity roosting opportunities for bats. The ponds and wetlands within the study area may

also provide amphibian breeding habitat. Losses of any of these features could represent a significant direct impact. However, implementation of **MM 3.3-1** through **3.3-12** would address this impact by requiring pre-construction surveys, limited construction windows, avoidance, awareness training, habitat compensation, and other mitigation. While these measures are focused on special-status species, they also effectively provide protections and compensation for more common species using the same habitats.

Construction activities associated with future development projects could degrade nursery sites either temporarily or permanently through indirect means such as on- or off-site water quality impacts, fugitive dust, and increased noise levels due to heavy equipment operations. Ongoing operation of future development projects could result in off-site impacts to wildlife nurseries. For example, noise or light from operations could disturb wildlife behavior patterns and stormwater carrying pollutants from project sites could enter aquatic breeding habitat. Implementation of **MM 3.3-1** through **3.3-12** would address this impact by requiring setbacks from off-site open space, water-quality protections, limited construction windows, avoidance, awareness training, habitat compensation, and other mitigation. With these measures in place, impacts on wildlife nurseries would be **less than significant**.

Impact 3.3-5: Conflict with any local policies or ordinances protecting biological resources, such as a tree preservation policy or ordinance (No Impact)

The proposed Specific Plan sets policies and actions for future development in the Plan Area, but it does not envision or authorize any specific development project. Because of this, the site-specific details of potential future development projects are currently unknown and detailed analysis of individual project impacts is not feasible at this time. However, the City will continue to enforce all relevant General Plan policies and ordinance requirements as conditions of approval for future development. Requirements such as those of the tree preservation ordinance will also be enforced on an ongoing basis throughout the maintenance and occupancy of future projects in the Plan Area. Consequently, no conflict with City policies or ordinances is anticipated. There would be **no impact** relative to such a conflict, and no mitigation is required.

Impact 3.3-6: Conflict with the provisions of an adopted Habitat Conservation Plan, Natural Community Conservation Plan, or other approved local, regional, or State habitat conservation plan (No Impact)

The only habitat conservation plan applicable to the Plan Area is the East Contra Costa HCP/NCCP. Via **MM 3.3-1** and **3.3-3**, all future development projects under the proposed Specific Plan will be required to obtain coverage under the East Contra Costa HCP/NCCP, ensuring that all projects are consistent with HCP/NCCP requirements. There would be no conflict with the HCP/NCCP, and **no impact** related to any such conflict.

This section of the Program Environmental Impact Report (PEIR) identifies existing cultural resources within and adjacent to the Pittsburg Technology Park Specific Plan Area (Plan Area), and provides a background discussion of the prehistory, ethnology, historical period background, and cultural resources. This section is organized by the environmental setting, regulatory setting, and concludes with an impact and mitigation analysis. The information provided in this section is based on the following documents:

- City of Pittsburg. *Pittsburg 2040 General Plan*. Adopted May 2024.
- ECORP Consulting. April 2024. *Archaeological and Built Environment Resources Inventory Report*. (Appendix F).

3.4.1 ENVIRONMENTAL SETTING

EXISTING CONDITIONS

The Plan Area is in the City of Pittsburg (City) near the southern edge of Suisun Bay, within the larger San Francisco Bay. The Sacramento and San Joaquin rivers flow westward into the Suisun Bay, approximately 1.5 miles north of the Plan Area. The Plan Area consists of rolling hills along the lower slopes of the eastern Los Medanos Hills. The Plan Area was part of the former Delta View Golf Course and is currently vacant. The land encompasses a variety of natural habitat types, including grasslands, wetlands, remnant patches of landscaping trees, and paved roads and parking areas.

Lands to the south and west of the Plan Area are vacant/open space and are additional portions of the former Delta View Golf Course. Lands to the east of the Plan Area consist of open space and a transmission line system owned by Pacific Gas and Electric (PG&E). To the north of the Plan Area are low- and medium-density residential development.

CULTURAL SETTING REGIONAL PRE-CONTACT HISTORY

It is generally believed that human occupation of California began at least 10,000 years before present (BP). The archaeological record indicates that between approximately 10,000 and 8,000 BP, a predominantly hunting economy existed, characterized by archaeological sites containing numerous projectile points and butchered large animal bones. Around 8,000 BP, there was a shift in focus from hunting toward a greater reliance on plant resources. Archaeological evidence of this trend consists of a much greater number of milling tools (e.g., metates and manos) for processing seeds and other vegetable matter. This period, which extended until around 5,000 BP, is sometimes referred to as the Millingstone Horizon. An increase in the size of groups and the stability of settlements is indicated by deep, extensive middens at some sites from this period.

Archaeological evidence indicates that reliance on both plant gathering and hunting continued as in the previous period, with more specialized adaptation to particular environments in sites dating to after about 5,000 BP. Mortars and pestles were added to metates and manos for grinding seeds and other vegetable material. Flaked-stone tools became more refined and specialized, and bone tools were more common. New peoples from the Great Basin began entering Southern California during this period. During this period, known as the Late Horizon, population densities were higher than

before, and settlement became concentrated in villages and communities along the coast and interior valleys. Regional subcultures also started to develop, each with its own geographical territory and language or dialect. These were most likely the basis for the groups that the first Europeans encountered during the 18th century. Despite the regional differences, many material culture traits were shared among groups, indicating a great deal of interaction. The presence of small projectile points indicates the introduction of the bow and arrow into the region sometime around 2,000 BP.

ETHNOLOGY

The Native Americans who inhabited the Mount Diablo and Delta region at the time of Spanish contact in the 1770s are known as Bay Miwok, with Plains Miwok to the northeast, Ohlone to the south and west, and Northern Valley Yokuts to the east.

The pre-contact Bay Miwok were hunters and gatherers; they adapted to and managed their abundant local environment so well that some places were continuously occupied for thousands of years. The Miwok had perfected living in and managing a myriad of environments, some were rich enough to allow large permanent “villages” or “collectors” to exist, others were less abundant and encouraged a “more mobile “forager” way of life. Littoral (shoreline) and riparian environments, including the Delta marshlands, were the most productive and intensively utilized and occupied.

REGIONAL HISTORY

In 1542, Juan Rodriguez Cabrillo sailed north up the Pacific coast of Mexico in search of the Strait of Anián. Cabrillo and his crew, the first Europeans to explore the Alta California coastline, visited San Diego Bay, Santa Catalina Island, and San Pedro Bay, and may have reached as far north as Point Reyes. In 1579, the English privateer Sir Francis Drake visited Miwok villages north of San Francisco Bay. Spanish colonization of Alta (Upper) California began in 1769 with the Portolá land expedition. Led by Captain Gaspar de Portolá and Father Junipero Serra, the expedition proceeded north from San Diego on foot to the Santa Clara Valley, where an advance party of scouts led by José Ortega became the first Europeans to observe San Francisco Bay.

During the 1830s, the Mexican government confiscated mission lands and expelled Alta California’s Franciscan friars. Former mission lands, along with unclaimed lands in the Sacramento and San Joaquin valleys, became granted to retired soldiers and other Mexican citizens. Vast swaths of Alta California’s coastal regions and interior valleys became private ranchos, or cattle ranches. Three of the region’s Spanish pueblos—Los Angeles, San Jose, and Sonoma—survived as Mexican towns. Other settlements developed around presidios at San Francisco, Monterey, Santa Barbara, and San Diego. Many rancho owners, called californios, maintained residences in town, while hired vaqueros and unpaid Native American laborers worked on ranchos to produce cow hides and tallow, commodities prized by foreign merchants.

In January 1848, gold was discovered in the flume of a lumber mill at Coloma on the South Fork of the American River. News of the discovery spread around the world, leading to the California Gold Rush. Tens of thousands of prospectors arrived in the Sierra Nevada foothills in 1849, prompting the creation of hundreds of small mining camps along streambeds. The cities of Marysville, Sacramento,

and Stockton sprang up along the Feather, Sacramento, and San Joaquin rivers as supply centers for the mines; San Francisco became California's largest city and the focal point for Gold Rush economic activity. In 1850, following a year of rapid growth, Congress admitted California as the 31st U.S. state. In the following decades, federal surveyors arrived in California to stake out 36-square-mile townships and 1-square-mile sections on California's unclaimed (i.e., non-rancho) public lands.

CITY OF PITTSBURG

The earliest recorded history of Pittsburg dates back to 1839, when the Mexican government granted about 9,000 acres, known as "Rancho Los Medanos," to brothers Jose Antonio Mesa and Miguel Jose Mesa Garcia. Issued by Governor Juan B. Alverado, it was one of the final land grants issued prior to the formation of California as a state.

The discovery of coal in the Mount Diablo foothills in 1859 created a booming coal industry in the area. The city then became known as "Black Diamond," due to the influence of the Black Diamond Coal Company. The Mount Diablo coalfield was the largest in California. As a result, the boomtown of Nortonville emerged in the foothills of Mount Diablo and became the largest town in the county by 1870.

Lumber baron Charles Appleton Hopper, who became the local "Father of Industry," purchased the original Rancho Los Medanos land grant as well as additional acreage in 1900. Hooper introduced industrial growth to the area with the creation of the Industrial Center of the West in 1903, an early manufacturing venture. In 1906, Hoover provided financing to Bowers Rubber works, and by 1910, Columbia Steel had opened, being the largest foundry of its kind on the west coast. The new industrial growth created thousands of jobs for residents. In 1911, city officials changed the town's name to "Pittsburg," in honor of Pittsburgh, Pennsylvania's similar steel heritage.

Built in 1942, Camp Stoneman in Pittsburg served as the main point of embarkation for troops on the west coast during World War II. For thousands of troops, Camp Stoneman was their last contact on American soil. The camp had a tremendous impact on the growth and diversity of Pittsburg. Following the end of the Korean War in 1954, Camp Stoneman closed. The City of Pittsburg claimed the property for school, commercial, and residential development.

After US Steel purchased Columbia Steel in the 1930s, the Pittsburg foundry expanded to serve large public works projects, like the construction of the San Francisco Bay Bridge (The Mercury News 2024). To this day, the steel industry remains an important part of Pittsburg's economy, and Pittsburg remains a thriving industrial city.

Delta View Golf Course

Delta View Gold Course opened in 1947, following the closure of Camp Stoneman. It was originally a nine-hole course and offered a challenging golf course on rolling terrain with beautiful views of the Delta as well as Mt. Diablo. The Delta View Golf Course was the first golf course in Contra Costa County to have a sprinkler system and had complete grass fairways. In 1991, Delta View Golf Course was expanded to an 18-hole golf course, with the additional course being designed by Robert Muir Graves. On March 1, 2018, Delta View Golf Course closed due to maintenance challenges and

economic factors. In June 2022, a 19-acre grassfire burned the golf course and its remaining buildings.

Contra Costa Canal

Techniques used to build, design, and construct irrigation networks and canals have varied widely depending largely on the period they were constructed, investors, and location in California. Innovative systems and businesses were established to transport water from areas of excess such as the storm-fed rivers of Northern California or the Sierra Nevada to areas of need such as deserts and drought-stricken valleys.

The Central Valley Project (CVP) was one of the largest public works projects in the country. The idea was developed in the 1920s as a collaboration between the U.S. Bureau of Reclamation (USBR) and the State of California. The CVP consists of a series of canals, dams, channels, reservoirs, and pumping stations and was built in between 1935 and the mid-1950s. The CVP resulted in California's Central Valley region becoming one of the most agriculturally productive regions in the nation.

The Contra Costa Canal was part of the USBR Central Valley Project and construction originally began on the canal in 1937, and after a brief break at the start of World War II, resumed in 1945. Currently, the distribution of the water is managed by the Contra Costa County Water District, which the Contra Costa County Board of Supervisors voted into existence in 1936. The Contra Costa Water District purchases the water from USBR and sells it to local landowners and agencies.

Transmission Lines

The number of electric utility companies in California significantly increased in the 1880s to meet the demand of the growing population and widespread use of Thomas Edison's new version of the incandescent light bulb. Electric utility companies prior to the 1880s typically used low voltage direct currents (DC), which transmitted electricity only about three miles. Despite the limitations of DC systems, the California Electric Light Company of San Francisco was the first to begin installing long-distance electric transmission lines in California in 1879.

The California Electric Light Company was originally founded in 1879 by George Roe. The California Electric Company later opened the Folsom Powerhouse to develop hydroelectric power and distribute it to the area. This event was significant because it required the transmission of electricity over a long distance; a range only achieved by a few facilities at the time. At this time, several electric utility companies were springing up throughout California, all competing in the electricity sales market. The Folsom Powerhouse and long-distance electric transmission capabilities of the California Electric Light Company gave them a significant advantage over competitors.

Eventually, PG&E was formed in 1905 as a merger of the San Francisco Gas and Electric Company and the California Gas and Electric Corporation. Since formation, the company has expanded operations throughout the U.S. Currently, PG&E operates thousands of miles of electric transmission systems in California powering millions of homes.

CULTURAL RESOURCES IN THE PLAN AREA

A Cultural Resources Assessment was prepared for the Plan Area in April 2024. The Cultural Resource Assessment included a records search, thorough literature review, and an intensive field survey.

Records Search

On June 15, 2023, a records search was requested for the Plan Area at the Northwest Information Center (NWIC) of the California Historical Resources Information System (CHRIS) at Sonoma State University. The purpose of the records search was to determine the extent of previous surveys within a 1-mile radius of the Plan Area north of the Contra Costa Canal and a 0.5-mile radius south of the Contra Costa Canal, and whether previously documented pre-contact or historic archaeological sites, architectural resources, or traditional cultural properties exist within this area.

Additional resources reviewed included the Built Environment Resource Directory, National Register Information System, Office of Historic Preservation, California Historical Landmarks, California Points of Historical Interests, Caltrans Local and State Bridge Surveys, and Historic Spots in California. Furthermore, review of maps and aerial photographs and a search for a local historic registry was completed for the Plan Area.

Results of the records search indicate that thirty-five previous cultural resource studies have been conducted within one mile of the Plan Area north of Contra Costa canal and within one-half mile of the Plan Area south of the canal. Of the thirty-five studies, eight were conducted within the Plan Area and one resource was documented in the Plan Area. One additional cultural resources study was provided by the City. The study addressed a portion of the Delta View Golf Course that is located southwest of the Plan Area. Combined with the results of the NWIC, a total of nine previous cultural resource studies included portions of the Plan Area (see Table 3.4-1). The results of the records search indicate that approximately 15 percent of the Plan Area has been previously surveyed for cultural resources. Therefore, a pedestrian survey of the Plan Area was conducted.

TABLE 3.4-1: PREVIOUS CULTURAL STUDIES WITHIN THE PLAN AREA

REPORT NUMBER	AUTHOR(S)	REPORT TITLE	YEAR
S-18440	G. James West and P. Welch	Class II Archaeological Survey of the Contra Costa Canal, Contra Costa County, California	1996
S-21142	S.A. Guedon and C. I. Busby	Archaeological Survey Report, Delta De Anza Trail located between Loftus Road/State Highway 4 to Railroad Avenue, City of Pittsburg, Contra Costa County, California	1996
S-29583	W. Self	Archaeological Survey and Cultural Resources Assessment of the Proposed Alternative 3A Route for the City of Pittsburg Recycled Water Project, Pittsburg, Contra Costa County, California (letter report)	2004
S-30785	C. Losee	Collocation ("CO") Submission Packet FCC Form 621, 2222 Gold Club Road, Pittsburg, Contra Costa County, California.	2005

<i>REPORT NUMBER</i>	<i>AUTHOR(S)</i>	<i>REPORT TITLE</i>	<i>YEAR</i>
S-34093; S-34093a	K. Kearney, D. Buckley, A. Estes, J. Allan, and W. Self; S. K. Strattor and S. M. Fry	Cultural Resource Assessment, Delta Diablo Sanitation District and the City of Pittsburg, Recycled Water Pipeline Extension Project, Pittsburg, Contra Costa County, California; BUR0704016A: Delta Diablo Sanitation District and City of Pittsburgh Recycled Water Pipeline Extension Project, Contra Costa County, California (Project #07-SCAO-174)	2006; 2007
S-35796	B. Siskin, C. DeBaker, and J. Lang	Cultural Resources Investigation and Architectural Evaluation of the Pittsburg-Tesla Transmission Line, Contra Costa and Alameda Counties, California	2009
S-38082; S-38082a	Peak and Associates, Inc.; S. Straton, and A. Leigh	Determination of Effect for the Installation of a Water Pipeline over the Contra Costa Canal, Pittsburg, Contra Costa, California; BUR110610B: MP-153, ENV-3.00; Redundant Emergency Water Delivery Line for the City of Pittsburg, California (Tracking #11-SCAO-095)	2011; 2011
S-49678	Aimee Arrigoni	Historic Property Survey Report for the SR-4/Bailey Road Interchange Pedestrian & Bicycle Improvement Project, Bay Point, Contra Costa, California.	2016
-	B. Ludwig and J. Coleman 2023	Cultural Resources Inventory and Evaluation Report Pittsburg Premier Fields Project, City of Pittsburg, Contra Costa County, California	2023

The records search results, in addition to the City-provided report, determined that 20 previously recorded historic-era cultural resources are located within one mile of the Plan Area north of the Contra Costa Canal and within one-half mile south of the canal (Table 3.5-2). All 20 resources are historic-era sites that are associated with the following: the Atcheson, Topeka and Santa Fe Railroad; Southern Pacific Railroad; Delta View Golf Course; Concord Naval Weapons Station; a natural gas pipeline; electric utility towers; residences; National Guard Armory; a Fort Knox Storage building; Canal Road Bridge; Contra Costa and Clayton canals; transmission lines; and Parkside Elementary School.

One previously recorded cultural resource is located within the Plan Area: P-7-2956 (Pittsburg-Tesla Transmission Line). In 2023, a portion of the Delta View Golf Course adjacent to the western boundary of the Plan Area was recorded and evaluated. An unrecorded portion of the Delta View Golf Course is present within the Plan Area. A segment of P-7-2695 (Contra Costa Canal) bisects the Plan Area but is outside of the Plan Area's development boundaries.

TABLE 3.4-2: PREVIOUSLY RECORDED CULTURAL RESOURCES WITHIN ONE MILE OF THE PLAN AREA NORTH OF THE CONTRA COSTA CANAL AND WITHIN ONE-HALF MILES SOUTH OF THE CONTRA COSTA CANAL

<i>SITE NUMBER CA-CCO-</i>	<i>PRIMARY NUMBER P-7-</i>	<i>RECORDER AND YEAR</i>	<i>AGE/PERIOD</i>	<i>SITE DESCRIPTION</i>	<i>WITHIN PLAN AREA?</i>
-	2695	JRP Historical Consulting Services 1993; Ric Windmiller 2010	Historic	Contra Costa Canal	No

<i>SITE NUMBER CA-CCO-</i>	<i>PRIMARY NUMBER P-7-</i>	<i>RECORDER AND YEAR</i>	<i>AGE/PERIOD</i>	<i>SITE DESCRIPTION</i>	<i>WITHIN PLAN AREA?</i>
-	2956	Jennifer Lang 2008; Dana E. Supernowicz 2017	Historic	Pittsburg-Tesla Transmission Line	Yes
-	504	Hatoff et al. 1994	Historic	Southern Pacific Railroad-Northern Contra Costa Route	No
732H	806	Hatoff and Clyde 1994; Polly S. Allen 2016	Historic	Atchison, Topeka and Santa Fe Railroad	No
-	1920		Historic	Single Family Property	No
-	2501	Janice Calpo 2000	Historic	Single Family Property	No
-	2502	Janice Calpo 2000	Historic	Single Family Property	No
-	2503	Janice Calpo 2000	Historic	Single Family Property	No
-	2504	Janice Calpo 2000	Historic	Single Family Property	No
-	2505	Janice Calpo 2000	Historic	Single Family Property	No
-	2506	Janice Calpo 2000	Historic	Single Family Property	No
-	2507	Janice Calpo 2000	Historic	Multiple Family Property	No
-	2508	Janice Calpo 2000	Historic	Multiple Family Property	No
-	2509	Janice Calpo 2000	Historic	Multiple Family Property	No
-	2510	S. Lassell 1999; Janice Calpo 2000	Historic	National Guard Armory	No
-	2573	Loma Billat 2003	Historic	Fort Knox Storage	No
-	2648	Neal Kaptain 2004; Jeremy Adams 2014	Historic	Contra Costa Canal Road Bridge	No
-	4702	Aisha Fike 2014	Historic	Parkside Elementary School	No
-	-	Ludwig and Coleman 2023	Historic	Delta View Golf Course	No*

Field Survey

An intensive pedestrian survey was conducted for the Plan Area on September 26, 2023. The survey was conducted by walking parallel transects spaced approximately 15 meters across the Plan Area (see Figure 3.4-1). All cultural resources encountered during the survey were recorded using Department of Parks and Recreation (DPR) forms approved by the California OHP. The resources are usually photographed, mapped using a handheld Global Positioning System receiver, and sketched as necessary to document their presence using appropriate DPR forms.

Historic Landscape Research Methods

Golf courses are identified in National Park Service (NPS) guidance as a type of designed historic landscape. To qualify as a historic resource under NRHP, the designed historic landscape must have enough significance as a golf course to meet NRHP criteria, and retain sufficient integrity of location, design intent, setting, materials, workmanship, feeling, and association to convey that significance.

3.4 CULTURAL AND TRIBAL CULTURAL RESOURCES

The following six steps were followed to determine if the Golf Course is an exemplary representative of historic golf course landscape and qualifies as an NRHP eligible resource. The information used for this NRHP evaluation was also used to inform an evaluation for the CRHR, in concurrence with the landscape evaluation.

1. Obtain information about the golf course planning and design through documentation of its history, plans, and photographs, and conduct a site visit to identify the historic characteristics of the design intent.
2. Identify the appropriate type of designed landscape within which it should be evaluated, in this case, a golf course.
3. Analyze the characteristic features that the landscape should possess to be a good representation of golf courses.
4. Evaluate the significance of the golf course using NRHP and CRHR criteria.
5. Evaluate the integrity of each landscape characteristic and list the features that the landscape should retain to possess integrity.
6. Determine whether any aspects of the golf course's history or present condition might place it in a category of properties generally considered ineligible for the NRHP, therefore requiring special justification.

Furthermore, the *Guide to Preparing Cultural Landscape Reports*, identifies that landscape characteristics include both tangible and intangible aspects of an historic-period landscape that individually give the landscape its historic character and aide in the understanding of cultural importance. These landscape characteristics can range from large-scale patterns to site details and materials. Individual features and groups of the landscape features generally fit within the categories below. These landscape categories were used to describe and characterize the golf course landscape to assist in determining if it was eligible for the NRHP and CRHR.

- Natural Systems and Features: Natural aspects that influence the development and resultant form of a landscape.
- Spatial Organization: Arrangement of elements creating the ground vertical, and overhead planes that define and create spaces.
- Land Use: Organization, form, and shape of the landscape in response to land use.
- Cultural Traditions: Practices that influence land use, patterns of division, building forms, and the use of materials.
- Cluster Arrangement: The location of buildings and structures on the landscape.
- Circulation: Spaces, features, and materials that constitute a system of movement.
- Topography: Three-dimensional configuration of the landscape surface characterized by features and organization.
- Vegetation: Indigenous or introduced trees, shrubs, vines, ground covers, and herbaceous materials
- Buildings and Structures: Three-dimensional constructs such as houses, barns, garages, stables, bridges, and memorials
- View and Vistas: Features that create or allow a range of vision that can be natural or designed and controlled.

- Constructed Water Features: The built features and elements that utilize water for aesthetic or utilitarian functions.
- Small-scale features: Elements that provide detail and diversity combined with function and aesthetics.
- Archaeological Sites: Sites containing surface and subsurface remnants related to historic or prehistoric land use.

FIGURE 3.4-1. SURVEY AREA COVERAGE

Survey Results

The entire Plan Area was surveyed for cultural resources on September 26, 2023. Surface visibility ranged from 0 to 100 percent as portions of the Plan Area were paved over, while other portions were covered with tall dense grasses. Remnants of the former Delta View Golf Course was observed throughout the Plan Area, including a driving range net, a paved parking lot, sand traps, golf cart paths, and the foundations of prior buildings.

Resources Within the Plan Area

All previously recorded resources within the Plan Area were visited during the field survey. Table 3.4-3 provides a summary of the recorded resources followed by a brief description for each.

TABLE 3.4-3: CULTURAL RESOURCES LOCATED WITHIN PLAN AREA

<i>ID#</i>	<i>NAME</i>	<i>PERIOD</i>	<i>DESCRIPTION</i>	<i>PREVIOUSLY RECORDED</i>	<i>NRHP/CRHR ELIGIBLE?</i>
P-7-2956	Pittsburg-Tesla PG&E Electrical Distribution Lines	Historic	Portion of an approximately 31-milelong 230kV electrical distribution and transmission line; portion within the plan area was constructed between 1959 and 1960 and connects to a segment on the southern boundary of the Plan Area between 1920 and 1955. Contributing element to early power distribution systems in Northern California.	Yes	Yes; contributing element to early power distribution systems in Northern California
PT-01	Delta View Golf Course	-	Course (portion within Plan Area constructed in 1991) is overgrown with weeds and vegetation; former fairways, putting greens, sand traps, and ponds are no longer discernable. Extant features are limited to paved cart paths (overgrown with vegetation), building footprints, and former driving range net.	No*	No
PT-02	Telephone Line	-	Portion of a 0.5 milelong segment of telephone line. Constructed prior to 1973 to provide telephone service to Contra Costa County local landowners	No	No

* A PORTION OF THE DELTA VIEW GOLF COURSE WAS PREVIOUSLY RECORDED IMMEDIATELY ADJACENT TO, BUT OUTSIDE OF, THE PLAN AREA'S WESTERN BOUNDARY.

National Register of Historic Places Eligibility Criteria

As described in Section 3.4.3, *Regulatory Setting*, the NRHP recognizes properties that are significant at the national, state, and local levels. To be eligible for listing in the NRHP, a resource must be significant in American history, architecture, archaeology, engineering, or culture. Districts, sites, buildings, structures, and objects of potential significance must also possess integrity of location, design, setting, materials, workmanship, feeling, and association. A property is eligible for the NRHP if it is significant under one or more of the following criteria:

- **Criterion A:** It is associated with events that have made a significant contribution to the broad patterns of our history.
- **Criterion B:** It is associated with the lives of persons who are significant in our past.
- **Criterion C:** It embodies the distinctive characteristics of a type, period, or method of construction; represents the work of a master; possesses high artistic values; or represents a significant and distinguishable entity whose components may lack individual distinction.
- **Criterion D:** It has yielded, or may be likely to yield, information important in prehistory or history.

Cemeteries, birthplaces, or graves of historic figures; properties owned by religious institutions or used for religious purposes; structures that have been moved from their original locations; reconstructed historic buildings; and properties that are primarily commemorative in nature are not considered eligible for the NRHP unless they satisfy certain conditions. In general, a resource must be at least 50 years of age to be considered for the NRHP, unless it satisfies a standard of exceptional importance.

California Register of Historic Resources Eligibility Criteria

Similarly, as described in Section 3.4.3, *Regulatory Setting*, the California Public Resources Code (PRC) Section 5024.1 outlines the necessary criteria for a resource to be considered eligible for listing in the CRHR and, therefore, a historical resource. The criteria are similar to that of the NRHP, and is generally identified as a property greater than 50 years old and meets one or more of the following criteria:

- **Criterion 1:** Associated with events that have made a significant contribution to the broad patterns of local or regional history or the cultural heritage of California or the United States.
- **Criterion 2:** Associated with the lives of persons important to local, California or national history.
- **Criterion 3:** Embodies the distinctive characteristics of a type, period, region, or method of construction or represents the work of a master or possesses high artistic values.
- **Criterion 4:** Has yielded, or has the potential to yield, information important to the prehistory or history of the local area, California, or the nation.

NRHP/CRHR EVALUATIONS

P-7-2956, Pittsburg-Tesla PG&E Electrical Distribution Lines

Resource P-7-2956 (also known as P-1-10947 in Alameda County) begins in Antioch and separates into two lines southeast of Pittsburg. This line parallels the southeastern portion of the Plan Area, south of the Contra Costa Canal and north of the Canal it enters the Plan Area for approximately 650 feet, then parallels the Plan Area's western boundary. The portion within the Plan Area consists of approximately 650 feet of length and one tower, constructed between 1959 and 1960, which is after the initial line's construction. The resource was originally recorded in 2008 and evaluated the resource within the Plan Area and determined it to be ineligible for inclusion in the NRHP.

The resource was reevaluated in 2017 and was determined to be individually ineligible for the NRHP but could be a contributing element to early power distribution systems in Northern California. SHPO concurred with the evaluation and the resource is listed as "Appears eligible for National Register as a contributor to a NR-eligible multi-component resource through survey evaluation". The resource was revisited in September 2023, and was found to be the same as previously recorded. Therefore, the resource is considered eligible under Criterion A/1 and Criterion C/3.

PT-01, The Delta View Golf Course

The Delta View Golf Course was evaluated as a historic district with buildings and landscape features. The evaluation was informed by National Register Bulletin 18: How to Evaluate and Nominate Designed Historic Landscapes, and a Guide to Cultural Landscape Reports: Content, Process and Technique.

According to archival research, the original Delta View Golf Course was completed in 1949. Though the Delta View Golf Course was built to serve as recreation for the burgeoning community of Pittsburg at the time, it was not a centerpiece to the master plan of the community as envisioned by city developers. Further, the Delta View Golf Course is not associated with any historical events in golfing, practice or concepts in golfing, or other related context. Therefore, the Delta View Golf Course is not individually related to the broad patterns of history associated with Pittsburg and Contra Costa County; it is not eligible under Criterion A/1.

The portion of the Delta View Golf Course that is located within the Plan Area was designed by Robert Muir Graves, who is a notable golf course architect. However, the Delta View Golf course is not a significant achievement of Graves and is therefore not eligible under Criterion B/2. The Delta View Golf Course, as a historic district comprising a landscape, does not embody the distinctive characteristics of design or construction techniques of John Fleming and does not provide a good representation of his artistic embellishments or philosophy in course design, as described in the historic context. The golf course, as an historic district comprising buildings and a landscape, including the landscape characteristics, is not eligible under Criterion C/3.

The Delta View Golf Course does not have the potential to yield information important in prehistory or history. Archival research potential for the golf course has been exhausted, and the property's history is well documented in the archival record. The Delta View Golf Course cannot provide

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additional historically important information, and there is no potential for the property to provide additional information that is not already represented in the archival record. As a result, the former Delta View Golf Course is not eligible under Criterion D/4.

The landscape characteristics of the former Delta View Golf Course were identified and composed by the individual features of the course. The individual features of the former Delta View Golf Course that would need to remain for the golf course to retain integrity of its landscape characteristics are the ones that display spatial organization, circulation, topography, vegetation, buildings and structures, and water features. The former Delta View Golf Course is in a state of dereliction and the integrity of individual features that made up the course (trees, fairways, putting greens, etc.) are overgrown and in poor condition. Due to its compromised state, the resource does not retain integrity of, design, setting, materials, workmanship, or feeling. The former Delta View Golf Course is loosely associated with recreation in the City of Pittsburg, but the association is not significant other community; therefore, the resource does not retain integrity of association.

PT-02, Telephone Line

Resource PT-02 is an approximately one-half-mile-long segment of telephone line, that consists of wooden poles that contain crossarms with distribution wires spanning the poles from the crossarms. The resource, built prior to 1973, parallels the residences on their western side, as well as the northern side of a gravel road, and turns to the west to enter the Plan Area, as recorded by ECORP in 2023.

There is nothing in the archival record to suggest that PT-02 is associated with events that have made a significant contribution to the broad patterns of Contra Costa County's history or that it is associated with the lives of persons significant in Contra Costa County's past. Therefore, the resource is not eligible for the NRHP/CRHR under Criterion A/1 or B/2.

Furthermore, the resource is a conventional telephone line and is indistinguishable from multiple similar telephone lines in Contra Costa County. The telephone line lacks character-defining features and it does not embody the distinctive characteristics of a type, period, or method of construction, or represent the work of a master, or possess high artistic values, or represent a significant and distinguishable entity whose components may lack individual distinction. It is not eligible for the NRHP/CRHR under Criterion C/3.

The information potential of PT-02 is expressed in its built form, alignment, and in the historical record. It has not yielded, nor is it likely to yield, information important in history or prehistory. It is not eligible for the NRHP/CRHR under Criterion D/4.

Resource PT-02, a 0.47-mile-long segment of telephone line, possesses integrity of location, setting, design, workmanship, feeling, and association. It remains a telephone line in Contra Costa County in a suburban setting. PT-02 still conveys the overall aesthetic of a 20th-century telephone line in Contra Costa County that provided telephone service to local landowners. Regardless of integrity, the resource lacks historical significance and does not meet the NRHP or CRHR eligibility criteria.

P-7-2695, Contra Costa Canal

The Contra Costa Canal (canal) bisects the Plan Area into northern and southern portions. The canal is outside of the Plan Area's development and legal parcel boundaries. The canal is under the Contra Costa Water District's (CCWD) jurisdiction. This canal is above-ground and concrete-lined in the western portion of the Plan Area and flows underground at the easternmost portion. JRP Historical Consulting (JRP) recorded and evaluated the easternmost portion of the canal that was piped underground. JRP determined that the segment of the canal that flows underground was ineligible for the NRHP. JRP determined that the Contra Costa Canal is part of the larger Central Valley Project system, which should be considered during evaluation.

Herbert completed a recording and evaluation of the entire 40-mile-long canal in 2002. It was found to be eligible for the NRHP under Criterion A; with a period of significance from 1937 until the 1950s. The canal is of State historic importance because of its contribution "to the economic and industrial development of eastern Contra Costa County". SHPO concurred with the determination of eligibility in September 2003.

In 2008 C. DeBaker and K. Frank revisited the underground portion of the canal that was recorded by JRP in 1993. The canal was found to be in the same condition as previously reported in 1993. ECORP revisited the canal on September 26, 2023, and found it to be in the same condition as the 2008 revisit. ECORP concurred in 2024 that the portion of the canal recorded by JRP, which flows underground in the eastern portion, no longer retains integrity and is therefore, not eligible as a historic resource under NRHP or CRHR.

NATIVE AMERICAN CONSULTATION

The Native American Heritage Commission (NAHC) was contacted on June 15, 2023, to review its Sacred Lands File (SLF), to determine if any known cultural resource information was available. The NAHC responded on July 5, 2023, stating that the SLF search for the project was completed with negative results. However, the absence of specific site information in the SLF does not necessarily indicate the absence of cultural resources in the Plan Area. Therefore, the NAHC provided a list of Native American contacts within the area.

On March 1, 2024, notification letters were sent via email to 21 Native American Tribal Representatives from 11 Native American Tribal organizations pursuant to SB 18 and AB 52. Responses were received from four of 21 Native American Tribal Representatives. Below is a summary of the responses received:

- The Ohlone Indian Tribe (March 2, 2024): The Ohlone Indian Tribe requested a copy of the final CHRIS search results, Sacred Land File results, the contact list provided by the NAHC, and the final archeological report. The City responded via email on March 14, 2024, providing the Tribe with a link to a confidential file location with the requested material.
- The Amah Mutsun Tribal Band of San Juan Bautista (March 19, 2024): The Amah Mutsun Tribal Band of San Juan Bautista recommended that all crews, individuals, and personnel involved in earth-moving activities within the Plan Area be Cultural Sensitivity Trained. The

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Tribe recommended that a Qualified California Trained Archaeological Monitor and a Qualified Native American Monitor are present during any earth movement. In addition, they outlined their Monitoring or Sensitivity Training availability and rates. This PEIR was revised to incorporate their recommendations into Mitigation Measure 3.4-2.

- The Confederated Villages of Lisjan Nation (March 4, 2024): Confederated Villages of Lisjan Nation requested a copy of the final CHRIS search results, Sacred Land File results, and any additional archeological reports. The City responded via email on March 14, 2024, providing the Tribe with a link to a confidential file location with the requested material.
- Wilton Rancheria (March 5, 2024): Wilton Rancheria provided their Inadvertent Discovery Treatment Plan. They confirmed that the Plan Area is located within the tribe's ancestral and culturally affiliated territory, but stated they have no concerns about the project moving forward. Mitigation Measure 3.4-3 of this PEIR was revised to align with their Inadvertent Discovery Treatment Plan.

3.4.2 REGULATORY SETTING

FEDERAL

National Historic Preservation Act

Most regulations at the Federal level stem from the National Environmental Policy Act (NEPA) and historic preservation legislation such as the National Historic Preservation Act (NHPA) of 1966, as amended. NHPA established guidelines to "preserve important historic, cultural, and natural aspects of our national heritage, and to maintain, wherever possible, an environment that supports diversity and a variety of individual choice." The NHPA includes regulations specifically for federal land-holding agencies, but also includes regulations (Section 106) which pertain to all projects that are funded, permitted, or approved by any Federal agency and which have the potential to affect cultural resources. All projects that are subject to NEPA are also subject to compliance with Section 106 of the NHPA and NEPA requirements concerning cultural resources. Provisions of NHPA establish a National Register of Historic Places (The National Register) maintained by the National Park Service, the Advisory Councils on Historic Preservation, State Historic Preservation Offices (SHPO), and grants-in-aid programs.

American Indian Religious Freedom Act and Native American Graves and Repatriation Act

The American Indian Religious Freedom Act recognizes that Native American religious practices, sacred sites, and sacred objects have not been properly protected under other statutes. It establishes as national policy that traditional practices and beliefs, sites (including right of access), and the use of sacred objects shall be protected and preserved. Additionally, Native American remains are protected by the Native American Graves and Repatriation Act of 1990.

Other Federal Legislation

Historic preservation legislation was initiated by the Antiquities Act of 1966, which aimed to protect important historic and archaeological sites. It established a system of permits for conducting archaeological studies on Federal land, as well as setting penalties for noncompliance. This permit process controls the disturbance of archaeological sites on Federal land. New permits are currently issued under the Archeological Resources Protection Act (ARPA) of 1979. The purpose of ARPA is to enhance preservation and protection of archaeological resources on public and Native American lands. The Historic Sites Act of 1935 declared that it is national policy to "Preserve for public use historic sites, buildings, and objects of national significance."

STATE

California Register of Historic Resources (CRHR)

California State law also provides for the protection of cultural resources by requiring evaluations of the significance of prehistoric and historic resources identified in documents prepared pursuant to CEQA. Under CEQA, a cultural resource is considered an important historical resource if it meets any of the criteria found in Section 15064.5(a) of the CEQA Guidelines. Criteria identified in the CEQA Guidelines are similar to those described under the NHPA. SHPO maintains the California Register of Historic Resources (CRHR). Historic properties listed, or formally designated for eligibility to be listed, on The National Register are automatically listed on the CRHR. State Landmarks and Points of Interest are also automatically listed. The CRHR can also include properties designated under local preservation ordinances or identified through local historical resource surveys.

California Public Resources Code (PRC) Section 5024.1 outlines the necessary criteria for a resource to be considered eligible for listing in the CRHR and, therefore, a historical resource.

California Environmental Quality Act (CEQA)

CEQA requires that lead agencies determine whether projects may have a significant effect on archaeological and historical resources. This determination applies to those resources which meet significance criteria qualifying them as "unique," "important," listed on the CRHR, or eligible for listing on the CRHR. If the agency determines that a project may have a significant effect on a significant resource, the project is determined to have a significant effect on the environment, and these effects must be addressed. If a cultural resource is found not to be significant under the qualifying criteria, it need not be considered further in the planning process.

CEQA emphasizes avoidance of archaeological and historical resources as the preferred means of reducing potential significant environmental effects resulting from projects. If avoidance is not feasible, an excavation program or some other form of mitigation must be developed to mitigate the impacts. In order to adequately address the level of potential impacts, and thereby design appropriate mitigation measures, the significance and nature of the cultural resources must be determined. The following are steps typically taken to assess and mitigate potential impacts to cultural resources for the purposes of CEQA:

- Identify cultural resources,

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- evaluate the significance of the cultural resources found,
- evaluate the effects of the project on cultural resources, and
- develop and implement measures to mitigate the effects of the project on cultural resources that would be significantly affected.

California Public Resources Code

Section 5097 of the Public Resources Code specifies the procedures to be followed in the event of the unexpected discovery of historic, archaeological, and paleontological resources, including human remains, historic or prehistoric resources, paleontological resources on nonfederal land. The disposition of Native American burial falls within the jurisdiction of the NAHC. Section 5097.5 of the Code states the following:

No person shall knowingly and willfully excavate upon, or remove, destroy, injure or deface any historic or prehistoric ruins, burial grounds, archaeological or vertebrate paleontological site, including fossilized footprints, inscriptions made by human agency, or any other archaeological, paleontological or historical feature, situated on public lands, except with the express permission of the public agency having jurisdiction over such lands. Violation of this section is a misdemeanor.

State Laws Pertaining to Human Remains

Section 7050.5 of the California Health and Safety Code requires that construction or excavation be stopped in the vicinity of discovered human remains until the county coroner can determine whether the remains are those of a Native American. If the remains are determined to be Native American, the coroner must contact the NAHC. CEQA Guidelines (Section 15064.5) specify the procedures to be followed in case of the discovery of human remains on non-Federal land. The disposition of Native American burials falls within the jurisdiction of the NAHC.

Senate Bill 18 (Burton, Chapter 905, Statutes 2004)

Senate Bill (SB) 18 requires local (city and county) governments to consult with California Native American tribes to aid in the protection of traditional tribal cultural places (“cultural places”) through local land use planning. This legislation, which amended §65040.2, §65092, §65351, §65352, and §65560, and added §65352.3, §653524, and §65562.5 to the Government Code; also requires the Governor’s Office of Planning and Research (OPR) to include in the General Plan Guidelines advice to local governments on how to conduct these consultations. The intent of SB 18 is to provide California Native American tribes an opportunity to participate in local land use decisions at an early planning stage, for the purpose of protecting, or mitigating impacts to, cultural places. These consultation and notice requirements apply to adoption and amendment of both general plans (defined in Government Code §65300 et seq.) and specific plans (defined in Government Code §65450 et seq.).

Assembly Bill 978

In 2001, Assembly Bill (AB) 978 expanded the reach of Native American Graves Protection and Repatriation Act of 1990 and established a state commission with statutory powers to assure that

federal and state laws regarding the repatriation of Native American human remains and items of patrimony are fully complied with. In addition, AB 978 also included non-Federally recognized tribes for repatriation.

Assembly Bill 52

Assembly Bill (AB) 52 establishes a formal consultation process for California tribes as part of CEQA and equates significant impacts on “tribal cultural resources” with significant environmental impacts (PRC Section 21084.2). AB 52 defines a “California Native American Tribe” as a Native American tribe located in California and included on the contact list maintained by the NAHC. AB 52 requires formal consultation with California Native American Tribes prior to determining the level of environmental document if a tribe has requested to be informed by the lead agency of proposed projects. AB 52 also requires that the consultation address project alternatives and mitigation measures, for significant effects, if requested by the California Native American Tribe, and that consultation be considered concluded when either the parties agree to measures to mitigate or avoid a significant effect, or the agency concludes that mutual agreement cannot be reached.

LOCAL

City of Pittsburg 2040 General Plan

The City of Pittsburg 2040 General Plan (2040 General Plan) was comprehensively updated in 2024. The following goals, policies, and action items pertain to cultural and tribal cultural resources.

Sustainability and Open Space

Goal-10-1: Promote a sustainable, healthy future for Pittsburg that conserves and protects natural and cultural resources and provides residents with access to a network of diverse, safe, and accessible open spaces.

Cultural and Historic Resources

Action 10-A-7.k: Require all new development, infrastructure, and other ground-disturbing projects to comply with the following conditions in the event of an inadvertent discovery of cultural resources or human remains:

- If human remains are discovered during any ground disturbing activity, work shall stop until the Development Services Director and the Contra Costa County Coroner have been contacted; if the human remains are determined to be of 23 Native American origin, the Native American Heritage Commission (NAHC) and the most likely descendants have been consulted; and work may only resume when measures to relocate or preserve the remains in place, based on the above consultation, have been taken and approved by the Development Services Director.
- If archaeological resources are encountered during construction or ground disturbing activity, work within 50 feet of the find shall be halted and a qualified archaeologist meeting the Secretary of Interior’s Professional Qualification

Standards for archaeology (National Park Service 1983) shall immediately be contacted to evaluate the find pursuant to Public Resources Code Section 21083.2. If necessary, the evaluation may require preparation of a treatment plan and archaeological testing for determining California Register of Historical Resources eligibility. If the discovery proves to be significant under CEQA and cannot be avoided by the project, additional work may be warranted, such as data recovery excavation, to mitigate any significant impacts to significant resources. If the resource is of Native American origin, the NAHC shall be contacted to ensure that the Most Likely Descendant can assess the find. Any reports required to document and/or evaluate unanticipated discoveries shall be submitted to the City of Pittsburg for review and approval and submitted to the Northwest Information Center in Sonoma State after completion. Recommendations contained within prepared reports shall be implemented throughout the remainder of ground disturbance activities.

- In the event of the identification of cultural resources on a development project site, a professionally qualified archaeologist and Tribal representative shall monitor ground-disturbing construction conducted during project implementation. The monitors shall observe ground-disturbing construction to identify potential archaeological deposits and avoid or limit damage to such deposits. The monitors shall have the discretion to reduce the intensity of monitoring, or suspend such monitoring, if field conditions clearly indicate that no potential intact archaeological deposits could be encountered. Should an intact archaeological deposit be identified, the monitors shall be empowered to temporarily halt construction in the vicinity of the find. The archaeologist shall, in consultation with the Tribal representative and City, evaluate the eligibility of the deposit for inclusion in the California Register of Historical Resources. If the deposit is eligible, the project shall attempt to feasibly avoid damage to the deposit (e.g., redesign or capping). If avoidance is not feasible, the archaeologist shall, in consultation with the Tribal representative and City, develop and implement a plan to recover the scientifically consequential data represented by the deposit in a manner respectful of tribal concerns. A report of the finds of any resource evaluation and/or data recovery efforts shall be submitted to the Northwest Information Center in Sonoma State as a condition for access to its archives.

City of Pittsburg Municipal Code

Chapter 15.84, of the City of Pittsburg Municipal Code (PMC) outlines the process for various historic structures and related buildings, including but not limited to designation of historic districts, official local historic register, requirements for demolition of historic structures, and standards for substandard buildings.

PMC Section 15.84.080 establishes the design criteria considered in review of historic structures pursuant to Chapter 15.84 PMC, which include the Secretary of Interior's Standards for the Treatment of Historic Properties and the State Historic Building Code. PMC Section 15.84.090 establishes requirements, including noticing, environmental documentation, and methods to retain or restore the structure, for the demolition of historic structures.

3.4.3 THRESHOLDS OF SIGNIFICANCE

Consistent with Appendix G of the CEQA Guidelines, the proposed project is considered to have a significant impact on cultural or tribal resources if it will:

- Cause a substantial adverse change in the significance of a historical resource pursuant to Section 15064.5?
- Cause a substantial adverse change in the significance of an archaeological resource pursuant to Section 15064.5?
- Disturb any human remains, including those interred outside of formal cemeteries?
- Cause a substantial adverse change in the significance of a tribal cultural resource, defined in Public Resources Code Section 21074 as either a site, feature, place, cultural landscape that is geographically defined in terms of the size and scope of the landscape, sacred place, or object with cultural value to a California Native American tribe, and that is:
 - Listed or eligible for listing in the California Register of Historical Resources, or in a local register of historical resources as defined in Public Resources Code Section 5020.1(k)?
 - A resource determined by the lead agency, in its discretion and supported by substantial evidence, to be significant pursuant to criteria set forth in subdivision (c) of Public Resources Code Section 5024.1? In applying the criteria set forth in subdivision (c) of Public Resources Code Section 5024.1, the lead agency shall consider the significance of the resources to a California Native American tribe.

3.4.4 IMPACTS AND MITIGATION MEASURES

Impact 3.4-1: Cause a substantial adverse change in the significance of a historical resource pursuant to Section 15064.5 (Less than Significant)

A substantial adverse change in the significance of an historic resource is defined in Section 15064.5 (b)(1) of the CEQA Guidelines as the “physical demolition, destruction, relocation, or alteration of the resource or its immediate surroundings such that the significance of an historical resource would be materially impaired.”

One historic resource in within the Plan Area, P-7-2956 Pittsburg-Tesla PG&E Distributions Lines, meets the criteria (Criterion A/1 and C/3) for listing on the NRHP/CRHP as a contributing element to early power distribution systems in Northern California (see Table 3.4-3).

As previously described, the Pittsburg-Tesla PG&E Distribution Lines parallel the southeastern portion of the Plan Area. The resource within the Plan Area was originally recorded and evaluated as ineligible in 2008. However, in 2017, a segment of the line just south of the Plan Area, which connects to the segment that passes through the Plan Area was revisited. The reevaluation determined the segment to be individually ineligible for the NRHP/CRHR but could be a contributing element to early power distribution systems in Northern California. SHPO concurred with the evaluation and the resource is listed as “Appears eligible for National Register (NR) as a contributor to a NR eligible multi-component resource through survey evaluation (3D)”.

3.4 CULTURAL AND TRIBAL CULTURAL RESOURCES

Future development within the Plan Area may utilize power from the adjacent transmission line system. Utilizing the transmission line for its intended use, with minimal physical impacts to the line itself, will not cause an adverse effect or significant impact to the resource. Future development in the Plan Area will have a minimal visual impact to the setting of the transmission line. Furthermore, it would not have a substantial impact or adverse effect to the feeling or historical association of early electric transmission for the resource, which is what makes the transmission line historically significant.

Additionally, the Contra Costa Canal bisects the Plan Area into northern and southern portions but is outside of the Plan Area's boundaries. As described in Section 3.4.2.3, the resource is under the jurisdiction of CCWD and above-ground and concrete-lined in the western portion of the Plan Area and flows underground at the easternmost portion. In 1993, the easternmost portion of the canal (piped underground) was recorded but found to be ineligible for the NRHP. In 2008, the underground portion of the canal was revisited and found to be in the same condition as the 1993 recording. During the 2023 survey, ECORP observed that the entire portion of the canal bisects the Plan Area. ECORP concurs that the portion of the canal recorded in 1993, which flows underground in the eastern portion, no longer retains integrity.

Due to the loss of integrity, any proposed future improvements to that portion of the canal, including reconstruction to support new road access or other structural stability, has no potential to cause a significant impact or adverse effect to the historical significance, aspects of integrity, or character-defining features of the canal. Any proposed improvements, as a result of future development within the Plan Area, to the previously underground portion of the canal, will cause no adverse effect to a Historic Property under Section 106 of the NHPA, nor will it have a significant impact to a Historical Resource under CEQA. The portion of the canal that maintains integrity is depicted in Figure 3.4-2 below is not anticipated to be altered or impacted as part of any future development within the Plan Area.

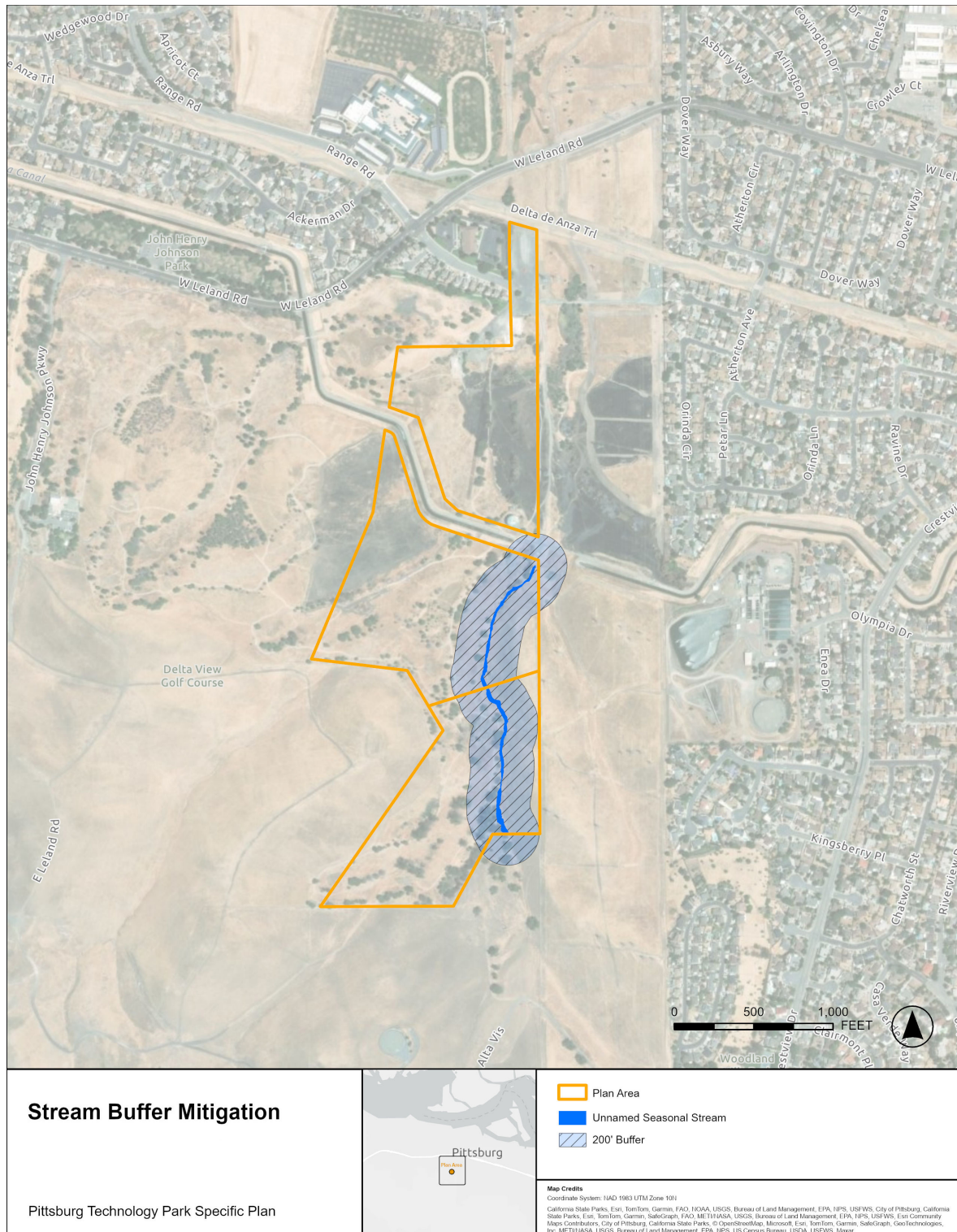
FIGURE 3.4-2. CONTRA COSTA CANAL IMPACTS



Future development within the Plan Area will not physically alter significant portions of P-7-2956 Pittsburgh-Tesla PG&E Distributions Lines materials, workmanship, and will not alter its current route or location along the landscape. Additionally, future development within the Plan Area will not impact P-7-2695 (Contra Costa Canal) and will not cause any adverse effect to a Historic Property under Section 106 of the NHPA, nor will it have a significant impact to a Historical Resource under CEQA. As such, the implementation of the Specific Plan will not have an adverse effect to the Historic Property, and therefore, would result in a **less than significant** impact and no mitigation is required.

Impact 3.4-2: Cause a substantial adverse change in the significance of an archaeological resource pursuant to Section 15064.5 (Less than Significant with Mitigation)

Although no archaeological resources were identified in the immediate Plan Area during the records search and field survey, ground-disturbing activities have the potential to reveal buried deposits not observed on the surface. The underlying geology of the Plan Area consists of Pliocene-Pleistocene-aged deposits of sandstone, shale, and gravel. The Pliocene-Pleistocene era spans from 5.3 million to 11,700 years ago, and it is generally accepted that humans were present in North America as many as 20,000 years ago. Therefore, the northern portion of the Plan Area has a low-to-moderate potential for containing intact buried deposits. This potential increases to moderate in areas within 200 feet of the unnamed seasonal stream that flows through the Plan Area (see Figure 3-4.3). The potential within 200 feet of the unnamed seasonal stream is moderate due to the fact that pre-contact resources are generally located closer to natural waterways and alluvium, which is located along streams. The hillsides within the Plan Area have a low potential for buried pre-contact archaeological sites.

FIGURE 3.4-3. UNNAMED SEASONAL STREAM

3.4 CULTURAL AND TRIBAL CULTURAL RESOURCES

In the event that unknown archaeological resources that qualify as historical resources are discovered during proposed project construction, significant impacts could occur. Mitigation Measures (MM) **3.4-1** through **MM 3.4-3** would require cultural resources sensitivity training for construction workers, avoidance of archaeological sites during construction, and appropriate treatment of unearthened archaeological resources during construction. Potential impacts to unknown archaeological resources that could qualify as significant historical resources, would be mitigated to **less than significant** through the implementation of **MM 3.4-1** through **MM 3.4-3**.

Mitigation Measures

MM 3.4-1: Contractor Awareness Training

Prior to construction, all workers regardless of location, shall receive cultural resource awareness training. The training program should be developed by a Qualified Professional Archaeologist that meets the Secretary of the Interior's Professional Qualifications Standards for archaeology and shall include relevant information regarding sensitive cultural resources and tribal cultural resources, including applicable regulations, protocols for avoidance, and consequences of violating state laws and regulations. It should also describe appropriate avoidance and impact minimization measures for cultural resources and tribal cultural resources that may be located within the Plan Area and provide guidance on procedures to follow if any cultural resources or TCRs are encountered.

MM 3.4-2: Archaeological Monitoring

All ground-disturbing activities proposed within the Plan Area shall be monitored by a Qualified Professional Archaeologist who meets or works under the direct supervision of someone who meets the Secretary of the Interior's Professional Qualifications Standards for prehistoric and historic archaeology. All ground-disturbing activities proposed within the Plan Area shall also be monitored by Qualified Native American Monitor. In the event that cultural resources are observed, all work must stop within the immediate vicinity of the find, and the Qualified Professional Archaeologist shall prepare and implement a resource mitigation plan and monitoring program.

MM 3.4-3: Unanticipated Discoveries

If an inadvertent discovery of tribal cultural resources, archaeological artifacts, other cultural resources, or human remains are discovered during construction within the Plan Area, all work must halt within a 100-foot radius of the discovery. The Qualified Professional Archaeologist, meeting the Secretary of the Interior's Professional Qualification Standards for prehistoric and historic archaeology, shall be retained to evaluate the significance of the find, and shall have the authority to modify the no-work radius as appropriate, using professional judgment. The following notifications and procedures shall apply:

- If the professional archaeologist determines that the find does not represent a cultural resource, work may resume immediately, and no agency notifications are required.

- If the Qualified Professional Archaeologist determines that the find does represent a cultural resource from any time period or cultural affiliation, the Qualified Professional Archaeologist shall immediately evaluate the find pursuant to Public Resources Code Section 21083.2. If necessary, the evaluation may require preparation of a treatment plan and archaeological testing for determining California Register of Historical Resources eligibility. If the discovery proves to be significant under CEQA and cannot be avoided by the project, additional work may be warranted, such as data recovery excavation, to mitigate any significant impacts to significant resources. Work may not resume within the no-work radius until the lead agencies, through consultation as appropriate, determine that the site either: 1) is not a Historical Resource under CEQA or a Historic Property under Section 106; or 2) that the treatment measures have been completed to their satisfaction. Any reports required to document and/or evaluate unanticipated discoveries shall be submitted to the City of Pittsburg for review and approval and submitted to the Northwest Information Center in Sonoma State after completion. Recommendations contained within prepared reports shall be implemented throughout the remainder of ground disturbance activities.
- If the find represents a Native American or potentially Native American resource that does not include human remains, then the Qualified Professional Archaeologist shall notify the City of Pittsburg, a Native American Representative from the Wilton Rancheria tribe, and the NAHC shall be contacted to ensure that the Most Likely Descendant (MLD) can assess the find. The City of Pittsburg shall consult with the tribes on a finding of eligibility and implement appropriate treatment measures, if the find is determined to be a Historical Resource under CEQA, as defined in Section 15064.5(a) of the CEQA Guidelines. If the deposit is eligible, the project shall attempt to feasibly avoid damage to the deposit (e.g., redesign or capping). If avoidance is not feasible, the archaeologist shall, in consultation with the MLD and City, develop and implement a plan to recover the scientifically consequential data represented by the deposit in a manner respectful of tribal concerns. Work may not resume within the no-work radius until the lead agencies, through consultation as appropriate, determine that the site either: 1) is not a Historical Resource under CEQA, as defined in Section 15064.5(a) of the CEQA Guidelines; or 2) that the treatment measures have been completed to the agencies satisfaction. A report of the finds or any resource evaluation and/or data recovery efforts shall be submitted to City of Pittsburg for review and approval and submitted to the Northwest Information Center in Sonoma State as a condition for access to its archives.
- If the find includes human remains, or remains that are potentially human, the Qualified Professional Archaeologist shall ensure reasonable protection measures are taken to protect the discovery from disturbance (AB 2641). The Qualified Professional Archaeologist shall notify the City of Pittsburg Development Services Director, a Native American Representative from the Wilton Rancheria tribe, and the Contra Costa County Coroner (per § 7050.5 of the Health and Safety Code). The provisions of § 7050.5 of the California Health and Safety Code, § 5097.98 of the California PRC, and AB 2641 will be

3.4 CULTURAL AND TRIBAL CULTURAL RESOURCES

implemented. If the coroner determines the remains are Native American origin and not the result of a crime scene, the coroner will notify the Native American Heritage Commission (NAHC), which then will designate a Native American Most Likely Descendant (MLD) for the Project (§ 5097.98 of the PRC). The designated MLD will have 48 hours from the time access to the property is granted to make recommendations concerning treatment of the remains. If the landowner does not agree with the recommendations of the MLD, the NAHC can mediate (§ 5097.94 of the PRC). If no agreement is reached, the landowner must rebury the remains where they will not be further disturbed (§ 5097.98 of the PRC). This will also include either recording the site with the NAHC or the appropriate Information Center; using an open space or conservation zoning designation or easement; or recording a reinternment document with the county in which the property is located (AB 2641). Work may not resume within the no-work radius until the agencies, through consultation as appropriate, determine that the treatment measures have been completed and are approved by the Development Services Director.

Impact 3.4-3: Lead to the disturbance of any human remains (Less than Significant with Mitigation)

Buried human remains that were not identified during the records search or field surveys could be inadvertently unearthed during excavation activities, which could damage these human remains, and could result in a significant impact. Therefore, **MM 3.4-3** contains procedures for recording and treating any human remains that are discovered during construction of the proposed project. **MM 3.4-3** requires that these items be protected, preserved, and treated in accordance with applicable laws, regulations and guidelines. Implementation of **MM 3.4-3** would ensure impacts are mitigated to a **less than significant** level.

Impact 3.4-4: Cause a substantial adverse change in the significance of a tribal cultural resource, defined in Public Resources Code Section 21074, and that is: Listed or eligible for listing in the California Register of Historical Resources, or in a local register of historical resources as defined in Public Resources Code Section 5020.1(k), or a resource determined by the lead agency (Less than Significant)

A check of the Sacred Lands Files through the NAHC was completed in April 2019. NAHC responded on April 25, 2019, indicating that no properties in the vicinity of the Planning Area had been recorded as cultural resources. Pursuant to SB 18 and AB 52, the City of Pittsburg sent letters to 21 tribal organizations on March 1, 2024 via certified mail.

As described in Section 3.4.1, four responses from tribal organizations were received. Based on the responses received, no specific resources have been identified. Although unlikely, it is still possible that unknown tribal cultural resources may be present and could be adversely affected by future buildout of the Plan Area. As discussed under impact discussion 3.4-2, impacts from future development could impact unknown archaeological resources including Native American artifacts

and human remains. Impacts would be reduced to a **less than significant level** with implementation of **MM 3.4-1** through **3.4-3**.

This section of the Program Environmental Impact Report (PEIR) evaluates the effects of buildout of the Pittsburg Technology Park Specific Plan (Specific Plan; project) associated with geology and soils. This section provides a background discussion of the seismic and geologic hazards and features found in the Specific Plan Area (Plan Area). This section is organized by the environmental setting, regulatory setting, and impact analysis and uses information from the following documents:

- City of Pittsburg. *Pittsburg 2040 General Plan*. Adopted May 2024.
- WSP USA Inc. January 2023. *Pittsburg Technology Center, Pittsburg, California, Geotechnical Due Diligence Report*. Appendix G.
- WSP USA Inc. January 2023. *Phase I Environmental Site Assessment and Limited Soil Screening*. Appendix I.

3.5.1 ENVIRONMENTAL SETTING

REGIONAL GEOLOGY

Contra Costa County is located east of San Francisco and extends from California's Great Valley geomorphic province in the east to the Diablo Range portion of the Coast Range geomorphic province to the west. The majority of the county lies within the Coast Range geomorphic province of Central California, which consists of rolling hills and rugged mountains.

The Coast Range is a northwest-trending mountain range (2,000 to 4,000 feet and occasionally 6,000 feet in elevation above sea level) and intervening valleys running parallel to the San Andreas Fault System. The coastline is uplifted, terraced and wavecut, and is composed of thick Mesozoic and Cenozoic sedimentary strata. The northern and southern ranges are separated by a depression containing the San Francisco Bay. The northern Coast Ranges are dominated by irregular, knobby, landslide-topography of the Franciscan Complex. The eastern border is characterized by strike-ridges and valleys in Upper Mesozoic strata. In several areas, Franciscan rocks are overlain by volcanic cones and flows of the Quien Sabe, Sonoma, and Clear Lake volcanic fields. West of the San Andreas Fault is the Salinian Block, a granitic core extending from the southern extremity of the Coast Ranges to the north of the Farallon Islands.

The Great Valley is an alluvial plain about 50 miles wide and 400 miles long located in the central portion of California. The northern part is made up of the Sacramento Valley, drained by the Sacramento River, and its southern part is made up of the San Joaquin Valley drained by the San Joaquin River. The Great Valley is a trough in which sediments have been deposited almost continuously since the Jurassic period (about 160 million years ago). Oil fields have been found in southernmost San Joaquin Valley and along anticlinal uplifts on its southwestern margin. In the Sacramento Valley the Sutter Buttes (remnants of an isolated Pliocene volcano) rise above the valley floor.

LOCAL SETTING

The topography of the Plan Area can be characterized as having gentle sloping areas with rolling hills. A creek traverses the Plan Area in a natural pattern with seasonal drainage paths that coalesce

and generally trend north toward Suisun Bay. These drainage areas have deposited natural accumulations of alluvial soils which are located in the lower elevations of the Plan Area. South of the Plan Area are rock outcroppings within the northern tip of the Diablo Range and the Los Medanos Hills. The rock outcroppings in the southern portion of the Plan Area consist of soils from the geologic time scale of the Tertiary-age (Miocene to Pliocene) of the Cenozoic Era. Sediments of the Oro Loma Formation in the southern area may be up to 300 feet thick and consists of moderately consolidated siltstone, sandstone, and claystone with interbedded pebble conglomerate. The northern portion of the Plan Area is comprised of Quaternary age sediments that formed during the Cenozoic Era. These alluvial soils consist of lake, playa, and terrace deposits.

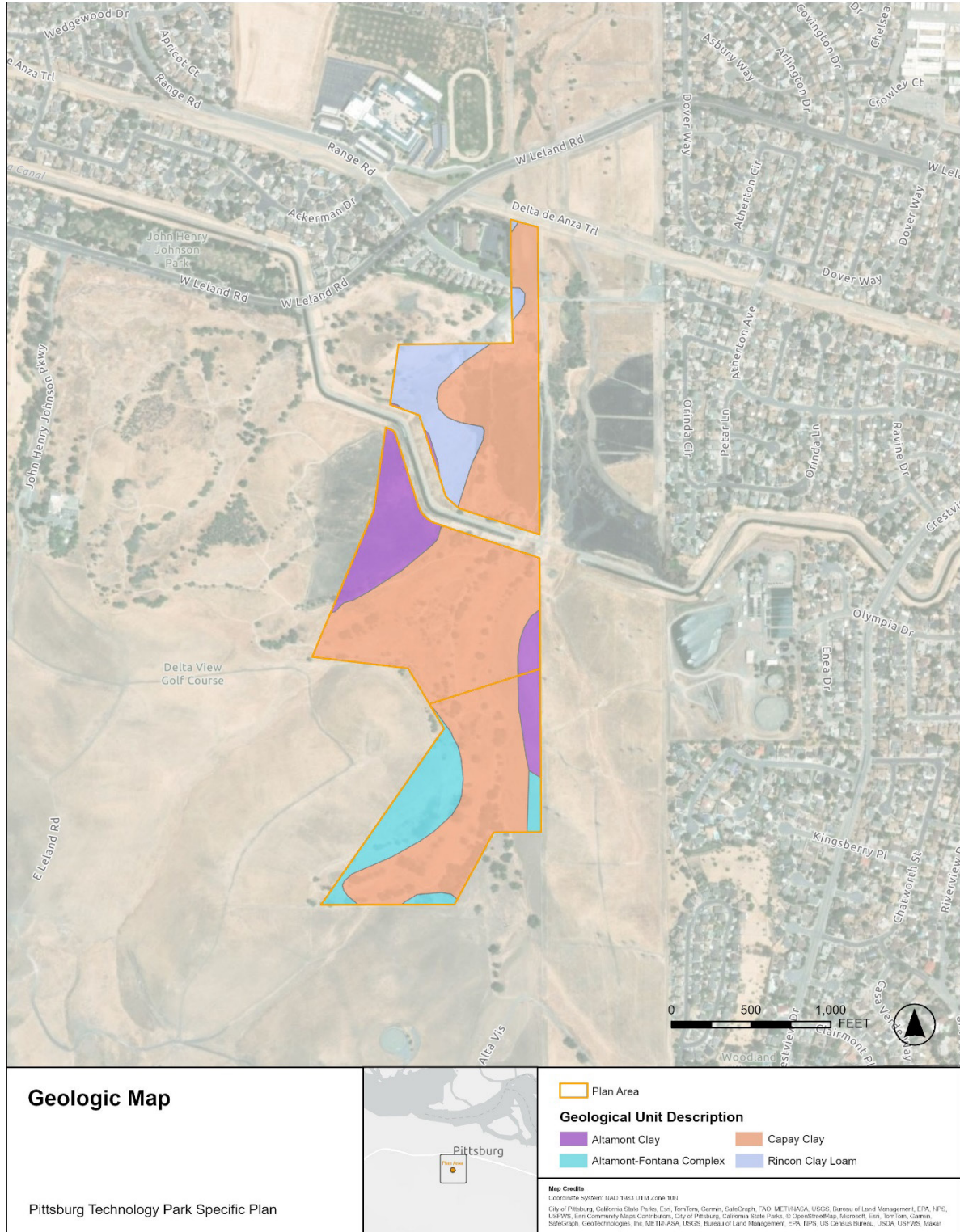
A Custom Soil Survey was completed for the Plan Area using the U.S. Natural Resources Conservation Service (NRCS) data. As illustrated in Figure 3.5-1, Capay Clay makes up a large portion of the Plan Area, specifically in the low-lying areas. Other clays including Altamont Clay and Rincon Clay Loam comprise the northern and eastern/western border areas of the Plan Area, respectively. Altamont Table 3.5-1, below, provides the estimated acreage of types of soils found in the Plan Area. As shown, the majority of soils within the Plan Area consist of clay soils, primarily Capay clay soils. Below is a brief description of prominent soils within the Plan Area.

- The **Altamont** series of soils consist of deep, well-drained soils that formed in material weathered from fine-grained sandstone and shale. Runoff varies from slow to rapid, and permeability is slow. These soils are typically found on hillslopes or mountain slopes, and are located in the eastern, western, and southern boundaries of the Plan Area on the upper hillsides.
- The **Capay** series consists of moderately well-drained soils on lower edges of valley fill and on old benches that have been slowly dissected. These soils have formed alluvial fans and stream terraces. Capay clay soils are found in the lower elevations of the central portion of the Plan Area.
- The **Rincon** series consists of well-drained soils that formed in alluvium from sedimentary rocks. They are found on old alluvial fans and on both stream and marine terraces. Runoff varies from slow to medium and permeability is slow.

TABLE 3.5-1: PLAN AREA SOILS

NAME	ACRES	TOTAL PERCENT
Altamont clay	9.5	12.5%
Altamont-Fontana complex	7.6	10.0%
Capay clay	52.4	68.7%
Rincon clay loam	6.7	8.8%
Total	76.3	100%

SOURCE: NRCS CUSTOM SOIL SURVEY 2024.

FIGURE 3.5-1. NATURAL RESOURCE CONSERVATION SOILS IN THE PLAN AREA

ALQUIST-PRIOLO SPECIAL STUDY ZONE

The California legislature passed the Alquist-Priolo Special Studies Zone Act, in 1972, to address seismic hazards associated with faults and to establish criteria for developments for areas with identified seismic hazard zones. The California Geologic Survey (CGS) evaluates faults with available geologic and seismologic data and determines if a fault should be zoned as active, potentially active, or inactive. If CGS determines a fault to be active, then it is typically incorporated into a Special Studies Zone in accordance with the Alquist-Priolo Earthquake Hazard Act. Alquist-Priolo Special Study Zones are usually one-quarter mile or less in width and require site-specific evaluation of fault location and require a structure setback if the fault is found traversing a project site. The Pittsburg Planning Area is not within an Alquist-Priolo Special Study Zone. The nearest Alquist-Priolo Fault Zone, the Concord Fault Zone, is located approximately four miles west of Pittsburg.

FAULTS

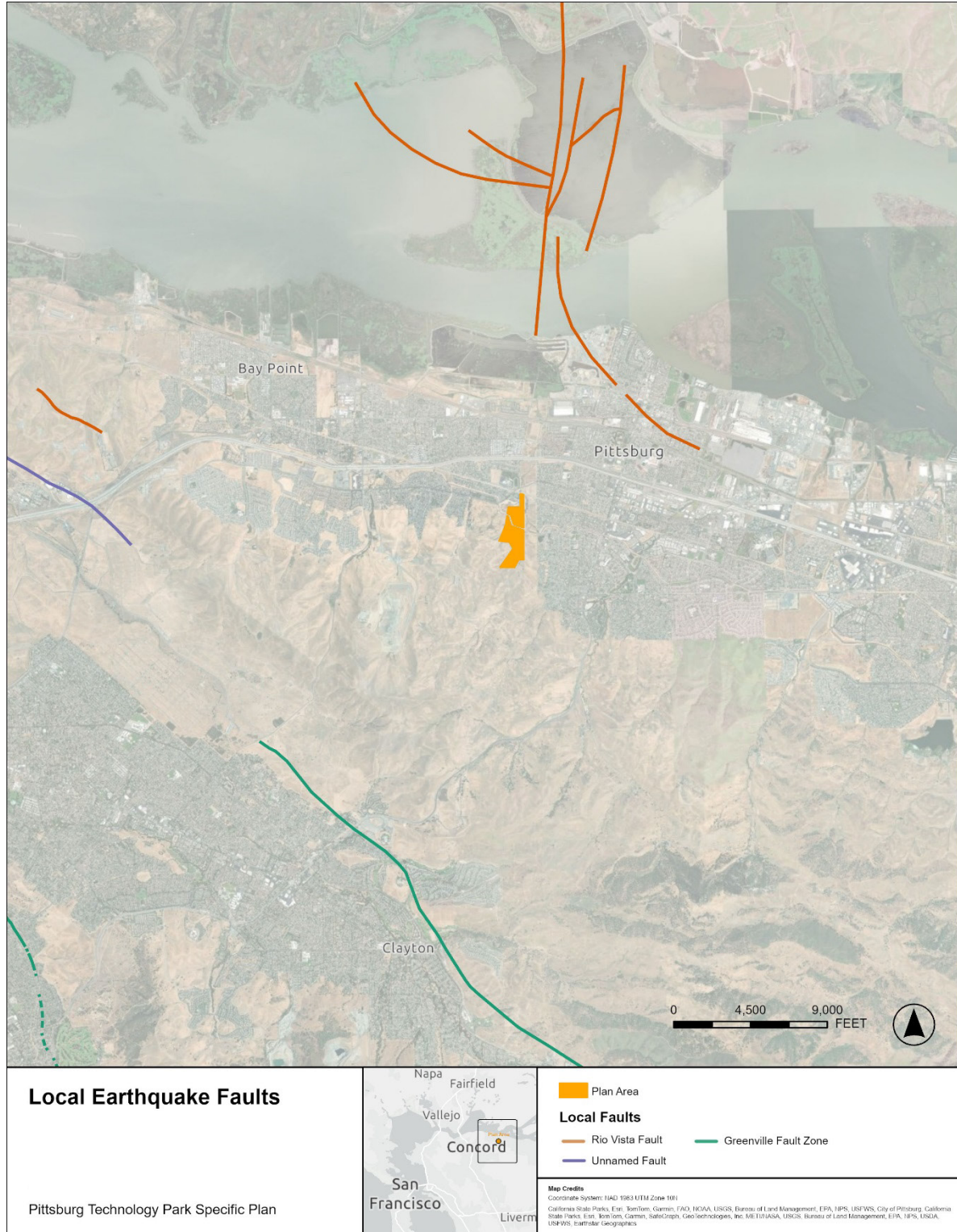
A fault is a fracture in the crust of the earth along which rocks on one side have moved relative to those on the other side. A fault trace is the line on the earth's surface defining the fault. Displacement of the earth's crust along faults releases energy in the form of earthquakes and in some cases in fault creep. Most faults are the result of repeated displacements over a long period of time.

An “active fault” is defined as a fault that exhibits surface displacement having occurred during Holocene time (within the last 11,700 years). The definition of “potentially active” varies and is no longer used as a criterion for zoning by the California Geological Survey (CGS). Instead, the terms “sufficiently active” and “well-defined” are now used by the CGS as criteria for zoning faults under the Alquist-Priolo Earthquake Fault Zoning Act.

A “sufficiently active” fault is one that shows evidence of Holocene surface displacement along one or more of its segments and branches. A “well-defined” fault is one whose trace is clearly detectable by a physical feature at or just below the ground surface. The definition “inactive” generally implies that a fault has not been subjected to seismic activity for more than 2.6 million years.

The Plan Area is not located within an active Earthquake Fault Zone as defined by the CGS. However, there are faults proximal to the Plan Area, including the Rio Vista fault, the Greenville Fault zone, and an unnamed fault west of the Plan Area, as illustrated by Figure 3.5-2. The Rio Vista fault is within two miles of the Plan Area, whereas the Greenville Fault and the unnamed fault are within five miles of the Plan Area.

FIGURE 3.5-2. LOCAL EARTHQUAKE FAULT ZONES



SEISMICITY

The amount of energy available to a fault is determined by considering the slip-rate of the fault, its area (fault length multiplied by down-dip width), maximum magnitude, and the rigidity of the displaced rocks. These factors are combined to calculate the moment (energy) release on a fault. The total seismic energy release for a fault source is sometimes partitioned between two different recurrence models, the characteristic and truncated Gutenberg-Richter (G-R) magnitude-frequency distributions. These models incorporate our knowledge of the range of magnitudes and relative frequency of different magnitudes for a particular fault.

Earthquakes are generally expressed in terms of intensity and magnitude. Intensity is based on the observed effects of ground shaking on people, buildings, and natural features. By comparison, magnitude is based on the amplitude of the earthquake waves recorded on instruments, which have a common calibration. The Richter scale, a logarithmic scale ranging from 0.1 to 9.0, with 9.0 being the strongest, measures the magnitude of an earthquake relative to ground shaking. Table 3.5-2 provides a description and a comparison of intensity and magnitude. The Modified Mercalli intensity scale for earthquakes is summarized in Table 3.5-3.

TABLE 3.5-2: RICHTER MAGNITUDES AND EFFECTS

MAGNITUDE	EFFECTS
< 3.5	Typically not felt
3.5 – 5.4	Often felt but damage is rare
5.5 – < 6	Damage is slight for well-built buildings
6.1 – 6.9	Destructive potential over ±60 miles of occupied area
7.0 – 7.9	“Major Earthquake” with the ability to cause damage over larger areas
≥ 8	“Great Earthquake” can cause damage over several hundred miles

SOURCE: 2040 GENERAL PLAN DRAFT ENVIRONMENTAL IMPACT REPORT.

TABLE 3.5-3: MODIFIED MERCALLI INTENSITY SCALE FOR EARTHQUAKES

RICHTER MAGNITUDE	MODIFIED MERCALLI	EFFECTS OF INTENSITY
0.1 – 0.9	I	Earthquake shaking not felt
1.0 – 2.9	II	Shaking felt by those at rest.
3.0 – 3.9	III	Felt by most people indoors, some can estimate duration of shaking.
4.0 – 4.5	IV	Felt by most people indoors. Hanging objects rattle, wooden walls and frames creak.
4.6 – 4.9	V	Felt by everyone indoors, many can estimate duration of shaking. Standing autos rock. Crockery clashes, dishes rattle and glasses clink. Doors open, close and swing.
5.0 – 5.5	VI	Felt by all who estimate duration of shaking. Sleepers awaken, liquids spill, objects are displaced, and weak materials crack.
5.6 – 6.4	VII	People frightened and walls unsteady. Pictures and books thrown, dishes and glass are broken. Weak chimneys break. Plaster, loose bricks and parapets fall.
6.5 – 6.9	VIII	Difficult to stand. Waves on ponds, cohesionless soils slump. Stucco and masonry walls fall. Chimneys, stacks, towers, and elevated tanks twist and fall.
7.0 – 7.4	IX	General fright as people are thrown down, hard to drive. Trees broken, damage to foundations and frames. Reservoirs damaged, underground pipes broken.
7.5 – 7.9	X	General panic. Ground cracks, masonry and frame buildings destroyed. Bridges destroyed and railroads bent slightly. Dams, dikes and embankments damaged.
8.0 – 8.4	XI	Large landslides, water thrown, general destruction of buildings. Pipelines destroyed and railroads bent.
8.5 +	XII	Total nearby damage, rock masses displaced. Lines of sight/level distorted. Objects thrown into air.

SOURCE: 2040 GENERAL PLAN DRAFT ENVIRONMENTAL IMPACT REPORT.

The Significant United States Earthquake data, published by the USGS in the National Atlas, identifies earthquakes that caused deaths, property damage, and geologic effects or were felt by populations near the epicenter. Review of this data indicates that no significant earthquakes are identified within the Plan Area; however, significant earthquakes are documented in the region.

The Plan Area may be subject to ground shaking from seismic events associated with the active and potentially active fault systems in the area, as the closest fault is the Rio Vista fault located two miles north of the Plan Area. The intensity of ground shaking that occurs during an earthquake depends upon the magnitude of the earthquake, the location of the seismic source relative to the site, and the subsurface conditions. For historical area context, the following table presents known significant earthquakes in the region.

TABLE 3.5-4: SIGNIFICANT EARTHQUAKES IN THE REGION

MAGNITUDE	INTENSITY	LOCATION	YEAR
4.1	IV	9 miles south east of Alum Rock	2017
4.0	IV	Piedmont	2015
4.1	IV	6 miles east of Yountville	2015
4.0	IV	2 miles north of Fremont	2015
6.0	VIII	South Napa	2014
5.6	VI	San Jose	2007
5.0	VII	Napa	2000
6.9	IX	Loma Prieta (San Andreas)	1989
5.4	N/A	Santa Cruz County	1989
6.2	N/A	Morgan Hill	1984
5.8, 5.8	VII	Livermore	1980
5.7	N/A	Coyote Lake	1979
5.7, 5.6	N/A	Santa Rosa	1969
5.3, 4.2	N/A	Daly City	1957
5.4	N/A	Concord	1954
6.5	N/A	Calaveras fault	1911
7.9	IX	San Francisco	1906
6.8	N/A	Mendocino	1898
6.2	N/A	Mare Island	1898
6.3	N/A	Calaveras fault	1893
6.2	VIII	Winters	1892
6.4	N/A	Vacaville	1892
6.8	VII	Hayward	1868
6.5	VIII	Santa Cruz Mountains	1865
6.8	N/A	San Francisco Peninsula	1838

SOURCE: 2040 GENERAL PLAN DRAFT ENVIRONMENTAL IMPACT REPORT.

SEISMIC HAZARDS

Seismic Ground Shaking

The potential for seismic ground shaking in California is expected. As a result of the foreseeable seismicity in California, the state requires special design considerations for all structural improvements in accordance with the seismic design provisions in the California Building Code (CBC). These seismic design provisions require enhanced structural integrity based on several risk parameters.

Fault Rupture

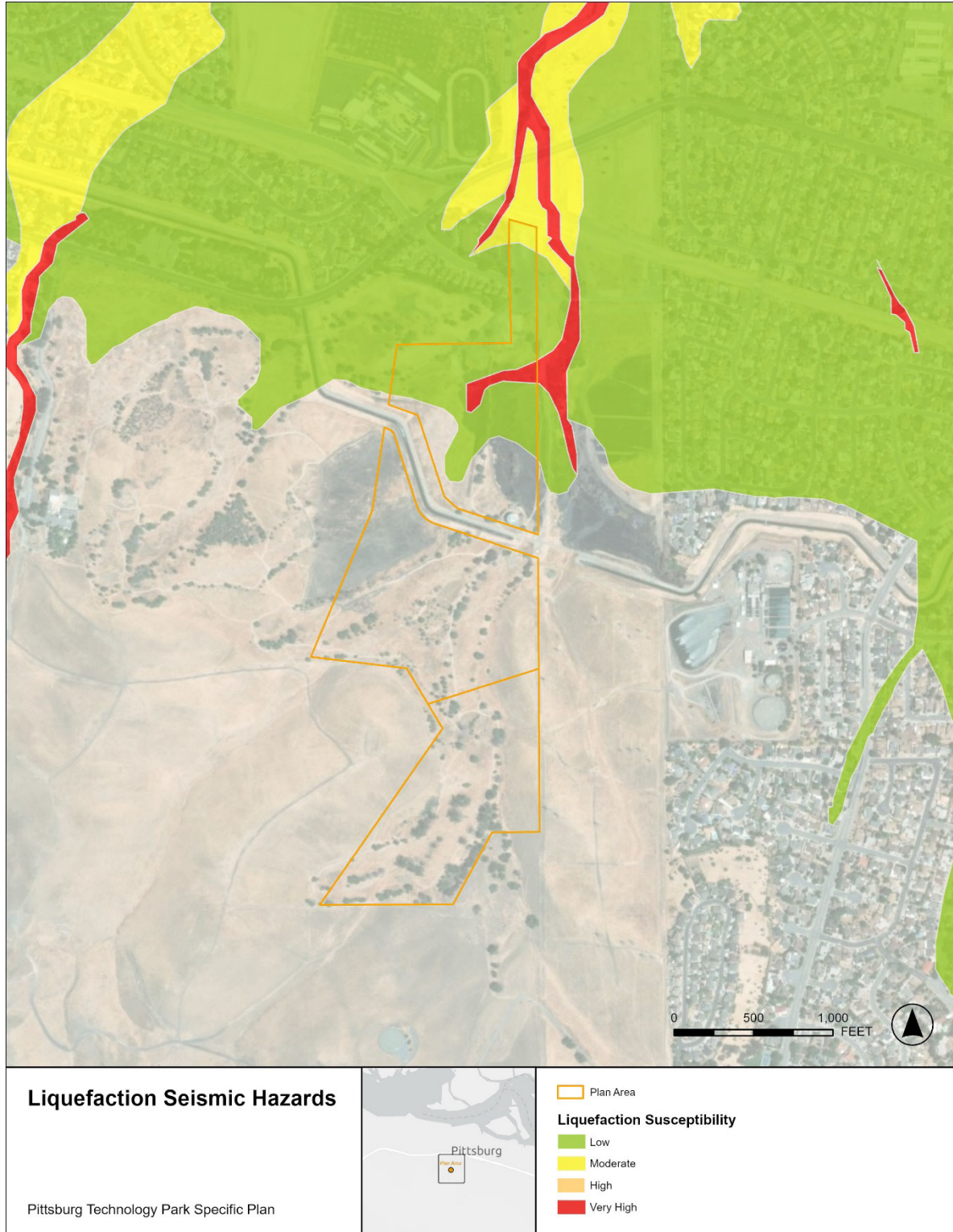
As stated above, fault rupture occurs when the surface of the earth breaks as a result of an earthquake, although this does not happen with all earthquakes. These ruptures generally occur in a weak area of an existing fault. Ruptures can be sudden (i.e. earthquake) or slow (i.e. fault creep).

The Alquist-Priolo Fault Zoning Act requires active earthquake fault zones to be mapped and it provides special development considerations within these zones. The Plan Area is not located within an active earthquake fault zone and fault rupture is not anticipated. Figure 3.5-2 shows regional faults in relation to the Plan Area.

Liquefaction

Liquefaction is a phenomenon in which saturated, cohesionless soils lose their inherent shear strength and integrity due to build-up of excess water induced by cyclic loading, such as that caused by an earthquake. Therefore, liquefaction is typically associated with earthquakes of high magnitude. Loose, saturated granular materials are most susceptible to liquefaction. As such, much of the low-lying zones of the Plan Area have potential for earthquake induced liquefaction based on the wide presence of Quaternary age sediments that may have a shallow groundwater condition. Figure 3.5-3 provides a map of the liquefaction potential of the soils within the Plan Area.

FIGURE 3.5-3. LIQUEFACTION SEISMIC HAZARD ZONES



Lateral Spreading

Lateral spreading typically results when ground shaking moves soil toward an area where the soil integrity is weak or unsupported during an earthquake. Lateral spreading typically occurs on the surface of a slope and is directly associated with areas of liquefaction. The Plan Area is generally flat with wave-like rolling hills, however, is surrounded by rising hillsides of undisturbed natural ground to the west, south and east. The potential for lateral spreading to occur in the Plan Area is considered low.

Landslides

Landslides include rockfalls, deep slope failure, and shallow slope failure. Factors such as the geological conditions, drainage, slope, vegetation, and others directly affect the potential for landslides. One of the most common causes of landslides is construction activity that is associated with road building (i.e. cut and fill). Slopes associated with construction activity in the Plan Area include two existing northeast facing cut slopes located immediately adjacent to the canal. Additionally, the Plan Area is surrounded by undisturbed rolling hillsides to the west, south, and east. As evidenced by the Geotechnical Due Diligence Report, no existing landslides including landslips, escarpments, slumps, or other salient ground failures were observed in the Plan Area during site reconnaissance.

NON-SEISMIC HAZARDS

Expansive Soils

Expansive soils are materials that undergo significant volume change in response to relative changes in moisture content. They shrink and harden when dried and expand and soften when wet. If structures are underlain by expansive soils, it is important that foundation systems be capable of tolerating or resisting any potentially damaging soil movements. Lightly loaded structures are more susceptible to damage by expansive soil. It is important to limit moisture changes in the surficial soils by using positive drainage away from buildings as well as limiting landscaping watering.

The Geotechnical Due Diligence Report prepared for the proposed project identifies existing extensive desiccation cracks within the Plan Area, which may indicate evidence of potentially expansive soils in the Plan Area. In addition, the Plan Area consists of predominantly low to high plasticity clays (CL/CH). Portions of the Plan Area consist of man-placed fill soils or disturbed native soils which consist of both fine and coarse soils with highly variable organic content levels and porosity, rendering a medium to high expansion potential within the Plan Area.

Erosion

Erosion naturally occurs on the surface of the earth as surface materials (i.e. rock, soil, debris, etc.) are loosened, dissolved, or worn away, and transported from one place to another by gravity. Two common types of soil erosion include wind erosion and water erosion. The steepness of a slope is an important factor that affects soil erosion. Erosion potential in soils is influenced primarily by loose

soil texture and steep slopes. Loose soils can be eroded by water or wind forces, whereas soils with high clay content are generally susceptible only to water erosion. The potential for erosion generally increases as a result of human activity, primarily through the development of facilities and impervious surfaces and the removal of vegetative cover.

The Web Soil Survey identified the erosion potential for the soils in the Plan Area. This report summarizes those soil attributes used by the Revised Universal Soil Loss Equation Version 2 (RUSLE2) for the map units in the selected area. Soil property data for each map unit component includes the hydrologic soil group, erosion factors Kf for the surface horizon, erosion factor T, and the representative percentage of sand, silt, and clay in the surface horizon.

Within the Plan Area, the erosion factor Kf varies from 0.20 to 0.32, which is considered a low to moderate potential for erosion. Although clay soils in the Plan Area generally have low K values, erosion prevention and sedimentation control is best addressed by the implementation and monitoring of Best Management Practices (BMPs).

Collapsible Soils

Collapsible soils undergo a rearrangement of their grains and a loss of cementation, resulting in substantial and rapid settlement under relatively low loads. Collapsible soils occur predominantly at the base of mountain ranges, where Holocene-age alluvial fan and wash sediments have been deposited during rapid run-off events. Soils prone to collapse are commonly associated with manmade fill, wind-laid sands and silts, and alluvial fan and mudflow sediments deposited during flash floods. During an earthquake, even slight settlement of fill materials can lead to a differentially settled structure and significant repair costs. Differential settlement of structures typically occurs when heavily irrigated landscape areas are near a building foundation. Examples of common problems associated with collapsible soils include tilting floors, cracking or separation in structures, sagging floors, and nonfunctional windows and doors. Collapsible soils have not been identified in the Plan Area and the Plan Area is considered to have a low potential to collapse.

Subsidence

Land subsidence is the gradual settling or sinking of an area with little or no horizontal motion due to changes taking place underground. It is a natural process, although it can also occur (and is greatly accelerated) as a result of human activities. Common causes of land subsidence from human activity include withdrawing extensive amounts of groundwater from aquifer systems, mining oil and gas from underground reservoirs, or a collapse of underground mines. No groundwater extraction or underground mines are known to be near the site. The potential for subsidence to occur in the Plan Area is considered low.

Naturally Occurring Asbestos

The term “asbestos” is used to describe a variety of fibrous minerals that, when airborne, can result in serious human health effects. Naturally occurring asbestos is commonly associated with ultramafic rocks and serpentinite. Ultramafic rocks, such as dunite, peridotite, and pyroxenite are igneous rocks comprised largely of iron-magnesium minerals. As they are intrusive in nature, these

rocks often undergo metamorphosis, prior to their being exposed on the Earth's surface. The metamorphic rock serpentinite is a common product of the alteration process. Naturally occurring asbestos is identified within Contra Costa County, although it is all located to the south of Pittsburg near Walnut Creek. There is no naturally occurring asbestos mapped within the Plan Area.

Paleontological Resources

Paleontology is the science that attempts to unravel the meaning of these fossils in terms of the organisms they represent, the ages and geographic distribution of those organisms, how they interacted in ancient ecosystems and responded to past climatic changes, and the changes through time of all of these aspects. The sensitivity of a given area or body of sediment with respect to paleontological resources is a function of both the potential for the existence of fossils and the predicted significance of any fossils which may be found there. The primary consideration in the determination of paleontological sensitivity of a given area, body of sediment, or rock formation is its potential to include fossils.

A review of published and unpublished literature and field survey was conducted for the Plan Area. The review was used to document the number and locations of previously recorded fossil sites from rock units and was supplemented by an archival search conducted at the University of California Museum of Paleontology. The review identified Quaternary older alluvium (Qoa) in the northern portion of the Plan Area which yielded a fossil fish skull in 1961 in a gravel terrace which is no longer present within the Plan Area. A resource inventory was completed to understand potential paleontological resources in the Plan Area and surrounding vicinity. The analysis used the classification system adopted by the Society of Vertebrate Paleontology for addressing paleontological productivity of each geologic unit. Based on the system, geologic units have the potential to produce paleontological resources based on the relative abundance and their sensitivity to adverse impacts. Due to finding a fossil fish skull in the northern portion of the Plan Area, a high fossil potential has been assigned to the geologic units underlying the Plan Area.

3.5.2 REGULATORY SETTING

FEDERAL

Earthquake Hazards Reduction Act

The Earthquake Hazards Reduction Act of 1977 (42 USC, 7701 et seq.) requires the establishment and maintenance of an earthquake hazards reduction program by the federal government. Under the National Earthquake Hazards Reduction Program (NEHRP), four federal agencies have responsibility for long-term earthquake risk reduction: the USGS, the National Science Foundation (NSF), the Federal Emergency Management Agency (EMA), and the National Institute of Standards and Technology (NIST). NEHRP's mission includes improved understanding, characterization, and prediction of hazards and vulnerability; improvements of building codes and land use practices; risk reduction through post- earthquake investigation and education; development and improvement of design and construction techniques; improvement of mitigation capacity; and accelerated application of research results.

Executive Order 12699

Signed in January 1990, Presidential Executive Order 12699 implements provisions of the Earthquake Hazards Reduction Act for “federal, federally assisted or federally regulated new building construction” and requires the development and implementation of seismic safety programs by Federal agencies.

International Building Code (IBC)

The purpose of the International Building Code (IBC) is to provide minimum standards to preserve the public peace, health, and safety by regulating the design, construction, quality of materials, certain equipment, location, grading, use, occupancy, and maintenance of all buildings and structures. IBC standards address foundation design, shear wall strength, and other structurally related conditions.

STATE

California Building Standards Code

CCR Title 24, known as the California Building Standards Code (CBSC) or simply "Title 24," contains the regulations that govern the construction of buildings in California. The CBSC includes 12 parts: California Building Standards Administrative Code, California Building Code (CBC), California Residential Building Code, California Electrical Code, California Mechanical Code, California Plumbing Code, California Energy Code, California Historical Building Code, California Fire Code, California Existing Building Code, California Green Building Standards Code (CALGreen Code), and the California Reference Standards Code. Through the CBSC, the state provides a minimum standard for building design and construction. The CBSC contains specific requirements for seismic safety, excavation, foundations, retaining walls, and site demolition. It also regulates grading activities, including drainage and erosion control.

CBC Title 24, Part 2, Chapter 16 addresses structural design, Chapter 17 addresses structural tests and special inspections, and Chapter 18 addresses soils and foundations. Section 1610 provides structural design standards for foundation walls and retaining walls to ensure resistance to lateral soil loads. Section 1613 provides structural design standards for earthquake loads. Section 1704.7 requires special inspections for existing site soil conditions, fill placement and load-bearing requirements during the construction as specified in Table 1704.7 of this section. Sections 1704.8 through 1704.16 provide inspection and testing requirements for various foundation types, and construction material types. Section 1803.1.1.1 requires each city and county enact an ordinance which requires a preliminary soil report and that the report be based upon adequate test borings or excavations, of every subdivision, where a tentative and final map is required pursuant to Section 66426 of the Government Code. Section 1803.5.3 defines expansive soils and specifies that in areas likely to have expansive soil, the building official shall require soil tests to determine where such soils do exist. Section 1803.5.4 specifies that a subsurface soil investigation must be performed to determine whether the existing ground-water table is above or within 5 feet (1524 mm) below the elevation of the lowest floor level where such floor is located below the finished ground level

adjacent to the foundation. Section 1803.5.8 provides specific standards where shallow foundations will bear on compacted fill material more than 12 inches (305 mm) in depth. Sections 1803.5.11 and 1803.5.12 provide requirements for geotechnical investigations for structures assigned varying Seismic Design Categories in accordance with Section 1613. Section 1804 provides standards and requirements for excavation, grading, and fill. Sections 1808, 1809, and 1810 provide standards and requirements for the construction of varying foundations.

California Health and Safety Code

Section 19100 et seq. of the California Health and Safety Code establishes the state's regulations for earthquake protection. This section of the code requires structural designs to be capable of resisting likely stresses produced by phenomena such as strong winds and earthquakes.

Alquist-Priolo Earthquake Fault Zoning Act

The Alquist-Priolo Earthquake Fault Zoning Act of 1972 sets forth the policies and Criteria of the State Mining and Geology Board, which governs the exercise of governments' responsibilities to prohibit the location of developments and structures for human occupancy across the trace of active faults. The policies and criteria are limited to potential hazards resulting from surface faulting or fault creep within Earthquake Fault Zones, as delineated on maps officially issued by the State Geologist. Working definitions include:

- Fault – a fracture or zone of closely associated fractures along which rocks on one side have been displaced with respect to those on the other side;
- Fault Zone – a zone of related faults, which commonly are braided and sub parallel, but may be branching and divergent. A fault zone has a significant width (with respect to the scale at which the fault is being considered, portrayed, or investigated), ranging from a few feet to several miles;
- Sufficiently Active Fault – a fault that has evidence of Holocene surface displacement along one or more of its segments or branches (last 11,000 years); and
- Well-Defined Fault – a fault whose trace is clearly detectable by a trained geologist as a physical feature at or just below the ground surface. The geologist should be able to locate the fault in the field with sufficient precision and confidence to indicate that the required site-specific investigations would meet with some success.

"Sufficiently Active" and "Well Defined" are the two criteria used by the State to determine if a fault should be zoned under the Alquist-Priolo Act.

Seismic Hazards Mapping Act

The Seismic Hazards Mapping Act, passed in 1990, addresses non-surface fault rupture earthquake hazards, including liquefaction and seismically-induced landslides. Under the Seismic Hazards Mapping Act, seismic hazard zones are to be mapped by the State Geologist to assist local governments in land use planning. The program and actions mandated by the Seismic Hazards Mapping Act closely resemble those of the Alquist-Priolo Earthquake Fault Zoning Act (which addresses only surface fault-rupture hazards) and are outlined below:

The State Geologist is required to delineate the various “seismic hazard zones.”

- Cities and Counties, or other local permitting authority, must regulate certain development “projects” within the zones. They must withhold the development permits for a site within a zone until the geologic and soil conditions of the site are investigated and appropriate mitigation measures, if any, are incorporated into development plans.
- The State Mining and Geology Board provides additional regulations, policies, and criteria, to guide cities and counties in their implementation of the law. The Board also provides guidelines for preparation of the Seismic Hazard Zone Maps and for evaluating and mitigating seismic hazards.
- Sellers (and their agents) of real property within a mapped hazard zone must disclose that the property lies within such a zone at the time of sale.

Caltrans Seismic Design Criteria

Caltrans has Seismic Design Criteria (SDC), which is an encyclopedia of new and currently practiced seismic design and analysis methodologies for the design of new bridges in California. The SDC adopts a performance-based approach specifying minimum levels of structural system performance, component performance, analysis, and design practices for ordinary standard bridges. The SDC has been developed with input from the Caltrans Offices of Structure Design, Earthquake Engineering and Design Support, and Materials and Foundations. Memo 20-1 outlines the bridge category and classification, seismic performance criteria, seismic design philosophy and approach, seismic demands and capacities on structural components and seismic design practices that collectively make up Caltrans’ seismic design methodology.

Division of Mines and Geology

The California Division of Mines and Geology (DMG) operates within the Department Of Conservation (DOC). The DMG is responsible for assisting in the utilization of mineral deposits and the identification of geological hazards.

State Geological Survey

Similar to the DMG, CGS is responsible for assisting in the identification and proper utilization of mineral deposits, as well as the identification of fault locations and other geological hazards.

LOCAL

City of Pittsburg 2040 General Plan

The City of Pittsburg 2040 General Plan (2040 General Plan) was comprehensively updated in 2024. The following goals, policies, and action items pertain to geology and soils.

Urban Design Element

Goal-4-2: Encourage preservation of the City's unique natural environment, including hillsides, distinct geologic and topographic landforms, open space, and the waterfront, through a built environment that respects the City's natural features and viewsheds.

Policy: 4-P-2.1: Encourage development that preserves unique natural features, such as topography, rock outcroppings, mature trees, creeks, and designated major and minor ridgelines in the design of hillside neighborhoods.

Policy: 4-P-2.2: In areas not addressed under Policy 4-P-2.1, encourage development that preserves unique natural features, such as topography, rock outcroppings, mature trees, creeks, designated major and minor ridgelines, and views of such areas (as delineated in Figure 4-1) in new development as well as redeveloped sites.

Policy: 4-P-2.5: Ensure that hillside development enhances the built environment, improves safety through slope stabilization, is respectful of topography and other natural constraints, and preserves ridgelines and viewsheds.

Policy: 4-P-2.6: Ensure that hillside lands not environmentally suitable for development are maintained as open space.

Policy: 4-P-2.8: As part of the development review process, require design review of proposed hillside development. Encourage hillside development that is clustered in small valleys and behind minor ridgelines, to preserve more prominent view of the southern hills.

Policy: 4-P-2.10: Use revegetation as an erosion control measure to maintain the natural character of a hillside; utilize hydro-seed, silt traps, and other engineering solutions where erosion potential exists during development.

Resource Conservation & Open Space Element

Goal-10-3: Protect and preserve the availability and quality of soil as a resource to sustain healthy plant, animal, and human life.

Policy: 10-P-3.1: Require development to use best management practices (BMPs) to minimize the runoff and erosion caused by earth movement.

Actions: 10-A-3.a: Require evaluation and implementation of appropriate measures as part of development plans for creek bank stabilization as well as necessary BMPs to reduce erosion and sedimentation.

Actions: 10-A-4.c: Continue working with the Regional Water Quality Control Board in the implementation of the National Pollutant Discharge Elimination System (NPDES) permits, with specific requirements established in each NPDES permit.

Goal-10-7: Encourage municipal and community awareness, appreciation, and support for Pittsburg's historic, cultural, and archeological resources.

Actions: 10-P-7.3: Protect archeological/paleontological sites from destruction in order to preserve and interpret them for future scientific research, and public educational programs.

Actions: 10-A-7.i: Require a records search for any proposed development project, to determine whether the site contains known archaeological, historic, cultural, or paleontological resources and/or to determine the potential for discovery of additional cultural or paleontological resources. If any resources are identified, identify methods to preserve the resource or to document and account for the resource. This requirement may be waived if determined by the City that the proposed project area is already sufficiently surveyed.

Safety and Resiliency Element

Goal-11-1: Protect the safety of life and property throughout the community by planning and preparing for effective disaster and emergency response.

Policy: 11-P-1.1: Ensure Pittsburg is prepared to effectively respond to any emergency or disaster, including flooding, fire, hazardous material releases, and seismic activity, in cooperation with other public agencies and appropriate organizations.

Policy: 11-P-1.2: Ensure emergency response equipment and personnel training are adequate to follow the procedures contained within the Emergency Operations Plan and Emergency Response and Emergency Operations Plan for a major earthquake, wildland fire, flood, or hazardous materials release event.

Policy: 11-P-1.3: Locate new essential public facilities outside of high hazard areas, including high fire risk areas, special flood hazard areas, and areas at high risk for geologic or soil instability, to the extent feasible. Where it is not feasible to locate essential public facilities outside of high hazard areas, require site design, construction, and other methods to minimize damage.

Goal-11-3: Reduce risks to human life, property, and public services associated with flooding and sea level rise.

Policy: 11-P-3.1: Reduce the risk of loss of life, personal injury, and property damage resulting from flooding by properly maintaining storm drainage systems, natural flood control channels, and waterways and regulating runoff from new construction and development projects.

Policy: 11-P-3.4: Ensure that development projects mitigate impacts to the City's storm drainage capacity from storm water runoff occurring from the property. Project applicants shall demonstrate that projects implement Best Management Practices (BMPs) and Low Impact Development measures (LID) to treat stormwater before discharge from the site

project and that project implementation would not result in increases in the peak flow runoff to adjacent lands or drainage facilities that would exceed the design capacity of the drainage facility or result in an increased potential for off-site flooding.

Policy: 11-P-3.5: Assure through the Master Drainage Plan and development ordinances that proposed new development adequately provides for on-site and downstream mitigation of potential flood hazards.

Policy: 11-P-3.7: Ensure that new developments comply with all applicable requirements of Municipal Code Chapter 15.80 - Floodplain Management, the California Building Code as adopted by the City, and the latest promulgated FEMA standards for development in the flood hazard areas.

Goal-11-4-: Minimize risk to life and property from geologic and seismic hazards

Policy: 11-P-4.1: Regulate development in areas of seismic and geologic hazards to reduce risks to life and property associated with earthquakes, liquefaction, erosion, landslides, and expansive soils, and require new development redevelopment and infrastructure projects to avoid unreasonable exposure to seismic and geologic hazards.

Policy: 11-P-4.2: Limit urban development in high-risk areas (such as landslide areas, flood zones, and areas subject to liquefaction) to low-occupancy or open forms of land use.

Policy: 11-P-4.3: Limit development on slopes greater than 30 percent (as delineated on Figure 11-3) to lower elevations, foothills, and knolls, unless it can be demonstrated that appropriate soil stability techniques can be implemented.

Policy: 11-P-4.4: Regulate the grading and development of hillside areas for new urban land uses. Ensure that such new uses are constructed to reduce erosion and land sliding hazards:

- Limit cut slopes to 3:1, except where an engineering geologist can establish that a steeper slope would perform satisfactorily over the long term.
- Encourage use of retaining walls or rock-filled crib walls as an alternative to high cut slopes.
- Ensure revegetation of cut-and-fill slopes to control erosion.
- Ensure blending of cut-and-fill slopes within existing contours, and provision of horizontal variation, in order to mitigate the artificial appearance of engineered slopes.

Policy: 11-P-4.5: Limit future extension of development into the southeast hills, where there are high levels of risk due to previous coal mining.

City of Pittsburg Buildings and Construction Code

Many engineering projects within the City are required to include geotechnical investigations with input from: 1) an engineering geologist licensed in the State of California (engineering geologist) and 2) either a civil engineer licensed in the State of California, experienced in the field of soil mechanics,

or a geotechnical engineer licensed in the State of California (soils engineer). These requirements are in accordance with the City of Pittsburg Municipal Code (PMC) Title 15 (Buildings and Construction).

City of Pittsburg Grading Ordinance

The City of Pittsburg adopted the 2022 California Building Code (CBC) California Code of Regulations, Title 24, Part 3, and Appendices based on the International Building Code published by the International Code Council. In accordance with the Code, construction activities require development review by the city engineer to minimize adverse effects from grading, cut and fill operations, water runoff, and soil erosion. Development projects must first obtain a permit if the grading, fill, excavation, the storage or disposal of soil and earth materials exceeds certain thresholds adopted by the City, as identified in Chapter 15.88(B) Grading, Erosion and Sediment Control. Permit application requires additional application materials and supportive evidence such as soil samples that inform the development review process. These supportive documents include but are not limited to: erosion and sediment control plans (interim and final), grading plans, soils engineering report, and geology engineering report where required. By minimizing adverse impacts of grading, cut and fill operations, water, and soil erosion, Chapter 15.88 encourages the reduction or elimination of earth slides, mud flows, rock falls, undue settlement, erosion, siltation, and flooding.

In accordance with the Code, Specific Plans require their own set of grading, erosion, and sediment control application materials prior to development. This includes a grading plan and site map, detailed to the level required by the city engineer, an interim and final Erosion and Sediment Control Plan, a Soils and Engineering Geology Report, and a work schedule. The Soils and Engineering report must be prepared by a professional soil investigation firm under the direction of a registered soils engineer and an engineering geologist. To ensure the safety of the site, the City reserves the right to require additional soils and/or geologic investigations to the required below:

- a. Sufficient soil samples to represent a true cross-section of the cut and fill areas and of the material to be used as fill shall be taken and tested under the supervision of the soils engineer. All soils shall be classified in accordance with the Unified Soil Classification system. Reports, including all test reports by the soils engineer and geologist, shall be submitted covering the following:
 - i. An adequate description of the geology of the site,
 - ii. Conclusions and recommendations regarding the effect of geologic conditions on the proposed development,
 - iii. The location and effects of active faults which may affect the proposed development. The results of seismic activity on the soils as the site is proposed to be graded and on the proposed buildings to be evaluated. Recommendations shall be made relating to building distances from nearby active faults and foundation design due to seismic activity,

- iv. Data regarding the nature, distribution, strength, expansive quality and erodibility of existing soils,
 - v. Data regarding the nature, distribution, strength and erodibility of soils to be placed on the site, if any,
 - vi. Conclusions and recommendations for grading procedures,
 - vii. Conclusions and recommended designs for interim soil stabilization devices and measures and for permanent soil stabilization after construction is completed,
 - viii. Design criteria for corrective measures when necessary,
 - ix. Opinions and recommendations covering adequacy of sites to be developed by the proposed grading,
 - x. Any potential ground water condition which may affect soil strength, consolidation or slope stability shall be defined and evaluated. This is of particular importance in areas subject to vibratory or shock loadings;
- b. A complete and detailed specification shall be prepared by the soils engineer for clearing, grubbing, and all aspects of grading, including utility trench backfill, with special emphasis on the depth of fill layers, compaction methods, moisture content, frequency of field density tests, and minimum density to be obtained in the field as related to laboratory density tests;
- c. A statement regarding specified grading and slopes shall be prepared by the soils engineer, giving professional opinion including the following:
- i. Shrinkage or settlement of a fill constructed in compliance with the proposed specification for controlled earthwork,
 - ii. The safe load-bearing capacity of such controlled sites,
 - iii. The maximum slope ratios necessary for slope stability for proposed fill and cut slopes, with recommended planting on the slope to assure freedom from erosion,
 - iv. The remaining movement, if any, anticipated in cut areas. Any forecast of appreciable settlement shall be supported by appropriate site soils data;
- d. Recommendations included in this report and approved by the city shall be incorporated in the grading plans and/or specifications;
- e. All or portions of this requirement may be waived by the city engineer; provided, that:
- i. The average ground slope of the site is less than 10 percent,
 - ii. The total site area is less than 10,000 square feet, and

- iii. There are no known geologic hazards on or adjacent to the site;

City of Pittsburg Stormwater Management and Discharge Control

Stormwater runoff is regulated by the PMC Title 13 (Waters and Sewers) Chapter 13.28 Stormwater Management and Discharge Control in accordance with the Porter-Cologne Water Quality Control Act and the Federal Clean Water Act. The city's current National Pollutant Discharge Elimination System (NPDES) permit implements appropriate source control and site design measures and stormwater treatment measures for projects that create or replace 10,000 square feet or more of impervious surface. The permit contains requirements that are necessary to improve efforts to reduce pollution caused by stormwater runoff. Every application for a development project requires an accompanied stormwater control plan that meets the most recent version of the Contra Costa Clean Water Program Stormwater Section C.3 Guidebook. All construction projects are required to incorporate site-specific Best Management Practices (BMPs) to improve efforts to reduce the discharge of pollutants in storm water runoff to the maximum extent practicable (MEP) and achieve water quality standards. This permit requires that runoff is addressed during the major phases of development (planning, construction, and operation). It is at the director's (city engineer or his or her designee) discretion to require a Stormwater Pollution Prevention Plan.

City of Pittsburg Floodplain Management

The City Engineer is appointed to administer, implement, and enforce Chapter 15.80 PMC, Floodplain Management, to promote the public health, safety, and general welfare, and to minimize the public and private losses due to flood conditions in specified areas of the city. Areas that are within flood-prone, mudslide, mudflow, or flood related erosion areas, as identified by the Federal Emergency Management Agency (FEMA), are required to go through permit review and approval prior to construction, with proof that base flood elevations (BFE) provided on plans are certified by a registered civil engineer or architect. Regulations and requirements of Section 15.80 are intended to control the alteration of natural floodplains, stream channels, and natural protective barriers which help accommodate or channel floodwaters. The control of filling, grading, dredging, and other development in these special flood hazard areas are intended to minimize flood damage.

Contra Costa Clean Water Program Stormwater C.3 Guidebook

Technical guidebook to ensure projects comply with the C.3 requirements in the California Regional Water Quality Control Boards' Municipal Regional Permit. Applicants for development project approval must follow design guidelines and discuss with municipal staff for project approval. This guidebook is intended to provide latest technical design standards for developers, engineers, planners, and project applicants which work to protect water bodies from degradation caused by storm water runoff, as adopted by the San Francisco Bay Regional Water Quality Control Board. Effective July 1, 2023, impervious surface threshold for most projects have been dropped from 10,000 to 5,000 square feet.

Delta Diablo

The Delta Diablo (District) provides wastewater conveyance and treatment services for the City of Pittsburg. The plant is located north of the Pittsburg-Antioch Highway, just east of Pittsburg City limits and has a 54 square mile service area with an average wastewater flow of 12.4 million gallons per day. The District adopted a district Resource Recovery Facility Master Plan (2022), which focuses on near and long-term infrastructure improvements. The plan guides development of future capital project design assumptions by updating wastewater flow and load projections in a 20-year horizon. This includes a phased plant expansion to accommodate growth anticipated in the 2040 General Plan. Increased wastewater flows captured from the Plan Area is considered through the 2040 General Plan.

3.5.3 THRESHOLDS OF SIGNIFICANCE

Consistent with Appendix G of the CEQA Guidelines, the proposed project will have a significant impact on geology and soils if it will:

- Directly or indirectly cause potential substantial adverse effects, including the risk of loss, injury, or death involving:
 - Rupture of a known earthquake fault, as delineated on the most recent Alquist-Priolo Earthquake Fault Zoning Map issued by the State Geologist for the area or based on other substantial evidence of a known fault? Refer to Division of Mines and Geology Special Publication 42;
 - Strong seismic ground shaking;
 - Seismic-related ground failure, including liquefaction; or
 - Landslides.
- Result in substantial soil erosion or the loss of topsoil;
- Be located on a geologic unit or soil that is unstable, or that would become unstable as a result of the project, and potentially result in on- or off-site landslide, lateral spreading, subsidence, liquefaction or collapse;
- Be located on expansive soil, as defined in Table 18-1-B of the Uniform Building Code (1994), creating substantial direct or indirect risks to life or property;
- Have soils incapable of adequately supporting the use of septic tanks or alternative waste water disposal systems where sewers are not available for the disposal of waste water; or
- Directly or indirectly destroy a unique paleontological resource or site or unique geologic feature.

3.5.4 IMPACTS AND MITIGATION MEASURES

Impact 3.5-1: Directly or indirectly have the potential to expose people or structures to substantial adverse effects, including the risk of loss, injury, or death involving rupture of a known earthquake fault, strong seismic ground shaking, seismic-related ground failure, including liquefaction, or landslides (Less than Significant)

There are no Alquist-Priolo Earthquake Fault Zones located within the Plan Area. However, there are numerous known active or sufficiently active faults located in the region. Figure 3.5-2 illustrates the location of these faults. The USGS Survey identifies the Rio Vista fault, two miles north of the Plan Area. Given the numerous faults and recorded significant earthquakes proximal to the Plan Area, shown in Figure 3.5-2 and Table 3.5-4, respectively, future development may expose people or structures to potential adverse effects associated with a seismic event, including strong ground shaking and seismic-related ground failure.

All future development projects accommodated by the Pittsburg Technology Park Specific Plan would be required to comply with the provisions of the CBSC and the 2022 California Building Code (as adopted by the City as the Building Code), which requires projects to perform geotechnical investigations in accordance with state law, engineer improvements to address potential seismic and ground failure issues and use earthquake-resistant construction techniques to address potential earthquake loads when constructing buildings and improvements. Based on the CBC, determination of seismic design category is dependent on the existing soils of the site, and structures shall be designed and constructed to resist the effects of earthquake motions. Moreover, prior to any earthwork, Chapter 15.88 PMC requires Specific Plans to submit a Soils and Engineering Geology Report with soil samples by a registered soils engineer and an engineering geologist. This requirement ensures adequate soil sampling and earthquake load determination as required by the CBSC. Adherence to CBSC related to earthquakes, seismicity, and ground shaking are designed to reduce cyclic loading which is an adverse effect with the potential for liquefaction, as the low-lying areas of the proposed Plan Area have the potential for earthquake induced liquefaction. Future geotechnical investigations should include sufficient subsurface explorations throughout the site with soil sampling that would allow for a proper assessment of liquefaction potential and associated seismic design standards consistent with CBSC. Grading regulations (described in Chapter 15.88.060), grading plans, and site-specific Erosion and Sediment Control plans required for Specific Plans by Chapter 15.88, would further ensure adverse impacts from construction activities would prevent potential failures known to affect landslide potential. These requirements are consistent with the PMC Title 15 (Buildings and Construction) and the CBSC.

As previously noted, a geotechnical investigation would be conducted on a project-by-project basis, prior to final design and approval of the project and would be used in determining final siting of project infrastructure.

Future development applications sought in conformance with the proposed Specific Plan shall be submitted to the Zoning Administrator (ZA) for review and approval, and following approval, would be submitted for a building permit, at which time conformance with the above Building and Construction Code would be verified. The required geotechnical reports for building permit approval would ensure that any earthwork for future development accommodated by the proposed Specific Plan supports the goals in the Safety and Resource Conservation & Open Space Element of the 2040 General Plan, and their corresponding policies and actions.

There will always be a potential for ground shaking caused by seismic activity anywhere in California, including the Plan Area. Seismic activity could come from a known active fault, or any number of other faults in the region. In order to minimize potential damage to the buildings and site improvements, all construction in California is required to be designed in accordance with the latest seismic design standards of the California Building Code. CBSC Section 1803.5.11 and 1803.5.12 provide requirements for geotechnical investigations for structures assigned varying Seismic Design Categories in accordance with CBSC Section 1613. Collectively, the adherence with state and local regulations required for the building design and construction activities related to earthquake loads and seismic activity are based on geotechnical investigations which require soil sampling with input from a licensed engineering geologist and either a licensed civil engineer or geotechnical engineer. Design in accordance with these standards and policies would reduce any potential impact to less than significant level. Because all development in the Plan Area, and any revisions or modifications to proposed Specific Plan must be reviewed for building conformance by the Zoning Administrator, any potential impact associated with a seismic events, would be **less than significant**, and no mitigation measures are necessary.

Impact 3.5-2: Result in substantial soil erosion or the loss of topsoil (Less than Significant)

Soil erosion and the loss of topsoil is one of the most common sources of polluted stormwater runoff during construction activities. The proposed Specific Plan would facilitate development projects that would involve some land clearing, grading, and other ground-disturbing activities that could temporarily increase soil erosion rates during and shortly after project construction. Construction-related erosion could result in the loss of a substantial amount of nonrenewable topsoil and could adversely affect water quality in nearby surface waters. When left uncontrolled, storm water runoff can erode soil and cause sedimentation in waterways, which collectively result in the destruction of fish, wildlife, and aquatic life habitats; a loss in aesthetic value; and threats to public health due to contaminated food, drinking water supplies, and recreational waterways. BMPs for erosion and sediment control should be based on minimizing disturbed areas, stabilizing disturbed areas, and protecting slopes and channels in the Plan Area.

As authorized by the federal Clean Water Act, the National Pollutant Discharge Elimination System (NPDES) permit program regulates discharge of pollutants into waters of the United States. It is the responsibility of the State and Regional Water Quality Control Boards to carry out water quality control plans and the issuance of NPDES permits. PMC Chapter 13.28 regulates appropriate source control and site design measures to protect and enhance water quality in the City of Pittsburgh's

watercourses, where construction and application requirements are consistent with the Federal Clean Water Act. To further ensure that construction activities uphold the NPDES Permit Program, the City requires a Stormwater Control Plan for every development project application that meets the most recent version of the Contra Costa Clean Water Program Stormwater Section C.3. The plan must specify and document permanent features and facilities to control pollutants and stormwater flows for the life of the proposed project. In addition to required Stormwater Control Plan, C.3 requires Best Management Practices (BMPs) to reduce erosion as well as Low Impact Development (LID) requirements for harvesting, re-use, infiltration, evapotranspiration, or biotreatment of runoff.

As described above, the Stormwater Control Plan would be reviewed as part of the development process for each phase of development within the proposed Plan Area, and applications for future development must demonstrate consistency with the Contra Costa Stormwater C.3 Guidebook. In addition, PMC Subsection 13.28.090(I) states that the City Engineer or his or her designee may require a Stormwater Pollution Prevention Plan (SWPPP).

The Geotechnical Due Diligence Report provides that construction activities that disturb surficial soils have the potential to increase erosion rates. Surficial soils in the Plan Area consist of man-placed fill soils or man-disturbed native soils and are generally considered poorly compacted. Removal of vegetation and an increase in impervious surfaces have potential for sedimentation and uncontrolled diversions of storm water runoff, causing erosion. This is especially true during and immediately following site grading. Thus, erosion is best addressed by site specific BMPs. The control of erosion and sedimentation on recently graded construction sites require both vegetative and structural measures, including sediment basins and the use of vegetative species. As summarized, recommendations for erosion control after site reconnaissance include site specific BMPs consistent with those in the Contra Costa Stormwater Guidebook, specifically for the creation of detention and retention basins near where the runoff is generated. Furthermore, LID requirements require runoff to be directed to LID facilities designed for the amount of runoff on a project-by-project basis. For further control of stormwater runoff related to construction activities, the proposed project would incorporate site-specific BMPs with guidance from industry standards and the City's grading and erosion control ordinance.

Runoff related to vegetation removal in the Plan Area would be subject to Landscape Design requirements in the proposed Specific Plan Section 4.5 *Landscape Design*, which requires the use of landscaping as a storm water BMP. A geotechnical investigation would be required for future development in the Plan Area. Prior to construction, grading and site plans for all future development would be reviewed for consistency with PMC Title 15 (Buildings and Construction) and Chapter 13.28 PMC (Stormwater Management and Discharge Control) and their associated regulations. These include BMPs, LID designs, and NPDES permit approval and maintenance for operations. Future development would require further site plan specification, per PMC Subsection 13.28.090(F). As such, compliance with regulations and the site-specific recommendations of a stormwater control plan and geotechnical report would result in a **less than significant** impact to soil erosion or loss of topsoil.

Impact 3.5-3: Result in development located on a geologic unit or soil that is unstable, or that would become unstable as a result of the project, and potentially result in on- or off-site landslide, lateral spreading, subsidence, liquefaction or collapse (Less than Significant)

Development permitted under the proposed Specific Plan could result in the exposure of people and structures to conditions that have the potential for adverse effects associated with ground instability or failure. Soils and geologic conditions in the Plan Area have the potential for landslides, lateral spreading, subsidence, liquefaction, or collapse. Each are discussed below:

As described above, development in the Plan Area may be located on unstable soils, which can lead to landslide, lateral spreading, subsidence, liquefaction, or collapse, however the potential is low. The California Building Code Title 24, Part 2, Chapter 18, Section 1803.1.1.2 requires a final design-level geotechnical investigation related to expansive soils and other soil conditions. All future development would be required to prepare a final design-level geotechnical investigation, which would address site-specific structural design, tests and inspections, and soils and foundation standards from a licensed geologist, engineer, or soils engineer. The final design-level geotechnical investigation would also include design-level recommendations to ensure that there are no threats to the health and safety of people or structures, including threats from liquefaction or lateral spreading.

Additionally, per the PMC Title 15 (Buildings and Construction), grading plans, site plans, Stormwater Control Plans and SWPPPs (if required by the City Engineer) would require design-level geotechnical investigations. Policies 4-P-2.5, 4-P-2.6, 4-P-2.8 and 4-P-2.10 of the 2040 General Plan ensures that any hillside development improves safety through slope stabilization and any hillside lands not suitable for development are maintained as open space. Additionally, applicants for future development the Plan Area would be required to submit their own grading, erosion, and sediment control plans prior to obtaining a building permit. The application materials submitted must be prepared by a professional soil investigation firm under the direction of a registered soils engineer and an engineering geologist. In adherence with the described CBC, PMC Title 15 (Buildings and Construction), applicable 2040 General Plan policies, and the recommendations of design-level geotechnical investigations, impacts of future development in the Plan Area associated with ground instability or failure would be **less than significant**, and no mitigation measures are necessary.

Impact 3.5-4: Result in development located on expansive soil, as defined in Table 18-1-B of the Uniform Building Code (1994), creating substantial direct or indirect risks to life or property (Less than Significant)

Expansive soil properties can cause substantial damage to building foundations, piles, pavements, underground utilities, and/or other improvements. Structural damage, such as warping and cracking of improvements, and rupture of underground utility lines, may occur if the expansive potential of soils is not considered during the design and construction of all improvements. As evidenced by site reconnaissance, document review, field explorations, laboratory testing, assessments of the

geotechnical design report, the site is expected to be underlain by predominantly low to high plasticity clays, which have a medium to high expansion potential.

The Public Safety Element of the 2040 General Plan establishes policies that are designed to protect from geologic hazards, including expansive soils. Consistency with the 2040 General Plan policies requires identification of geologic hazards and risk inventory of existing at-risk buildings and infrastructure. As required by the CBSC and various 2040 General Plan policies and actions (Policies 11-P-4.6, 11-P-4.8, and 11-P-4.9 and Action 11-A-4.a), a site-specific geotechnical investigation will identify the potential for damage related to expansive soils and non-uniformly compacted fill and engineered fill. If a risk is identified, design criteria and specification options may include removal of the problematic soils, and replacement, as needed, with properly conditioned and compacted fill material that is designed to withstand the forces exerted during the expected shrink-swell cycles and settlements.

As noted above, the soils within the Plan Area consist of low to high plasticity clays, which contribute to the overall expansion potential of soils. As referenced, the Geotechnical Due Diligence Report (Appendix G) provides that near-surface soils on the site are not anticipated to be suitable for direct support over a significant portion of the lower elevation areas. However, as future development and infrastructure projects facilitated by the proposed Specific Plan are considered by the City, each project will be evaluated on a project-by-project basis with associated design-level geotechnical investigation. In accordance with the PMC Buildings and Construction Code and the CBSC, the grading and site plans are expected to identify areas which would require remedial earthwork to circumvent placement on expansive soils. Compliance with design criteria and recommendations from individual design-level geotechnical investigations would ensure impacts from problematic or potentially expansive soils are minimized. Therefore, this impact is considered **less than significant**, and no mitigation measures are necessary.

Impact 3.5-5: Result in having soils incapable of adequately supporting the use of septic tanks or alternative waste water disposal systems where sewers are not available for the disposal of waste water (Less than Significant)

Sewer services in the Plan Area are provided by the City and the Delta Diablo (District). The City maintains and owns the local sewage collection system that serves the City's municipal users. Wastewater within the City is conveyed to the District's Wastewater Treatment Plant (WWTP). All new wastewater generated from future development projects within the Plan Area would be collected and transmitted to the District's WWTP for treatment. Future development in the Plan Area would not be allowed to install septic tanks or alternative wastewater disposal systems. All wastewater conveyance systems would be evaluated at the project-level during development review for compliance with PMC Titles 13 (Waters and Sewers) and 15 (Buildings and Construction). Therefore, this impact is considered **less than significant**, and no mitigation is required.

Impact 3.5-6: Directly or indirectly destroy a unique paleontological resource or site or unique geologic feature (Less than Significant with Mitigation Incorporated)

Only qualified, trained paleontologists with specific expertise in the type of fossils being evaluated can determine the scientific significance of paleontological resources. Fossils are considered to be significant if one or more of the following criteria apply:

1. The fossils provide information on the evolutionary relationships and developmental trends among organisms, living or extinct;
2. The fossils provide data useful in determining the age(s) of the rock unit or sedimentary stratum, including data important in determining the depositional history of the region and the timing of geologic events therein;
3. The fossils provide data regarding the development of biological communities or interaction between paleobotanical and paleozoological biotas;
4. The fossils demonstrate unusual or spectacular circumstances in the history of life;
5. The fossils are in short supply and/or in danger of being depleted or destroyed by the elements, vandalism, or commercial exploitation, and are not found in other geographic locations.
6. All identifiable vertebrate fossils are considered significant due to the rarity of their preservation.

As so defined, significant paleontological resources are determined to be fossils or assemblages of fossils that are unique, unusual, rare, uncommon, or diagnostically important. Significant fossils can include remains of large to very small aquatic and terrestrial vertebrates or remains of plants and invertebrate animals previously not represented in certain portions of the stratigraphy. Assemblages of fossils that might aid stratigraphic correlation, particularly those offering data for the interpretation of tectonic events, geomorphologic evolution, and paleoclimatology are also critically important.

It is important to note that unlike archeological sites, which are narrowly defined, paleontological sites are defined by the entire extent (both areal and stratigraphic) of an underlying unit or formation. In other words, once a unit is identified as containing vertebrate fossils, or other rare fossils, the entire unit is a paleontological site. As discussed in Section 3.5.1 *Environmental Setting*, the northern portion of the Plan Area with Quaternary older alluvium (Qoa) yielded a fossil fish skull, and as such, a high fossil potential has been assigned to the geologic units underlying the Plan Area. While marine invertebrates are generally common and well documented and would not generally be considered a unique paleontological resource, the underlying geologic unit in the northern portion of the Plan Area (Qoa) has a high potential in producing paleontological resources.

It is possible that undiscovered paleontological resources could be encountered during ground-disturbing activities. Damage to or destruction of a paleontological resource would be considered a potentially significant impact under CEQA. Due to the high potential for paleontological resources to be laid in the highly sensitive geologic units underlying the Plan Area, a potentially significant

impact would occur. However, with implementation of mitigation measures **(MM) 3.5-1** through **MM 3.5-3** below, this impact would be reduced to **less than significant**.

Mitigation Measures

MM 3.5-1: Paleontological Resources Mitigation and Monitoring Plan

At the time of application for site specific development within the Plan Area, the Applicant shall retain a Project Paleontologist to develop a Paleontological Resources Mitigation and Monitoring Plan (PRMMP). The PRMMP shall outline preconstruction coordination, monitoring procedures, emergency discovery procedures, sampling and data recovery, museum storage coordination with an accredited institution or facility for any specimen and data recovered, and final reporting.

MM 3.5-2: Worker's Environmental Awareness Training

Prior to the start of construction, the Project Paleontologist or a qualified paleontological monitor shall provide all construction personnel involved with earthmoving activities an environmental awareness training that will provide information on the possibility of encountering fossils during construction, how to identify fossils, and the protocols to follow in the case of any fossil discoveries including proper notification procedures.

MM 3.5-3: Paleontological Monitoring

Prior to construction, the Project Paleontologist shall review excavation plans to determine where paleontologically sensitive stratigraphic units will be disturbed by Project-related earth movement. Earthmoving construction activities will be monitored by a qualified paleontological monitor in those areas and/or where disturbance will take place to previously undisturbed sediment. Monitoring will not take place in areas where the ground has been previously disturbed, in areas underlain by artificial fill, or in areas where exposed sediment will be buried but not disturbed. Monitoring procedures will include measures to suspend monitoring should construction activities be restricted to previously disturbed fill and to adjust monitoring protocols based on updated evaluations of sensitivity subsequent to initial excavations.

Significance Determination

Implementation of **MM 3.5-1** through **MM 3.5-3** by all future development projects within the Plan Area would ensure steps would be taken to reduce impacts to paleontological resources in the event that they are discovered during construction and will be limited to areas where the ground has not been previously disturbed. Workers would be trained on environmental awareness on the possibility of encountering fossils during construction and the protocols to follow if fossils are discovered. The required PMMRP would include procedures for stopping work in the event potential resources are found. To the extent that any unique paleontological resources that might be found cannot be preserved in place, they will be made available for study by experts at the University of California

Museum of Paleontology, in which any information contributing to ongoing advances in the field of paleontology will be made. These mitigation measures would reduce this impact to a **less than significant** level.

This section of the Program Environmental Impact Report (PEIR) discusses greenhouse gas (GHG) emissions, climate change, and energy impacts that could result from future implementation of the Pittsburgh Technology Park Specific Plan (Specific Plan; project) within the City of Pittsburgh (City). This section provides a background discussion of GHGs and climate change linkages and effects of global climate change. This section also provides background discussion on energy use in Pittsburgh. This section is organized with an existing setting, regulatory setting, approach/methodology, and impact analysis.

The analysis and discussion of the GHG, climate change, and energy impacts in this section focuses on the proposed Specific Plan's consistency with local, regional, statewide, and federal climate change and energy conservation planning efforts. Disclosures of the estimated energy usage and GHG emissions due to implementation of the proposed Specific Plan are provided.

This analysis is based on the buildout of future development within the Plan Area, as modeled generally using the California Emissions Estimator Model (CalEEMod) and vehicle trip generation provided in the Transportation Impact Analysis prepared for the proposed project. The operational GHG emissions modeling results are included in Appendix D.

The primary sources of data referenced for this section are derived from the following:

- Pittsburgh Technology Park Air Quality Emissions Calculations (Ramboll, 2024; Appendix D).
- Pittsburgh Technology Park Specific Plan Transportation Impact Assessment (Fehr and Peers, April 2024; Appendix K).
- Bay Area Air Quality Management District, 2022. CEQA Air Quality Guidelines. April.
- Bay Area Air Quality Management District. 2022a. Justification Report: CEQA Thresholds for Evaluating the Significance of Climate Impacts From Land Use Projects and Plans. April.
- Pittsburgh 2040 General Plan Draft Environmental Impact Report. December 2023.

3.6.1 ENVIRONMENTAL SETTING

GREENHOUSE GASES AND CLIMATE CHANGE LINKAGES

Various gases in the Earth's atmosphere, classified as atmospheric GHGs, play a critical role in determining the Earth's surface temperature. Solar radiation enters Earth's atmosphere from space, and a portion of the radiation is absorbed by the Earth's surface. The Earth emits this radiation back toward space, but the properties of the radiation change from high-frequency solar radiation to lower-frequency infrared radiation.

Naturally occurring GHG include water vapor, carbon dioxide (CO₂), methane (CH₄), nitrous oxide (N₂O), and ozone. Several classes of halogenated substances that contain fluorine, chlorine, or bromine are also GHGs, but they are, for the most part, solely a product of industrial activities. Although the direct GHGs CO₂, CH₄, and N₂O occur naturally in the atmosphere, human activities have changed their atmospheric concentrations. From the pre-industrial era (i.e., ending about 1750) to 2022, concentrations of these three GHGs have increased globally by 49.5, 173.1, and 24.3 percent, respectively (USEPA 2024b).

3.6 GREENHOUSE GASES, CLIMATE CHANGE, AND ENERGY

GHGs, which are transparent to solar radiation, are effective in absorbing infrared radiation. As a result, this radiation that otherwise would have escaped back into space is now retained, resulting in a warming of the atmosphere. This phenomenon is known as the greenhouse effect. Among the prominent GHGs contributing to the greenhouse effect are CO₂, CH₄, ozone, water vapor, N₂O, and chlorofluorocarbons (CFCs).

Emissions of GHGs contributing to global climate change are attributable in large part to human activities associated with the industrial/manufacturing, utility, transportation, residential, and agricultural sectors. In California, the transportation sector is the largest emitter of GHGs, followed by the industrial and electricity generation sectors (California Air Resources Board, 2023).

As the name implies, global climate change is a global problem. GHGs are global pollutants, unlike criteria air pollutants and toxic air contaminants, which are pollutants of regional and local concern, respectively. California produced 381 million gross metric tons of carbon dioxide equivalents (MMTCO₂e) in 2021 (California Air Resources Board, 2023).

CO₂ equivalents are a measurement used to account for the fact that different GHGs have different potential to retain infrared radiation in the atmosphere and contribute to the greenhouse effect. This potential, known as the global warming potential of a GHG, is also dependent on the lifetime, or persistence, of the gas molecule in the atmosphere. Expressing GHG emissions in CO₂ equivalents takes the contribution of all GHG emissions to the greenhouse effect and converts them to a single unit equivalent to the effect that would occur if only CO₂ were being emitted.

Consumption of fossil fuels in the transportation sector was the single largest source of California's GHG emissions in 2021, accounting for 38 percent of total GHG emissions in the state. This category was followed by the industrial sector (19 percent), the electricity generation sector (including both in-state and out-of-state sources) (16 percent), the agriculture and forestry sector (eight percent), the residential energy consumption sector (6.5 percent), and the commercial energy consumption sector (3.7 percent) (California Air Resources Board, 2023).

EFFECTS OF GLOBAL CLIMATE CHANGE

The effects of increasing global temperature are far-reaching and extremely difficult to quantify. The scientific community continues to study the effects of global climate change. In general, increases in the ambient global temperature as a result of increased GHGs are anticipated to result in rising sea levels, which could threaten coastal areas through accelerated coastal erosion, threats to levees and inland water systems and disruption to coastal wetlands and habitat.

If the temperature of the ocean warms, it is anticipated that the winter snow season would be shortened. Snowpack in the Sierra Nevada provides both water supply (runoff) and storage (within the snowpack before melting), which is a major source of supply for the state. The snowpack portion of the supply could potentially decline by 50 percent to 75 percent by the end of the 21st century (National Resources Defense Council [NRDC] 2014). This phenomenon could lead to significant challenges in securing an adequate water supply for a growing state population. Further, the increased ocean temperature could result in increased moisture flux into the state; however, since this would likely increasingly come in the form of rain rather than snow in the high elevations,

increased precipitation could lead to increased potential and severity of flood events, placing more pressure on California's levee/flood control system.

Sea level has risen approximately seven inches during the last century, and it is predicted to rise an additional 22 to 35 inches by 2100, depending on the future GHG emissions levels (California Environmental Protection Agency 2010). If this occurs, resultant effects could include increased coastal flooding, saltwater intrusion, and disruption of wetlands. As the existing climate throughout California changes over time, mass migration of species, or failure of species to migrate in time to adapt to the perturbations in climate, could also result. According to the Indicators of Climate Change in California report (OEHHA 2022), the impacts of global warming in California are anticipated to include, but are not limited to, the following:

PUBLIC HEALTH

Higher temperatures are expected to increase the frequency, duration, and intensity of conditions conducive to air pollution formation. For example, days with weather conducive to ozone formation are projected to increase from 25 percent to 35 percent under the lower warming range and to 75 percent to 85 percent under the medium warming range. In addition, if global background ozone levels increase as predicted in some scenarios, it may become impossible to meet local air quality standards. Air quality could be further compromised by increases in wildfires, which emit fine particulate matter that can travel long distances depending on wind conditions. The Climate Scenarios report indicates that large wildfires could become up to 55 percent more frequent if GHG emissions are not significantly reduced.

In addition, under the higher warming scenario, there could be up to 100 more days per year with temperatures above 90 degrees Fahrenheit in Los Angeles and 95 degrees Fahrenheit in Sacramento by 2100. This is a large increase over historical patterns and approximately twice the increase projected if temperatures remain within or below the lower warming range. Rising temperatures will increase the risk of death from dehydration, heat stroke/exhaustion, heart attack, stroke, and respiratory distress caused by extreme heat.

WATER RESOURCES

A vast network of man-made reservoirs and aqueducts capture and transport water throughout the state from northern California rivers and the Colorado River. The current distribution system relies on Sierra Nevada snow pack to supply water during the dry spring and summer months. Rising temperatures, potentially compounded by decreases in precipitation, could severely reduce spring snow pack, increasing the risk of summer water shortages.

State's water supplies are also at risk from rising sea levels. An influx of saltwater would degrade California's estuaries, wetlands, and groundwater aquifers. Saltwater intrusion caused by rising sea levels is a major threat to the quality and reliability of water within the southern edge of the Sacramento/San Joaquin River Delta, a major fresh water supply in the State. Global warming is also projected to seriously affect agricultural areas, with California farmers projected to lose as much as 25 percent of the water supply they need; decrease the potential for hydropower production within the state (although the effects on hydropower are uncertain); and seriously harm winter tourism. Under the lower warming range, the snow dependent winter recreational season at lower elevations

could be reduced by as much as one month. If temperatures reach the higher warming range and precipitation declines, there might be many years with insufficient snow for skiing, snowboarding, and other snow dependent recreational activities.

If GHG emissions continue unabated, more precipitation will fall as rain instead of snow, and the snow that does fall will melt earlier, reducing the Sierra Nevada spring snow pack by as much as 70 percent to 90 percent. Under the lower warming scenario, snow pack losses are expected to be only half as large as those expected if temperatures were to rise to the higher warming range. How much snow pack will be lost depends in part on future precipitation patterns, the projections for which remain uncertain. However, even under the wetter climate projections, the loss of snow pack would pose challenges to water managers, hamper hydropower generation, and nearly eliminate all skiing and other snow-related recreational activities.

AGRICULTURE

Increased GHG emissions are expected to cause widespread changes to the agriculture industry reducing the quantity and quality of agricultural products statewide. Although higher carbon dioxide levels can stimulate plant production and increase plant water-use efficiency, California's farmers will face greater water demand for crops and a less reliable water supply as temperatures rise.

Plant growth tends to be slow at low temperatures, increasing with rising temperatures up to a threshold. However, faster growth can result in less-than-optimal development for many crops, so rising temperatures are likely to worsen the quantity and quality of yield for a number of California's agricultural products. Products likely to be most affected include wine grapes, fruits, and nuts.

Crop growth and development will be affected, as will the intensity and frequency of pest and disease outbreaks. Rising temperatures will likely aggravate ozone pollution, which makes plants more susceptible to disease and pests and interferes with plant growth.

In addition, continued climate change will likely shift the ranges of existing invasive plants and weeds and alter competition patterns with native plants. Range expansion is expected in many species while range contractions are less likely in rapidly evolving species with significant populations already established. Should range contractions occur, it is likely that new or different weed species will fill the emerging gaps. Continued global warming is also likely to alter the abundance and types of many pests, lengthen pests' breeding season, and increase pathogen growth rates.

FORESTS AND LANDSCAPES

Climate change is expected to alter the distribution and character of natural vegetation, thereby resulting in a possible increased risk of major wildfires. However, since wildfire risk is determined by a combination of factors, including precipitation, winds, temperature, landscape, and vegetation conditions, future risks will not be uniform throughout the state. For example, if precipitation increases as temperatures rise, wildfires in southern California are expected to increase by approximately 30 percent toward the end of the century. In contrast, precipitation decreases could increase wildfires in northern California by up to 90 percent.

Moreover, continued global warming will alter natural ecosystems and biological diversity within the state. For example, alpine and sub-alpine ecosystems are expected to decline by as much as 60 percent to 80 percent by the end of the century, as a result of increasing temperatures. The productivity of the state's forests is also expected to decrease, as a result of global warming.

RISING SEA LEVELS

Rising sea levels, more intense coastal storms, and warmer water temperatures will increasingly threaten the State's coastal regions. Under the higher warming scenario, sea level is anticipated to rise 22 to 35 inches by 2100. Elevations of this magnitude would inundate coastal areas with saltwater, accelerate coastal erosion, threaten vital levees and inland water systems, and disrupt wetlands and natural habitats. The San Francisco Bay is vulnerable to a range of natural hazards, including storms, extreme high tides, and rising sea levels resulting from climate change.

Rising seas put new areas at risk of flooding and increase the likelihood and intensity of floods in areas that are already at risk. California's Sea Level Rise Guidance Document (2018) projects a "likely" (66 percent probability) increase in sea level at the San Francisco tide gauge of 10 inches by 2040. By the end of the century, sea levels are likely to rise by 2.4 feet under a low emissions scenario and 3.4 feet under a high emissions scenario. Flooding will be more severe when combined with storm events.

EXISTING GREENHOUSE GAS EMISSIONS IN PITTSBURG

Community Operations GHG Emissions Inventories

The City of Pittsburg developed community and municipal operations GHG inventories for baseline year 2005. In 2019, the City developed an updated community and municipal operations baseline year 2005 GHG inventories and prepared community and municipal operations year 2016 GHG inventories (City of Pittsburg 2019). The 2005 inventories were updated to reflect methodologies and sectors that are consistent with the 2016 inventories.

2016 PITTSBURG COMMUNITY GHG EMISSIONS

The 2016 updated community GHG inventory addresses the same sectors as the 2005 inventory. The 2016 inventory utilizes data from the City and CCSD for waste and water usage; Pacific Gas and Electric Company (PG&E) for energy usage; Metropolitan Transportation Commission (MTC) and California Air Resource Board (CARB) for on-road transportation, CARB for off-road vehicles and equipment, the City and port lessees for marine transit, Bay Area Rapid Transport (BART) for passenger rail transit, and the City and CalRecycle for solid waste. Data analysis methodology for the GHG inventory follows the standards of the U.S. Community Protocol for Accounting and Reporting of GHG Emissions.

As shown in Table 3.6-1, the baseline community GHG inventory for 2016 totaled 428,563 metric tons (MT) of CO₂e. Energy consumption resulted in the largest share of GHG emissions in 2016, accounting for 48 percent of total emissions. On-road transportation accounted for approximately 36 percent of emissions and off-road vehicles and equipment accounted for 11 percent of emissions. The remaining emissions were a result of solid waste, water treatment, conveyance and wastewater

3.6 GREENHOUSE GASES, CLIMATE CHANGE, AND ENERGY

processing, rail and marine transit, which each accounted for approximately 5.5 percent of total emissions.

TABLE 3.6-1: CITY OF PITTSBURG UPDATED COMMUNITY GHG EMISSIONS - 2016

SECTOR	EMISSIONS (MT CO ₂ E/YEAR)	PERCENT OF TOTAL EMISSIONS
ENERGY		
Electricity use in residential and non-residential buildings	30,442	7.1%
Natural gas use in residential and non-residential buildings	173,020	40.4%
Electricity transmission and distribution losses	2,636	0.6%
ON-ROAD TRANSPORTATION		
On-road transportation	152,535	35.6%
WASTE		
Decomposition of solid waste sent to landfills	20,269	4.8%
WATER AND WASTEWATER		
Electricity used to treat, transport, and pump water	1,917	0.4%
Wastewater collection and treatment	526	0.1%
OFF-ROAD VEHICLES AND EQUIPMENT		
Recreational vehicles, landscaping, construction, material handling and agricultural equipment	46,240	10.8%
RAIL TRANSPORT		
BART passenger rail	163	<0.1%
MARINE TRANSPORT		
Port transport and goods movement	814	0.2%
Total	428,563	100%

¹OFF-ROAD VEHICLES AND EQUIPMENT ENCOMPASS THOSE INCLUDED IN CARB'S ORION DATABASE. IN ADDITION TO THE ABOVE, THIS IS ALSO COMPOSED OF COMMERCIAL AND RECREATION MARINE VESSELS, STREET SWEEPING VEHICLES, PUMPS, GENERATORS, AIR COMPRESSORS, HYDROPOWER UNITS, AND WATERCRAFT.

MT CO₂E/YEAR = METRIC TONS OF CARBON DIOXIDE EQUIVALENTS PER YEAR

SOURCE: CITY OF PITTSBURG GREENHOUSE GAS INVENTORIES UPDATED 2005 AND 2016

ENERGY CONSUMPTION

Energy in California is consumed from a wide variety of sources. Fossil fuels (including gasoline and diesel fuel, natural gas, and energy used to generate electricity) are the most widely used form of energy in the state. However, renewable sources of energy (such as solar and wind) are growing in proportion to California's overall energy mix. A large driver of renewable sources of energy in California is the state's current Renewable Portfolio Standard (RPS), which requires the state to derive at least 60 percent of electricity generated from renewable resources by 2030 and to achieve zero-carbon emissions by 2045 (as passed in September 2018, under AB 100).

Overall, in 2019, California was the second-largest total energy consumer among U.S. states, but its per capita energy consumption was less than in all other states except Rhode Island, due in part to its mild climate and its energy efficiency programs (U.S. EIA 2022). Many state regulations since the 1970s, including new building energy efficiency standards, vehicle fleet efficiency measures, as well as growing public awareness, have helped to keep per capita energy usage in the state in check.

The consumption of non-renewable energy (i.e., fossil fuels) associated with the operation of passenger, public transit, and commercial vehicles, results in GHG emissions that contribute to global climate change. Alternative fuels such as natural gas, ethanol, and electricity (unless derived from solar, wind, nuclear, or other energy sources that do not produce carbon emissions) also result in GHG emissions and contribute to global climate change.

Electricity Consumption

California relies on a regional power system composed of a diverse mix of natural gas, renewable, hydroelectric, and nuclear generation resources. In 2020, California received approximately 30 percent of its electricity supply from outside the state. In 2020, wind energy and hydropower facilities each supplied about one-fifth of California's imported electricity. Other, unspecified sources supplied nearly one-fifth of imports. Nuclear energy and natural gas each accounted for more than one-tenth, and coal fueled less than one-tenth. Other renewable resources accounted for most of the rest. Although coal-fired power plants supplied approximately nine percent of imports, coal's total contribution to the state's electricity supply from imports and in-state generation in 2020 was less than three percent (U.S. EIA, 2022). Renewable resources, including hydropower and small-scale (less than 1-megawatt), customer-sited solar photovoltaic (PV) systems, supplied nearly half of California's total in-state electricity generation despite a decline in hydroelectric generation caused by drought. Natural gas-fired power plants provided more than two-fifths of the state's total net generation and about half of California's utility-scale generation. Nuclear power's share of in-state generation was less than one-tenth, down from nearly one-fifth in 2011 (U.S. EIA, 2022).

California's renewable portfolio standard (RPS), enacted in 2002, and revised several times since then, required that 33 percent of electricity retail sales in California come from eligible renewable resources by 2020. The state met that goal three years before the target date. The RPS also requires that 60 percent of electricity retail sales come from renewables by 2030, and 100 percent by 2045. By 2020, qualifying renewables generated an estimated 36 percent of the State's electricity retail sales (U.S. EIA, 2022). According to the California Energy Commission (CEC), total statewide electricity consumption was 272,576 gigawatt-hours (GWh) in 2020, down two percent from 2019. In 2020, electricity consumption in Contra Costa County was 8,622 GWh (CEC 2021). Residents of the City use PG&E as their electricity provider.

Natural Gas/Propane

California's natural gas production is less than one-tenth of the state's total end-use sector consumption. In 2020, about 34 percent of the natural gas delivered to California consumers went to the state's industrial sector, and about 30 percent went to the electric power sector, where it fuels about half of the state's utility-scale electricity generation. The residential sector, where two-thirds of California households use natural gas for home heating, accounted for 23 percent of natural gas use, and the commercial sector used about 12 percent. The transportation sector uses compressed natural gas vehicle fuel, and it consumed the remaining one percent (U.S. EIA, 2022). PG&E is the largest publicly-owned utility in California and provides natural gas for residential, industrial, and agency consumers within the Contra Costa County area and the City. In 2020, natural

gas consumption in Contra Costa County was 1,061 million therms (California Energy Commission, 2021).

3.6.2 REGULATORY SETTING

FEDERAL

U.S. Environmental Protection Agency Endangerment Finding

On April 2, 2007, in the case of *Massachusetts et al. vs. the USEPA et al.* (549 U.S. 497), the U.S. Supreme Court found that GHGs are air pollutants covered by the FCAA (42 USC Sections 7401-7671q). The USEPA Administrator finds that the current and projected concentrations of the six key well-mixed GHGs (carbon dioxide, methane, nitrous oxide, hydrofluorocarbons, perfluorocarbons, and sulfur hexafluoride) in the atmosphere threaten the public health and welfare of current and future generations. Additionally, the USEPA Administrator finds that the combined emissions of these well-mixed GHGs from new motor vehicles and new motor vehicle engines contribute to the GHG pollution, which threatens public health and welfare.

These findings do not themselves impose any requirements on industry or other entities. However, this action was a prerequisite for implementing GHG emission standards for vehicles. In collaboration with the National Highway Traffic Safety Administration (NHTSA) and CARB, the USEPA developed emission standards for light-duty vehicles (2012-2025 model years), and heavy-duty vehicles (2014-2027 model years).

Energy Policy and Conservation Act

The Energy Policy and Conservation Act of 1975 sought to ensure that all vehicles sold in the U.S. would meet certain fuel economy goals. Through the Energy Policy and Conservation Act, Congress established the first fuel economy standards for on-road motor vehicles in the U.S. Pursuant to the Energy Policy and Conservation Act, the NHTSA, which is part of the U.S. Department of Transportation (USDOT), is responsible for establishing additional vehicle standards and for revising existing standards.

Since 1990, the fuel economy standard for new passenger cars has been 27.5 mpg. Since 1996, the fuel economy standard for new light trucks (gross vehicle weight of 8,500 pounds or less) has been 20.7 mpg. Heavy-duty vehicles (i.e., vehicles and trucks over 8,500 pounds gross vehicle weight) are not currently subject to fuel economy standards. Compliance with federal fuel economy standards is determined on the basis of each manufacturer's average fuel economy for the portion of its vehicles produced for sale in the U.S. The Corporate Average Fuel Economy (CAFE) program, which is administered by the USEPA, was created to determine vehicle manufacturers' compliance with the fuel economy standards. The USEPA calculates a CAFE value for each manufacturer based on city and highway fuel economy test results and vehicle sales. Based on the information generated under the CAFE program, the USDOT is authorized to assess penalties for noncompliance. In March 2022, the NHTSA finalized CAFE standards for model years 2024 to 2026. The standards require an industry-wide fleet average of approximately 49 miles per gallon for passenger cars and light trucks

by model year 2026. The NHTSA projects that the foregoing standards will avoid the consumption of approximately 234 billion gallons of gasoline between model years 2030 to 2050 (NHTSA 2022).

Energy Policy Act of 1992 (EPAAct)

The Energy Policy Act of 1992 (EPAAct) was passed to reduce the country's dependence on foreign petroleum and improve air quality. EPAAct includes several parts intended to build an inventory of alternative fuel vehicles (AFVs) in large, centrally fueled fleets in metropolitan areas. EPAAct requires certain federal, state, and local government and private fleets to purchase a percentage of light duty AFVs capable of running on alternative fuels each year. In addition, financial incentives are included in EPAAct. Federal tax deductions will be allowed for businesses and individuals to cover the incremental cost of AFVs. States are also required by the act to consider a variety of incentive programs to help promote AFVs.

Energy Policy Act of 2005

The Energy Policy Act of 2005 was signed into law on August 8, 2005. Generally, the Energy Policy Act provides for renewed and expanded tax credits for electricity generated by qualified energy sources, such as landfill gas; provides bond financing, tax incentives, grants, and loan guarantees for a clean renewable energy and rural community electrification; and establishes a federal purchase requirement for renewable energy.

Energy Independence and Security Act of 2007

The Energy Independence and Security Act, among key measures, requires the following, which would aid in the reduction of national GHG emissions:

- Increase the supply of alternative fuel sources by setting a mandatory Renewable Fuel Standard (RFS) requiring fuel producers to use at least 36 billion gallons of biofuel in 2022.
- Set a target of 35 miles per gallon for the combined fleet of cars and light trucks by model year 2020 and direct the National Highway Traffic Safety Administration (NHTSA) to establish a fuel economy program for medium- and heavy-duty trucks and create a separate fuel economy standard for work trucks.
- Prescribe or revise standards affecting regional efficiency for heating and cooling products and procedures for new or amended standards, energy conservation, energy efficiency labeling for consumer electronic products, residential boiler efficiency, electric motor efficiency, and home appliances.

Federal Climate Change Policy

According to the USEPA, "the United States government has established a comprehensive policy to address climate change" that includes slowing the growth of emissions; strengthening science, technology, and institutions; and enhancing international cooperation. To implement this policy, "the Federal government is using voluntary and incentive-based programs to reduce emissions and has established programs to promote climate technology and science." The USEPA administers multiple programs that encourage voluntary GHG reductions, including "ENERGY STAR", "Climate

Leaders”, and Methane Voluntary Programs. However, as of this writing, there are no adopted federal plans, policies, regulations, or laws directly regulating GHG emissions.

Mandatory Greenhouse Gas Reporting Rule

In 2009, USEPA issued a final rule for mandatory reporting of GHGs from large GHG emissions sources in the U.S. In general, this national reporting requirement will provide USEPA with accurate and timely GHG emissions data from facilities that emit 25,000 metric tons or more of CO₂ per year. This publicly available data will allow the reporters to track their own emissions, compare them to similar facilities, and aid in identifying cost effective opportunities to reduce emissions in the future. Reporting is at the facility level, except that certain suppliers of fossil fuels and industrial GHGs along with vehicle and engine manufacturers will report at the corporate level. An estimated 85 percent of the total U.S. GHG emissions, from approximately 10,000 facilities, are covered by this final rule.

STATE

The California Legislature has enacted a series of statutes in recent years addressing the need to reduce GHG emissions all across the state. These statutes can be categorized into four broad categories: (i) statutes setting numerical statewide targets for GHG reductions, and authorizing CARB to enact regulations to achieve such targets; (ii) statutes setting separate targets for increasing the use of renewable energy for the generation of electricity throughout the state; (iii) statutes addressing the carbon intensity of vehicle fuels, which prompted the adoption of regulations by CARB; and (iv) statutes intended to facilitate land use planning consistent with statewide climate objectives. The discussion below will address each of these key sets of statutes, as well as CARB “Scoping Plans” intended to achieve GHG reductions under the first set of statutes and recent building code requirements intended to reduce energy consumption.

Statutes Setting Statewide GHG Reduction Targets

ASSEMBLY BILL 32 (GLOBAL WARMING SOLUTIONS ACT OF 2006)

In 2006, the California State Legislature enacted the California Global Warming Solutions Act of 2006 (Health & Safety Code Section 38500 et seq.), also known as Assembly Bill (AB) 32 (Stats. 2006, ch. 488). AB 32 establishes regulatory, reporting, and market mechanisms to achieve quantifiable reductions in GHG emissions and a cap on statewide GHG emissions. AB 32 requires that statewide GHG emissions be reduced to 1990 levels by 2020. This reduction will be accomplished through an enforceable statewide cap on GHG emissions that was phased in starting in 2012. To effectively implement the cap, AB 32 directs CARB to develop and implement regulations to reduce statewide GHG emissions from stationary sources.

SENATE BILL 32

Senate Bill (SB) 32 (Stats. 2016, ch. 249) added Section 38566 to the Health and Safety Code. It provides that “[i]n adopting rules and regulations to achieve the maximum technologically feasible and cost-effective greenhouse gas emissions reductions authorized by [Division 25.5 of the Health and Safety Code], [CARB] shall ensure that statewide greenhouse gas emissions are reduced to at least 40 percent below the statewide greenhouse gas emissions limit no later than December 31,

2030.” In other words, SB 32 requires California, by 2030, to reduce its statewide GHG emissions so that they are 40 percent below those that occurred in 1990.

Between AB 32 (2006) and SB 32 (2016), the California Legislature has codified some of the GHG reduction targets included within Executive Orders issued by the last two Governors. The 2020 statewide GHG reduction target in AB 32 was consistent with the second of three statewide emissions reduction targets set forth in former Governor Arnold Schwarzenegger’s 2005 Executive Order, known as S-3-05, which is expressly mentioned in AB 32. (See Health & Safety Code Section 38501, subd. (i).) Executive Order S-3-05 included the following GHG emission reduction targets: by 2010, reduce GHG emissions to 2000 levels; by 2020, reduce GHG emissions to 1990 levels; by 2050, reduce GHG emissions to 80 percent below 1990 levels. To meet the targets, the Governor directed several state agencies to cooperate in the development of a climate action plan. The Secretary of Cal-EPA leads the Climate Action Team, whose goal is to implement global warming emission reduction programs identified in the Climate Action Plan and to report on the progress made toward meeting the emission reduction targets established in Executive Order S-3-05.

EXECUTIVE ORDER, B-30-15

In 2015, Governor Gerald Brown issued Executive Order, B-30-15, which created a “new interim statewide GHG emission reduction target to reduce GHG emissions to 40 percent below 1990 levels by 2030 is established in order to ensure California meets its target of reducing GHG emissions to 80 percent below 1990 levels by 2050.” SB 32 codified this target.

EXECUTIVE ORDER B-55-18

In 2018, the Governor Brown issued Executive Order B-55-18, which established a statewide goal to “achieve carbon neutrality as soon as possible, and no later than 2045, and maintain and achieve negative emissions thereafter.” The order directs CARB to work with other State agencies to identify and recommend measures to achieve those goals.

The California Legislature has not yet set a 2045 or 2050 target in the manner done for 2020 and 2030 through AB 32 and SB 32, though references to a 2050 target can be found in statutes outside the Health and Safety Code. SB 350 (Stats. 2015, ch. 547) added to the Public Utilities Code language that essentially puts into statute the 2050 GHG reduction target already identified in Executive Order S-3-05, albeit in the limited context of new state policies (i) increasing the overall share of electricity that must be produced through renewable energy sources and (ii) directing certain state agencies to begin planning for the widespread electrification of the California vehicle fleet. Section 740.12(a)(1)(D) of the Public Utilities Code now states that “[t]he Legislature finds and declares [that] ... [r]educing emissions of [GHGs] to 40 percent below 1990 levels by 2030 and to 80 percent below 1990 levels by 2050 will require widespread transportation electrification.” Furthermore, Section 740.12(b) now states that the California Public Utilities Commission (PUC), in consultation with CARB and the CEC, must “direct electrical corporations to file applications for programs and investments to accelerate widespread transportation electrification to reduce dependence on petroleum, meet air quality standards, ... and reduce emissions of greenhouse gases to 40 percent below 1990 levels by 2030 and to 80 percent below 1990 levels by 2050.”

California Integrated Energy Policy (Senate Bill 1389)

Senate Bill (SB) 1389 requires the California Energy Commission (CEC) to report on the planning and forecasting of energy demand. This includes the CEC to "conduct assessments and forecasts of all aspects of energy industry supply, production, transportation, delivery and distribution, demand, and prices. The Energy Commission shall use these assessments and forecasts to develop energy policies that conserve resources, protect the environment, ensure energy reliability, enhance the state's economy, and protect public health and safety." The CEC adopts an Integrated Energy Policy Report every two years and an update every other year. The most recent version is the 2022 Integrated Energy Policy Report Update.

Statute Setting Target for the Use of Renewable Energy for the Generation of Electricity

CALIFORNIA RENEWABLES PORTFOLIO STANDARD

In 2002, the Legislature enacted SB 1078 (Stats. 2002, ch. 516), which established the Renewables Portfolio Standard program, requiring retail sellers of electricity, including electrical corporations, community choice aggregators, and electric service providers, to purchase a specified minimum percentage of electricity generated by eligible renewable energy resources such as wind, solar, geothermal, small hydroelectric, biomass, anaerobic digestion, and landfill gas. (See Pub. Utilities Code, Section 399.11 et seq. [subsequently amended].) The legislation set a target by which 20 percent of the State's electricity would be generated by renewable sources. (Pub. Utility Code, Section 399.11, subd. (a) [subsequently amended].) As described in the Legislative Counsel's Digest, SB 1078 required "[e]ach electrical corporation ... to increase its total procurement of eligible renewable energy resources by at least one percent per year so that 20 percent of its retail sales are procured from eligible renewable energy resources. If an electrical corporation fails to procure sufficient eligible renewable energy resources in a given year to meet an annual target, the electrical corporation would be required to procure additional eligible renewable resources in subsequent years to compensate for the shortfall, if funds are made available as described. An electrical corporation with at least 20 percent of retail sales procured from eligible renewable energy resources in any year would not be required to increase its procurement in the following year."

In 2006, the California Legislature enacted SB 107 (Stats. 2006, ch. 464), which modified the Renewables Portfolio Standard to require that at least 20 percent of electricity retail sales be served by renewable energy resources by year 2010. (Pub. Utility Code, Section 399.11, subd (a) [subsequently amended].)

SB X1-2 (Stats. 2011, 1st Ex. Sess., ch. 1) set even more aggressive statutory targets for renewable electricity, culminating in the requirement that 33 percent of the state's electricity come from renewables by 2020. This legislation applies to all electricity retailers in the state, including publicly owned utilities, investor-owned utilities, electricity service providers, and community choice aggregators. All of these entities must meet renewable energy goals of 20 percent of retail sales from renewables by the end of 2013, 25 percent by the end of 2016, and 33 percent by the end of 2020. (See Pub. Utility Code, Section 399.11 et seq. [subsequently amended].)

SB 350, discussed above, increases the Renewable Portfolio Standard to require 50 percent of electricity generated to be from renewables by 2030. (Pub. Utility Code, Section 399.11, subd (a); see also Section 399.30, subd. (c)(2).) Of equal significance, SB 350 also embodies a policy encouraging a substantial increase in the use of electric vehicles. As noted earlier, Section 740.12(b) of the Public Utilities Code now states that the PUC, in consultation with CARB and the CEC, must “direct electrical corporations to file applications for programs and investments to accelerate widespread transportation electrification to reduce dependence on petroleum, meet air quality standards, ... and reduce emissions of greenhouse gases to 40 percent below 1990 levels by 2030 and to 80 percent below 1990 levels by 2050.”

Executive Order B-16-12, issued in 2012, embodied a similar vision of a future in which zero-emission vehicles (ZEV) will play a big part in helping the state meet its GHG reduction targets. Executive Order B-16-12 directed the state government to accelerate the market for ZEVs in California through fleet replacement and electric vehicle infrastructure. Executive Order B-16-12 set the following targets:

- By 2015, all major cities in California will have adequate infrastructure and be “ZEV ready”;
- By 2020, the State will have established adequate infrastructure to support one million ZEVs in California;
- By 2025, there will be 1.5 million ZEVs on the road in California; and
- By 2050, virtually all personal transportation in the State will be based on ZEVs, and GHG emissions from the transportation sector will be reduced by 80 percent below 1990 levels.

In 2018, SB 100 (Stats. 2018, ch. 312) revised the above-described deadlines and targets so that the state will have to achieve a 50 percent renewable resources target by December 31, 2026 (instead of by 2030) and achieve a 60 percent target by December 31, 2030. The legislation also establishes a state policy that eligible renewable energy resources and zero-carbon resources supply 100 percent of retail sales of electricity to California end-use customers and 100 percent of electricity procured to serve all state agencies by December 31, 2045.

In summary, California has set a statutory goal of requiring that, by 2030, 60 percent of the electricity generated in California should be from renewable sources, with increased generation capacity sufficient to allow the mass conversion of the statewide vehicle fleet from petroleum-fueled vehicles to electrical vehicles and/or other ZEVs. By 2045, all electricity must come from renewable resources and other carbon-free resources. Former Governor Brown established a goal for the state of achieving carbon neutrality as soon as possible and by no later than 2045. The Legislature is thus looking to California drivers to buy electric cars, powered by green energy, to help the State meet its aggressive statutory goal, created by SB 32, of reducing statewide GHG emissions by 2030 to 40 percent below 1990 levels. Another key prong to this strategy is to make petroleum-based fuels less carbon-intensive. A number of statutes in recent years have addressed that strategy. These are discussed immediately below.

Statutes and CARB Regulations Addressing the Carbon Intensity of Petroleum-based Transportation Fuels

ASSEMBLY BILL 1493, PAVLEY CLEAN CARS STANDARDS

In 2002, the California Legislature enacted Assembly Bill 1493 (“Pavley Bill”) (Stats. 2002, ch. 200), which directed CARB to develop and adopt regulations that achieve the maximum feasible reduction of GHGs emitted by passenger vehicles and light-duty trucks beginning with model year 2009. (See Health and Safety Code Section 43018.5.) In September 2004, pursuant to this directive, CARB approved regulations to reduce GHG emissions from new motor vehicles beginning with the 2009 model year. These regulations created what are commonly known as the “Pavley standards.” In September 2009, CARB adopted amendments to the Pavley standards to reduce GHG emissions from new motor vehicles through the 2016 model year. These regulations created what are commonly known as the “Pavley II standards.” (See California Code of Regulations, Title 13, Sections 1900, 1961, and 1961.1 et seq.)

In 2012, CARB adopted an Advanced Clean Cars (ACC) program aimed at reducing both smog-causing pollutants and GHG emissions for vehicles model years 2017-2025. This historic program, developed in coordination with the USEPA and NHTSA, combined the control of smog-causing (criteria) pollutants and GHG emissions into a single coordinated set of requirements for model years 2015 through 2025. The regulations focus on substantially increasing the number of plug-in hybrid cars and ZEVs in the vehicle fleet and on making fuels such as electricity and hydrogen readily available for these vehicle technologies. The components of the ACC program are the Low-Emission Vehicle regulations that reduce criteria pollutants and GHG emissions from light- and medium-duty vehicles, and the ZEV regulation, which requires manufacturers to produce an increasing number of pure ZEVs (meaning battery electric and fuel cell electric vehicles), with provisions to also produce plug-in hybrid electric vehicles in the 2018 through 2025 model years. (See California Code of Regulations, Title 13, Sections 1900, 1961, 1961.1, 1961.2, 1961.3, 1965, 1968.2, 1968.5, 1976, 1978, 2037, 2038, 2062, 2112, 2139, 2140, 2145, 2147, 2235, and 2317 et seq.)

It is expected that the Pavley regulations will reduce GHG emissions from California passenger vehicles by about 34 percent below 2016 levels by 2025, all while improving fuel efficiency and reducing motorists’ costs.

Cap and Trade Program

In 2011, CARB adopted the final cap-and-trade program for California (See CCR Title 17, Sections 95801-96022.) The California cap-and-trade program creates a market-based system with an overall emissions limit for affected sectors. The program is intended to regulate more than 85 percent of California’s emissions and staggers compliance requirements according to the following schedule: (1) electricity generation and large industrial sources (2012) and (2) fuel combustion and transportation (2015).

According to 2012 CARB guidance, “[t]he Cap-and-Trade Program will reduce GHG emissions from major sources (covered entities) by setting a firm cap on statewide GHG emissions while employing market mechanisms to cost-effectively achieve the emission-reduction goals. The statewide cap for GHG emissions from major sources, which is measured in metric tons of carbon dioxide equivalent

(MTCO₂e), will commence in 2013 and decline over time, achieving GHG emission reductions throughout the program's duration. Each covered entity will be required to surrender one permit to emit (the majority of which will be allowances, entities are also allowed to use a limited number of CARB offset credits) for each ton of GHG emissions they emit. Some covered entities will be allocated some allowances and will be able to buy additional allowances at auction, purchase allowances from others, or purchase offset credits."

The guidance continues to say that "[s]tarting in 2012, major GHG-emitting sources, such as electricity generation (including imports), and large stationary sources (e.g., refineries, cement production facilities, oil and gas production facilities, glass manufacturing facilities, and food processing plants) that emit more than 25,000 MTCO₂e per year will have to comply with the Cap-and-Trade Program. The program expands in 2015 to include fuel distributors (natural gas and propane fuel providers and transportation fuel providers) to address emissions from transportation fuels, and from combustion of other fossil fuels not directly covered at large sources in the program's initial phase." In early April 2017, the Third District Court of Appeal upheld the lawfulness of the cap-and-trade program as a "fee" rather than a "tax." (See *California Chamber of Commerce et al. v. State Air Resources Board et al.* (2017) 10 Cal.App.5th 604.)

AB 398 (Stats. 2017, ch. 135) extended the life of the existing Cap and Trade Program through December 2030.

Low Carbon Fuel Standard

In 2007, Executive Order S-01-07 established the Low Carbon Fuel Standard (LCFS) and directed the Secretary for Environmental Protection to coordinate the actions of the CEC, the California Air Resources Board (CARB), the University of California, and other agencies to develop and propose protocols for measuring the "life-cycle carbon intensity" of transportation fuels. CARB adopted the LCFS on April 23, 2009.

The LCFS was subject to legal challenge in 2011. Ultimately, CARB was required to bring a new LCFS regulation for consideration in February 2015. The proposed LCFS regulation was required to contain revisions to the 2010 LCFS and new provisions designed to foster investments in the production of the low-carbon fuels, offer additional flexibility to regulated parties, update critical technical information, simplify and streamline program operations, and enhance enforcement. The regulation was last amended in 2018. The 2018 amendments strengthen the carbon intensive fuel reduction targets beyond 2020 to support the climate goals established in SB 32. Other major changes to the 2018 amendments include expanding the fuel types and eligible activities to participate in the LCFS. One of the specific regulations added in 2018 is the Carbon Capture and Sequestration Protocol under the Low Carbon Fuel Standard. The Carbon Capture and Sequestration Protocol establishes methodology for quantifying geological CO₂ sequestration, and permanence requirements related to site characteristics, plume extent evaluation, testing and monitoring, well operation, post-injection site care, and more.

Zero Emissions Vehicles

EXECUTIVE ORDER EO N-79-20

In 2020, Governor Gavin Newsome issued Executive Order N-79-20, which sets goals for the State 100 percent of in-state sales of new passenger cars and trucks will be zero-emission by 2035, 100 percent of medium- and heavy-duty vehicles in the State be zero-emission by 2045 for all operations where feasible and by 2035 for drayage trucks, and the State will transition to 100 percent zero-emission off-road vehicles and equipment by 2035 where feasible.

Statute Intended to Facilitate Land Use Planning Consistent with Statewide Climate Objectives

CALIFORNIA SENATE BILL 375 (SUSTAINABLE COMMUNITIES STRATEGY)

SB 375 is 2008 legislation built on the foundation established by AB 32, by setting forth a mechanism for coordinating land use and transportation on a regional level for the purpose of reducing GHGs. The focus is to reduce miles traveled by passenger vehicles and light trucks. CARB is required to set GHG reduction targets for each metropolitan region for 2020 and 2035. Each of California's metropolitan planning organizations then prepares a sustainable communities strategy that demonstrates how the region will meet its GHG reduction target through integrated land use, housing, and transportation planning. Once adopted by the metropolitan planning organizations, the sustainable communities strategy is to be incorporated into that region's federally enforceable regional transportation plan. If a metropolitan planning organization is unable to meet the targets through the sustainable communities strategy, then an alternative planning strategy must be developed which demonstrates how targets could be achieved, even if meeting the targets is deemed to be infeasible.

Climate Change Scoping Plans

AB 32 SCOPING PLAN

On December 11, 2008, CARB adopted its *Climate Change Scoping Plan* (Scoping Plan), which functions as a roadmap of CARB's plans to achieve GHG reductions in California required by AB 32 through subsequently enacted regulations. The Scoping Plan contains the main strategies California will implement to reduce carbon dioxide-equivalent (CO₂e) emissions by 169 million metric tons (MMT), or approximately 30 percent, from the state's projected 2020 emissions level of 596 MMT of CO₂e under a business-as-usual scenario. (This is a reduction of 42 MMT CO₂e, or almost 10 percent, from 2002–2004 average emissions, but requires the reductions in the face of population and economic growth through 2020.) The Scoping Plan also breaks down the amount of GHG emissions reductions CARB recommends for each emissions sector of the state's GHG inventory. The Scoping Plan calls for the largest reductions in GHG emissions to be achieved by implementing the following measures and standards:

- improved emissions standards for light-duty vehicles (estimated reductions of 31.7 MMT CO₂e);
- the Low-Carbon Fuel Standard (15.0 MMT CO₂e);

- energy efficiency measures in buildings and appliances and the widespread development of combined heat and power systems (26.3 MMT CO₂e); and
- a renewable portfolio standard for electricity production (21.3 MMT CO₂e).

CARB updated the Scoping Plan in 2013 (*First Update to the Scoping Plan*) and again in 2017 (the *Final Scoping Plan*). The 2013 Update built upon the initial Scoping Plan with new strategies and recommendations, and also set the groundwork to reach the long-term goals set forth by the state. Successful implementation of existing programs (as identified in previous iterations of the Scoping Plan) has put California on track to meet the 2020 target.

With the passage of SB 32, the California Legislature also passed companion legislation AB 197, which provides additional direction for developing the scoping plan. In response, CARB adopted an updated Scoping Plan in December 2017 (2017 Update). The document reflects the 2030 target of reducing statewide GHG emissions by 40 percent below 1990 levels codified by SB 32. The GHG reduction strategies in the plan that CARB will implement to meet the target include:

- SB 350 - achieve 50 percent Renewables Portfolio Standard (RPS) by 2030 and doubling of energy efficiency savings by 2030;
- Low Carbon Fuel Standard - increased stringency (reducing carbon intensity 18 percent by 2030, up from 10 percent in 2020);
- Mobile Source Strategy (Cleaner Technology and Fuels Scenario) - maintaining existing GHG standards for light- and heavy-duty vehicles, put 4.2 million zero-emission vehicles on the roads, and increase zero-emission buses, delivery and other trucks;
- Sustainable Freight Action Plan - improve freight system efficiency, maximize use of near-zero emission vehicles and equipment powered by renewable energy, and deploy over 100,000 zero-emission trucks and equipment by 2030;
- Short-Lived Climate Pollutant Reduction Strategy - reduce emissions of methane and hydrofluorocarbons 40 percent below 2013 levels by 2030 and reduce emissions of black carbon 50 percent below 2013 levels by 2030;
- SB 375 Sustainable Communities Strategies - increased stringency of 2035 targets;
- Post-2020 Cap-and-Trade Program - declining caps, continued linkage with Québec, and linkage to Ontario, Canada;
- 20 percent reduction in GHG emissions from the refinery sector; and
- By 2018, develop an Integrated Natural and Working Lands Action Plan to secure California's land base as a net carbon sink.

The 2017 Update relies on the preexisting programs paired with an extended, more stringent Cap-and-Trade Program, to deliver climate, air quality, and other benefits. The 2017 Update identifies new technologically and feasible and cost-effective strategies to ensure that California meets its GHG reduction goals.

2022 SCOPING PLAN – CARBON NEUTRALITY

CARB adopted the 2022 version of the Scoping Plan (the Scoping Plan for Achieving Carbon Neutrality) on November 16, 2022. The 2022 Scoping Plan Update assesses progress toward the statutory 2030 target, while laying out a path to achieving carbon neutrality no later than 2045.

The 2022 Scoping Plan for Achieving Carbon Neutrality (2022 Scoping Plan) was approved by the CARB in December 2022 and assesses progress toward achieving the state's GHG reduction goals and establishes a path to achieve carbon neutrality no later than 2045. The 2022 Scoping Plan focuses on outcomes needed to achieve carbon neutrality by assessing paths for advancing transportation technology, clean energy deployment, maintenance and preservation of natural and working lands, and others, and is designed to meet the State's long-term climate objectives. Specifically, the 2022 Scoping Plan identifies carbon negative technologies, including nature-based and mechanical carbon sequestration projects, as an essential component in achieving state-wide carbon neutrality.

Building Code Requirements Intended to Reduce GHG Emissions

CALIFORNIA ENERGY CODE

The California Energy Code (CCR Title 24, Part 6), which is incorporated into the Building Energy Efficiency Standards, was first established in 1978 in response to a legislative mandate to reduce California's energy consumption. Although these standards were not originally intended to reduce GHG emissions, increased energy efficiency results in decreased GHG emissions because energy efficient buildings require less electricity and thus less consumption of fossil fuels, which emit GHGs. The standards are updated periodically to allow consideration and possible incorporation of new energy efficiency technologies and methods.

The most recent Title 24 standards are the 2022 Title 24 standards. Buildings permitted on or after January 1, 2023, must comply with the 2022 Standards. The California Energy Commission updates the standards every three years. The CEC estimates that the 2022 Title 24 standards will reduce 10 million metric tons of GHG over 30 years. When compared to the 2019 Title 24 standards, the 2022 update focuses on: encouraging electric heat pump technology and use; establishing electric-ready requirements when natural gas is installed; expanding solar photovoltaic (PV) system and battery storage standards; and strengthening ventilation standards to improve indoor air quality.

CALIFORNIA GREEN BUILDING STANDARDS CODE

The purpose of the California Green Building Standards Code (CalGreen) (CCR Title 24, Part 11) is to improve public health and safety and to promote the general welfare by enhancing the design and construction of buildings through the use of building concepts having a reduced negative impact or positive environmental impact and encouraging sustainable construction practices in the following categories: 1) planning and design; 2) energy efficiency; 3) water efficiency and conservation; 4) material conservation and resource efficiency; and 5) environmental quality. CalGreen, which became effective on January 1, 2011, instituted mandatory minimum environmental performance

standards for all ground-up new construction of commercial, low-rise residential uses, and State-owned buildings, as well as schools and hospitals. The mandatory standards require the following:

- 20 percent mandatory reduction in indoor water use relative to baseline levels;
- 50 percent construction/demolition waste must be diverted from landfills;
- Mandatory inspections of energy systems to ensure optimal working efficiency; and
- Low-pollutant emitting exterior and interior finish materials such as paints, carpets, vinyl flooring, and particle boards.

The voluntary standards require the following:

- Tier I: 15 percent improvement in energy requirements, stricter water conservation requirements for specific fixtures, 65 percent reduction in construction waste, 10 percent recycled content, 20 percent permeable paving, 20 percent cement reduction, and cool/solar reflective roof.
- Tier II: 30 percent improvement in energy requirements, stricter water conservation requirements for specific fixtures, 75 percent reduction in construction waste, 15 percent recycled content, 30 percent permeable paving, 30 percent cement reduction, and cool/solar reflective roof.

The latest version of CalGreen is the 2022 CalGreen Code, which became effective on January 1, 2023. Between 2010 and 2022, continuous updates and additions have been made to CALGreen, including water conservation and recycling, electric vehicle infrastructure and charging, and changes intended to eliminate conflicts with the California Energy Code, which is Part 6 of Title 24.

LOCAL

Bay Area Air Quality Management District (BAAQMD)

The *2017 Clean Air Plan: Spare the Air, Cool the Climate* (2017 Clean Air Plan) was adopted on April 19, 2019, by BAAQMD in cooperation with the MTC, the San Francisco Bay Conservation and Development Commission, and the Associate of Bay Area Governments (ABAG). The 2017 Clean Air Plan describes a multi-pollutant strategy to simultaneously reduce emissions and ambient concentrations of ozone, fine particulate matter, toxic air contaminants, as well as GHGs that contribute to climate change. The 2017 Clean Air Plan provides a regional strategy to protect public health and protect the climate. To protect the climate, the 2017 Clean Air Plan defines a vision for transitioning the region to a post-carbon economy needed to achieve ambitious GHG reduction targets for 2030 and 2050 and provides a regional climate protection strategy that will put the Bay Area on a pathway to achieve those GHG reduction targets.

The 2017 Clean Air Plan includes a wide range of control measures designed to reduce emissions of methane and other “super-GHGs” that are potent climate pollutants in the near-term; and to decrease emissions of carbon dioxide by reducing fossil fuel combustion.

BAAQMD 2022 CEQA Thresholds for Evaluating the Significance of Climate Impacts from Land Use Projects and Plans

The BAAQMD prepared their *CEQA Thresholds for Evaluating the Significance of Climate Impacts from Land Use Projects and Plans* (Appendix B to their Air Quality Guidelines), in April 2022.

The BAAQMD recommends that cities and counties evaluate such plans based on whether they will be consistent with California's long-term climate goal of achieving carbon neutrality by 2045. To be consistent with this goal, these plans should reduce GHG emissions in the relevant jurisdiction to meet an interim milestone of 40 percent below the 1990 emission levels by 2030, consistent with SB 32, and to support the state's goal of carbon neutrality by 2045. Cities and counties planning to develop in a manner that is not consistent with meeting these GHG reduction targets will have a significant climate impact because they will hinder California's efforts to address climate change. Specifically, in order to demonstrate a less-than-significant impact to climate change under CEQA, the BAAQMD states that General Plans and related planning documents must demonstrate that the plan either: a) meets the State's goal to reduce emissions to 40 percent below 1990 levels by 2030 and carbon neutrality by 2045; or b) is consistent with a local GHG reduction strategy that meets the criteria under State CEQA Guidelines Section 15183.5(b).

Association of Bay Area Governments and Metropolitan Transportation Commission Bay Area Plan

Plan Bay Area 2050 was jointly adopted by MTC and ABAG in October 2021 and is the Regional Transportation Plan/Sustainable Community Strategy (RTP/SCS). The Plan Bay Area is a long-range regional plan for the nine-county San Francisco Bay Area, encompassing housing, economic, transportation, and environmental strategies designed to make the Bay Area more equitable for all residents and more resilient in the face of unexpected challenges.

Plan Bay Area 2050 is composed of 35 integrated strategies across the four elements that provide a blueprint for how the Bay Area can accommodate future growth and make the region more equitable and resilient in the face of unexpected challenges and achieve regional GHG emissions reduction targets established by CARB, pursuant to SB 375.

In summary, Plan Bay Area 2050:

- Details housing and economic strategies ("land use") to invest \$702 billion in expected revenues to accommodate 2.7 million new persons, 1.4 million new households, 1.5 million new forecasted housing units, and 1.4 million new jobs between 2015 and 2050;
- Details transportation strategies to invest \$579 billion in expected revenues from federal, state, regional, and local sources over the next 30 years;
- Details environmental strategies to invest \$102 billion in expected revenues to protect the region from at least two feet of future permanent sea level rise inundation, reduce climate emissions, and maintain and expand the region's parks and open space system; and
- Complies with SB 375, the state's SCS law, which requires integration of land use and transportation planning to reduce per-capita passenger vehicle GHG emissions by 2035 and

provide adequate housing for the region's forecast of 2.7 million new persons and 1.4 million new households.

City of Pittsburg 2040 General Plan

The 2040 General Plan includes the following applicable policies as they relate to GHG reduction efforts.

Resource Conservation & Open Space Element

Policy 10-P-6.1: Support the principles of reducing air pollutants and GHG emissions through comprehensive and sustainable land use, transportation, and energy planning and addressing opportunities to decrease emissions associated with local government operations.

Policy 10-P-6.2: Ensure that new development is consistent with the energy objectives and targets identified by the City's Sustainability Plan.

Policy 10-P-6.3: Encourage transportation modes that minimize toxic air contaminants (TACs) and greenhouse (GHG) gas emissions from motor vehicle use.

Policy 10-P-6.4: Encourage and support infill, mixed use, and higher density development, where appropriate, in order to reduce GHG emissions associated with vehicle travel.

Policy 10-P-6.10: Require and condition all new public and privately constructed buildings to exceed, where feasible, and comply with construction and design standards that promote energy conservation, including the most current "green" development standards in the California Green Building Standards Code.

Policy 10-P-6.11: Require expanded innovative and green building best practices, where feasible, including, but not limited to, LEED certification for all new development and retrofitting existing uses, and encourage public and private projects to exceed the most current "green" development standards in the California Green Building Standards Code.

Policy 10-P-6.13: Implement development standards, mitigation measures, and best practices that require energy conservation and the reduction in GHGs, including:

- Require new development to incorporate energy-efficient features through passive design concepts (e.g., techniques for heating and cooling, building siting orientation, street and lot layout, landscape placement, and protection of solar access);
- Require construction standards which promote energy conservation including window placement, building eaves, and roof overhangs;
- Require all projects to meet or, when feasible, exceed the most current "green" development standards in the California Green Building Standards Code;
- Require projects to implement applicable Sustainability Plan strategies and actions;

- Require developments to include vehicle charging stations that meet or exceed the requirements of State law and to include outdoor electrical outlets. Discourage portable generators or other portable power sources;
- Require best practices in selecting construction methods, building materials, project appliances and equipment, and project design;
- Encourage projects to incorporate enhanced energy conservation measures, electric-only appliances, and other methods of reducing energy usage and GHG emissions; and
- Require large energy users to implement an energy conservation plan, which may include solar or other non-fossil fuel sources to meet the operation's full power demand and 100 percent fleet electrification, as part of the project review and approval process, and develop a program to monitor compliance with and effectiveness of that plan.

Policy 10-P-6.14: Encourage development of green and clean energy infrastructure and maintain land use designations to support and accommodate energy infrastructure projects that assist in meeting the State's goals to reduce carbon in the energy supply and reduce carbon-related emissions.

Sustainability Plan

The Pittsburg Sustainability Plan (Sustainability Plan) is a living document that has been designed to engage, excite, and empower our community to take incremental steps towards a healthier, more sustainable future. This plan will serve as a first step towards reducing GHG emissions in the City and establishes practices the community can implement that are practical and result in real, positive change. As such, the primary focus of this plan is to create a more sustainable, equitable, and healthy Pittsburg, while maintaining a strong economy and reducing emissions to support California's Climate goals.

The plan establishes a framework for the community to work together to create positive change, with sustainability and GHG emission reductions at its core. The Sustainability Plan includes an inventory of GHG emissions (as described above), business as usual forecasts, GHG emissions targets for 2030, 2035, 2040, and 2045, along with GHG emissions reductions strategies and mitigated forecasts.

3.6.3 METHODOLOGY AND THRESHOLDS OF SIGNIFICANCE

CEQA requires the lead agency to evaluate individual and cumulative impacts of development projects, and all feasible mitigation measures must be identified in the EIR to reduce significant GHG and energy impacts.

The BAAQMD CEQA Air Quality Guidelines Appendix B provide guidance on how to evaluate GHG and energy impacts prepared within the SFBAAB pursuant to CEQA. GHG and energy impacts from future buildout of the Plan Area can be divided into construction impacts and operational impacts. Construction impacts are associated with construction activities likely to occur in conjunction with

future development allowed by the Specific Plan. Operational impacts are associated with future operation of developed land uses in the Plan Area, including increased vehicle trips and energy use.

METHODOLOGY

Because the Plan Area does not include a detailed project design at this time (such as a design review request), the Plan Area was analyzed at a program-level. For purposes of this CEQA analysis, emissions were calculated for the total of the three phases of development. Four buildout variations were considered in the GHG emissions modeling in order to generate a conservative estimate of potential future emissions. Details of each of these variations are included in Appendix D.

Construction activities associated with new land uses proposed under the proposed Specific Plan would result in emissions from heavy construction equipment exhaust, vehicle trips associated with workers commuting to and from the site, and trucks hauling materials. GHG emissions generated by the construction of future projects within the Plan Area would vary depending on the type of projects occurring and the size of each project. The exact timing of future development projects that could occur under the proposed Specific Plan is unknown. Therefore, construction related GHG emissions were not quantified for buildout of the Plan Area.

Sources of operational emissions from Phase I are anticipated to include emergency generators and mobile emissions. Emissions from the emergency generators were calculated using emission factors from the U.S. Environmental Protection Agency's (USEPA) AP-42: Compilation of Air Emissions Factors from Stationary Sources (USEPA 2024a). Mobile emissions were calculated with the California Emissions Estimator Model (CalEEMod) version 2022.1. Sources of operational emission from Phase II and Phase III included mobile emissions, which were calculated with CalEEMod.¹

CalEEMod estimates operational activities based on the area of selected land use types. The inputs used for this analysis include building square footage and vehicle trips are summarized in Appendix D. The emissions modeling performed for the proposed Specific Plan included compliance with BAAQMD rules and regulations and well as with the California Building Energy Efficiency Standards Code.

THRESHOLDS OF SIGNIFICANCE

Greenhouse Gas Emissions

Consistent with Appendix G of the CEQA Guidelines, the proposed project would result in a significant impact related to operational GHG emissions if it would:

- Generate GHG emissions, either directly or indirectly, that may have a significant impact on the environment; and/or

¹ CalEEMod assumes a fleet mix derived from CARB's EMFAC model, that's specific to the projected year and region. The vehicle assumptions are diverse and include several truck types, with the top three being LDA (passenger cars), LDT2 (light-duty trucks), MDV (medium-duty trucks).

3.6 GREENHOUSE GASES, CLIMATE CHANGE, AND ENERGY

- Conflict with an applicable plan, policy, or regulation adopted for the purpose of reducing the emissions of GHGs.

BAAQMD THRESHOLDS FOR LAND USE PROJECTS

Because emissions are temporary and variable, the BAAQMD has not developed a quantitative threshold of significance for GHG emissions. BAAQMD encourages quantification and disclosure GHG emissions that would occur during construction and operation.

Construction

There is no proposed construction-related climate impact threshold at this time. GHG emissions from construction represent a very small portion of a project's lifetime GHG emissions.

Operation

As previously detailed in Section 3.6.2, the 2022 BAAQMD adopted thresholds of significance is used in determining whether a proposed project will have a significant impact on climate change.

The BAAQMD recommends that cities and counties rely on a “fair share” analysis to look at how a new land use development project needs to be designed and built to ensure that it will be consistent with California’s goal of carbon neutrality by 2045.

To determine the “fair share,” the analysis should therefore focus on the design elements that need to be incorporated into the proposed project in order to lay the foundation for achieving carbon neutrality by 2045. As GHG emissions from the land use sector come primarily from building energy use and from transportation, these are the areas that need to be evaluated to ensure that the proposed project can and will be carbon neutral. If a land use project being designed and built today incorporates the design elements necessary for the proposed project to be carbon neutral by 2045, then it will contribute its “fair share” to achieving the State’s climate goals. A lead agency can therefore conclude that it will make a less-than-cumulatively-considerable climate impact.

The BAAQMD recommends that lead agencies use the design elements as the threshold of significance for land use projects under the “fair share” approach discussed above. This can either be demonstrated through: 1) the checklist provided within the Guidelines; or 2) demonstrating consistency with a local GHG reduction strategy that meets the criteria under State CEQA Guidelines Section 15183.5(b). (The complete BAAQMD thresholds can are included in Appendix D-1).

Because the City of Pittsburg’s Sustainability Plan does not meet the criteria under CEQA Guidelines Section 15183.5(b), the BAAQMD design features checklist was used for purposes of the GHG emissions analysis under Impact 3.6-1 below.

A. Projects must include, at a minimum, the following project design elements:

1. Buildings

- a. The project will not include natural gas appliances or natural gas plumbing (in both residential and nonresidential development).

- b. The project will not result in any wasteful, inefficient, or unnecessary energy usage as determined by the analysis required under CEQA Section 21100(b)(3) and Section 15126.2(b) of the State CEQA Guidelines.

2. Transportation

- a. Achieve a reduction in project-generated vehicle miles traveled (VMT) below the regional average consistent with the current version of the California Climate Change Scoping Plan (currently 15 percent) or meet a locally adopted Senate Bill 743 VMT target, reflecting the recommendations provided in the Governor's Office of Planning and Research's Technical Advisory on Evaluating Transportation Impacts in CEQA:
 - i. Residential projects: 15 percent below the existing VMT per capita
 - ii. Office projects: 15 percent below the existing VMT per employee
 - iii. Retail projects: no net increase in existing VMT
- b. Achieve compliance with off-street electric vehicle requirements in the most recently adopted version of CALGreen Tier 2.

Energy

Consistent with Appendix G of the CEQA Guidelines, the proposed project would result in a significant impact on energy use if it would:

- Result in potentially significant environmental impact due to wasteful, inefficient, or unnecessary consumption of energy resources, during project construction or operation; or
- Conflict with or obstruct a state or local plan for renewable energy or energy efficiency.

BAAQMD also provides guidance as to the evaluation of energy impacts as described below.

ELECTRICITY

As stated in Appendix B of the BAAQMD Air Quality Guidelines, eliminating GHG emissions associated with building electricity usage will be achieved by decarbonizing California's electrical generation infrastructure. California has committed to achieving this goal by 2045 through SB 100, the 100 Percent Clean Energy Act of 2018. SB 100 strengthened the State's Renewables Portfolio Standard (RPS) by requiring that 60 percent of all electricity provided to retail users in California come from renewable sources by 2030 and that 100 percent come from carbon-free sources by 2045.

Land use projects have an important role to play on the demand side to ensure that SB 100 can feasibly be implemented. Inefficient electricity usage will hinder the shift to renewable power generation by requiring additional carbon-free generating resources to be developed, increasing the cost of shifting to renewables and other carbon-free energy sources, and delaying full implementation longer than necessary. Thus, to the extent that new land use projects have a role

to play in ensuring that SB 100 is successfully implemented, that role is to maximize the efficiency with which they use electricity and to eliminate any wasteful or unnecessary usage. If a new land use project maximizes efficiency and eliminates wasteful and unnecessary usage, then it will implement its “fair share” in this area, consistent with achieving the State’s long-term climate goals. Conversely, if a project is not designed to use electricity in an efficient manner, then it will hinder the successful implementation of SB 100 and the State’s long-term climate goals.

The Air District recommends using the results of this analysis to determine whether the project will implement its “fair share” with respect to supporting the implementation of SB 100. If the energy analysis required under CEQA Section 21100(b)(3) shows that a project will not result in any wasteful, inefficient, or unnecessary electrical usage, then it will be consistent with implementing SB 100 and will not make a cumulatively considerable climate impact with respect to building electrical usage. If the project is found to involve wasteful, inefficient, or unnecessary electrical usage, then the lead agency should conclude that it will make a cumulatively considerable impact and treat it as significant in this regard.

NATURAL GAS

Regarding natural gas usage, new land use development projects must be built without any natural gas infrastructure in order to be consistent with achieving the 2045 carbon neutrality goal. There is no practical way to eliminate the GHG emissions that are generated by burning natural gas, so the land use sector will need to fully eliminate natural gas usage in buildings in order to achieve the goal of carbon neutrality.

TRANSPORTATION

Decarbonization of the transportation infrastructure serving land use development will come from shifting the motor vehicle fleet to EVs, coupled with a shift to carbon-free electricity to power those vehicles. Land use projects cannot directly control whether and how fast these shifts are implemented, but they can and do have an important indirect influence on California’s transition to a zero-carbon transportation system. New land use development can influence transportation-related emissions in two areas related to how it is designed and built. First, new land use projects need to provide sufficient EV charging infrastructure to serve the needs of project users who will be driving EVs. Second, new land use projects can influence transportation related GHG emissions by reducing the amount of VMT associated with the project. Projects need to include the following design elements:

- EV Charging Infrastructure: Tier 2 CALGreen standards to evaluate whether new land use development projects will provide their “fair share” of EV charging infrastructure. A new land use development project will need to implement the more aggressive Tier 2 CALGreen standard for its impact to be less than significant in this area.
- VTM Reductions: New land use projects will need to be built with reduced levels of VMT per capita in order to implement their “fair share” of what it will take to eliminate GHG emissions from the transportation sector. A 15-percent reduction in per capita VMT as an appropriate threshold of significance for evaluating transportation impacts, as this level of

VMT addresses transportation and corresponds to what would be needed to attain the State's 2050 climate target.

3.6.4 IMPACTS AND MITIGATION MEASURES

Impact 3.6-1: Generate greenhouse gas emissions that could have a significant impact on the environment and could conflict with an applicable plan, policy, or regulation adopted for the purpose of reducing the emissions of greenhouse gases (Less than Significant)

Global climate change is an adverse effect from cumulative GHG emissions. No single land use project could generate sufficient GHG emissions on its own to noticeably change the global average temperature. The combination of GHG emissions from past, present, and future projects in Pittsburg, the entire state of California, and across the nation and around the world, contribute cumulatively to the phenomenon of global climate change and its associated environmental impacts. Therefore, the analysis of GHG emissions are presented in terms of the proposed project's cumulatively considerable impacts related to GHGs.

Future development associated with buildout of the Plan Area would contribute to increases of GHG emissions that are associated with global climate change. Estimated GHG emissions attributable to future development would be primarily associated with increases of CO₂ and other GHG pollutants, such as CH₄ and N₂O, from mobile sources (project VMT) and utility usage.

Buildout of the Plan Area would include activities that emit GHG emissions over the short- and long-term. Below is a discussion regarding future development's potential short- and long-term emission impacts.

SHORT-TERM EMISSIONS (CONSTRUCTION)

Short-term GHG emissions would occur as a result of construction equipment use. Construction equipment would be used for activities such as demolition, grading, paving, and other building construction activities associated with future development projects within the Plan Area. GHG emissions would also result from worker and vendor trips to and from the Plan Area and from demolition and soil hauling trips. Construction activities are short-term and cease to emit GHGs upon completion, unlike operational emissions that are continuous year after year until operation of the use ceases.

Implementation of the proposed Specific Plan does not directly approve or otherwise entitle any new development projects or infrastructure improvement projects in the Plan Area. As such, construction-related GHG emissions of future projects cannot be known or quantified at this time. Typically, construction-related GHG emissions contribute unsubsantially (less than one percent) to a project's annual GHG emissions inventory, and mitigation for construction-related emissions is not effective in reducing a project's overall contribution to climate change, given the incrementally small proportion of total construction emissions. Short-term climate change impacts due to future

3.6 GREENHOUSE GASES, CLIMATE CHANGE, AND ENERGY

construction-related activities would be subject to state requirements related to the reduction of GHG emissions and would be assessed on project-by-project basis.

LONG-TERM EMISSIONS (OPERATIONAL)

Buildout of the Plan Area has been evaluated at a program-level, as detailed project designs have not yet been prepared. Because the environmental analysis included in this PEIR is intended to provide an evaluation of a conservative buildout scenario, actual project emissions may be less than what has been estimated. The proposed Specific Plan's daily unmitigated operational emissions have been estimated using CalEEMod and AP-42 emission factors. To develop a conservative estimate of emissions, the variation of each phase with the greatest modeled emissions were added together to determine the anticipated operational emissions from full buildout of the Plan Area, as summarized in Table 3.6-2. All CalEEMod modeling results are included in Appendix D to this PEIR.

Operational GHG emissions would be generated from both mobile and stationary sources within the Plan Area. Day-to-day activities such as future employee commute trips to and from the Plan Area would make up the majority of the mobile emissions. Stationary source emissions would occur from area sources such as natural gas combustion from heating mechanisms and landscape maintenance equipment exhaust.

Mobile sources would result primarily in emissions of CO₂, with minor emissions of CH₄ and N₂O. The most significant GHG emission from natural gas usage would be CH₄. Electricity usage by future development and indirect usage of electricity for water and wastewater conveyance would result primarily in emissions of CO₂. Disposal of solid waste would result in emissions of CH₄ from the decomposition of waste at landfills coupled with CO₂ emission from the handling and transport of solid waste. These sources are combined to define the long-term GHG inventory for typical development projects.

Diesel truck exhaust is a significant source of GHG emissions. The GHG emissions analysis prepared for this PEIR estimates mobile emissions from employee vehicle trips and truck trips are based on a fleet mix derived from CARB's EMFAC model, that's specific to the projected year and region. The vehicle assumptions are diverse and include several truck types, with the top three being LDA (passenger cars), LDT2 (light-duty trucks), MDV (medium-duty trucks).

Table 3.6-2 below presents the estimated operational GHG emissions from a conservative buildout scenario of the Plan Area. The emissions analysis assumed under Phase I would begin operation in 2027 and Phases II and III would begin operation in 2040. Phase I emissions of 84,979 MTCO₂e per year would occur for the period 2027 to 2039, and full buildout worst case emissions of 90,768 MTCO₂e per year would occur in 2040 and beyond. These analysis years are within the time horizon specified in the Sustainability Plan and through 2030 and 2045.

TABLE 3.6-2: OPERATIONAL GHG EMISSIONS BY PHASE AND VARIATION

<i>PHASE</i>		<i>GHG EMISSIONS (MTCO₂E/YR)</i>
Phase I	Data Center	84,979 ^a
Phase II – Variation A	Research & Development	2,804
Phase III – Variation A	Research & Development	2,985
Full Buildout Total		90,768

^a PHASE I EMISSIONS DETERMINED BY ADDING PHASE I EMISSIONS EXCLUDING EMERGENCY GENERATORS TO EMISSIONS FROM EMERGENCY GENERATORS

As previously described, a conservative buildout assumption was analyzed; however, not every potential buildout scenario falls within these assumptions. Should future development include a vehicle mix that includes a greater amount of traffic than analyzed in this PEIR, for example, warehousing and logistics uses, additional GHG emissions would occur.

Operational emissions from future development of the Plan Area would be considered less than significant if the proposed project is consistent with the BAAQMD thresholds. An analysis of the proposed project's consistency with these thresholds is included in Table 3.6-3 below.

TABLE 3.6-3: BAAQMD DESIGN FEATURES CONFORMANCE

<i>BAAQMD THRESHOLD</i>	<i>PROJECT CONSISTENCY</i>
BUILDINGS	
a. The project will not include natural gas appliances or natural gas plumbing (in both residential and nonresidential development)	Consistent. Future development projects within the Plan Area would not include natural gas appliances or natural gas plumbing.
b. The project will not result in any wasteful, inefficient, or unnecessary energy usage as determined by the analysis required under CEQA Section 21100(b)(3) and Section 15126.2(b) of the State CEQA Guidelines.	Consistent. As described in further detail in the sections below, future development projects would not result in any wasteful, inefficient, or unnecessary energy usage.
TRANSPORTATION	
a. Achieve a reduction in project-generated vehicle miles traveled (VMT) below the regional average consistent with the current version of the California Climate Change Scoping Plan (currently 15 percent) or meet a locally adopted Senate Bill 743 VMT target, reflecting the recommendations provided in the Governor's Office of Planning and Research's Technical Advisory on Evaluating Transportation Impacts in CEQA: ii. Office projects: 15 percent below the existing VMT per employee	Consistent. As discussed in Section 3.13, Transportation and Circulation, of this PEIR, implementation of the proposed project would exceed the VMT threshold, which would result in a potentially significant impact. However, MM 3.13-1 would be implemented, which requires future development projects to prepare and implement Travel Demand Management (TDM) plans. The implementation of a robust TDM program with enforcement and monitoring is expected to result in a decrease VMT per employee to a degree sufficient to bring it below the threshold (less than 85% than the countywide average).

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<i>BAAQMD THRESHOLD</i>	<i>PROJECT CONSISTENCY</i>
b. Achieve compliance with off-street electric vehicle requirements in the most recently adopted version of CALGreen Tier 2.	Consistent. The proposed Specific Plan outlines guidelines for future development projects to implement California Green Building Standards Code “CalGreen” for Electric Vehicle parking standards and Tier 2 CalGreen standards for EV Charging Infrastructure

Because buildout of the Plan Area would be consistent with the requirements for operational emissions in BAAQMD’s GHG thresholds for land use projects, the proposed project would not generate GHG emissions, either directly or indirectly, that may have a significant impact on the environment.

City of Pittsburg 2040 General Plan and Sustainability Plan Conformance

The 2040 General Plan and the City’s Sustainability Plan identify goals and policies aimed to reduce the City’s contribution to GHG emissions. For the proposed project, implementation of policies that either increase energy efficiency or reduce energy use would effectively reduce indirect GHG emissions. The consistency of the proposed project with applicable policies is provided in the table below.

<i>POLICY</i>	<i>PROJECT CONSISTENCY</i>
<i>SUSTAINABILITY PLAN</i>	
Action T.1.1d: Work with existing commercial and institutional property owners to identify additional opportunities to install safe bicycle lockers and parking spaces to encourage residents and visitors to make short trips via active transportation.	CONSISTENT Future Travel Demand Management (TDM) Plans shall be prepared and implemented for future development, per Transportation and Circulation Mitigation Measure (MM) 3.13-1 . TDM plans shall identify trip reduction strategies and the mechanisms for funding and monitoring of such programs and strategies. In addition, bike facilities would be required and determined based on a ratio to the number of parking required.
Action T.1.2e: Through the adoption of an Overlay or Specific Plan, encourage employers to develop a Transportation Demand Management (TDM) Plan. Design a baseline TDM Plan for large employers (i.e., businesses with more than 25 employees) to adopt or model their TDM’s after. TDM plans should include money-based incentives for employees to bike, walk, carpool, or take the bus to work.	CONSISTENT Future Travel Demand Management (TDM) Plans shall be prepared and implemented for future development, per Transportation and Circulation MM 3.13-1 . TDM plans shall identify trip reduction strategies and the mechanisms for funding and monitoring of such programs and strategies.
Action W.1.1b: Continue to implement and enforce Model Water Efficient Landscape Ordinance to encourage use of efficient irrigation systems, greywater usage, onsite storm water capture, and limit the portion of landscapes that can be covered in turf.	CONSISTENT The use of recycled water for future development would be encouraged and considered at the project-level. Furthermore, the proposed Specific Plan outlines guidelines for using drought-tolerant plants.
Action W-1.3b: Continue compliance with the City’s National Pollutant Discharge Elimination System	CONSISTENT Stormwater runoff would be evaluated at the project-level in association with

POLICY	PROJECT CONSISTENCY
(NPDES) permit to require new developments to convey runoff to engineered bioretention basins or vegetative features.	subsequent development projects. Future development projects would be subject to compliance review with building code standards of the City of Pittsburg Municipal Code (PMC), the San Francisco Bay RWQCB's Municipal Regional Stormwater NPDES Permit, and other applicable regulations. Furthermore, each future development and infrastructure project within the Plan Area would be required to prepare a detailed project-specific drainage plan, Water Quality Management Plan, and a Storm Water Pollution Prevention Plan (SWPPP) that will control storm water runoff and erosion, both during and after construction.
2040 GENERAL PLAN	
Policy 7-P-1.5: Implement and continue to increase efforts to reduce regional vehicle miles traveled (VMT) by supporting land use patterns and site designs that promote active modes of transportation, and public transit.	CONSISTENT Future development within the Plan Area would adhere to CalGreen code, which includes standards for bike and pedestrian facilities. Furthermore, Transportation and Circulation MM 3.13-1 would require future development to create and implement a Travel Demand Management Plan (TDM Plan) to encourage a reduction in regional VMT. See Section 3.13, <i>Transportation and Circulation</i> , of this PEIR for more detail.
Action 7-A-2.m: Encourage major employers to establish designated carpool parking areas, designated electric vehicle (EV) / Clean Air Vehicle (CAV) parking, and secure on-site bicycle facilities.	CONSISTENT Future development accommodated by the proposed Specific Plan would be required to comply with the current California Building Code at the time of application, including the "CalGreen" code for electric vehicle parking standards. In addition, bike facilities would be required and determined based on a ratio to the number of parking required.
Policy 10-P-6.2: Ensure that new development is consistent with the energy objectives and targets identified by the City's Sustainability Plan.	CONSISTENT Future development would adhere to the objectives and targets identified by the City's Sustainability Plan, as described above.
Policy 10-P-6.3: Encourage transportation modes that minimize toxic air contaminants (TACs) and greenhouse (GHG) gas emissions from motor vehicle use.	CONSISTENT: TDM Plans that promote alternatives to single occupancy vehicle trips would be required for future development, as described further in Section 3.13, <i>Transportation and Circulation</i> , of this PEIR.
Policy 10-P-6.4: Encourage and support infill, mixed use, and higher density development, where appropriate, in order to reduce GHG emissions associated with vehicle travel.	CONSISTENT The proposed Specific Plan proposes employment generating uses on an infill site in close proximity to housing and transit.
Policy 10-P-6.8: Reduce the number of motor vehicle trips and emissions accounted to Pittsburg residents and encourage land use and	CONSISTENT: TDM Plans that promote alternatives to single occupancy vehicle trips would be required for future development, as described further in

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POLICY	PROJECT CONSISTENCY
transportation strategies that promote use of alternatives to the automobile for transportation, including bicycling, bus transit, and carpooling.	Section 3.13, <i>Transportation and Circulation</i> , of this PEIR.
Policy 10-P-6.10: Require and condition all new public and privately constructed buildings to exceed, where feasible, and comply with construction and design standards that promote energy conservation, including the most current "green" development standards in the California Green Building Standards Code.	CONSISTENT Future development accommodated by the proposed Specific Plan would be required to comply with the current California Building Code at the time of application, including the "CalGreen" code for electric energy conservation.
Policy 10-P-6.11: Require expanded innovative and green building best practices, where feasible, including, but not limited to, LEED certification for all new development and retrofitting existing uses, and encourage public and private projects to exceed the most current "green" development standards in the California Green Building Standards Code.	CONSISTENT Future development accommodated by the proposed Specific Plan would be required to comply with the current California Building Code at the time of application, including the "CalGreen" code for electric energy conservation.
Policy 10-P-6.13: Implement development standards, mitigation measures, and best practices that require energy conservation and the reduction in greenhouse gases, including: - Require new development to incorporate energy-efficient features through passive design concepts (e.g., techniques for heating and cooling, building siting orientation, street and lot layout, landscape placement, and protection of solar access); - Require construction standards which promote energy conservation including window placement, building eaves, and roof overhangs; - Require all projects to meet or, when feasible, exceed the most current "green" development standards in the California Green Building Standards Code; - Require projects to implement applicable Sustainability Plan strategies and actions; - Encourage projects to incorporate enhanced energy conservation measures, electric-only appliances, and other methods of reducing energy usage and greenhouse gas emissions; and - Require large energy users to implement an energy conservation plan, which may include solar or other non-fossil fuel sources to meet the operation's full power demand and 100% fleet electrification, as part of the project	CONSISTENT Future development accommodated by the proposed Specific Plan would be required to comply with the following requirements as part of the design review process. - Incorporate energy-efficient features through design concepts, including but not limited to, techniques for heating and cooling, building siting orientation, street and lot layout, landscape placement, and protection of solar access. - Incorporate construction standards that promote energy conservation, including but not limited to, window placement, building eaves, and roof overhangs. - Incorporate enhanced energy conservation measures and other methods of reducing energy usage and GHG emissions. - Large energy-consuming development projects would be required to develop and implement an energy conservation plan to meet the operation's full power demand. The energy conservation plan would be required to also include a monitoring program to ensure compliance with and effectiveness of that plan. Furthermore, future development accommodated by the proposed Specific Plan would be required to comply with the current California Building Code at the time of application, including the "CalGreen" code for electric energy conservation. Future

<i>POLICY</i>	<i>PROJECT CONSISTENCY</i>
review and approval process, and develop a program to monitor compliance with and effectiveness of that plan.	projects would also be required to comply with the Sustainability Plan as described above.

CARB 2022 Scoping Plan

The CARB Scoping Plan outlines the State’s plan for achieving the emissions reductions necessary to meet the 2030 GHG emission target set by SB 32. As described above, the proposed project would be consistent with BAAQMD’s updated GHG thresholds for operational emissions which are intended to ensure projects do not interfere with the State’s ability to achieve the 2030 GHG emissions target. Therefore, it is anticipated that future development projects within the Plan Area would be consistent with the CARB Scoping Plan.

The proposed project is consistent with the BAAQMD “fair share” design requirements; the City’s 2040 General Plan and Sustainability Plan. The proposed project, therefore, would not generate GHG emissions, either directly or indirectly, that may have a significant impact on the environment, nor would it conflict with an applicable plan, policy or regulation adopted for the purpose of reducing GHG emissions. Therefore, impacts would **be less than significant** and no mitigation is required.

Impact 3.6-2: Result in a significant impact due to wasteful, inefficient, or unnecessary consumption of energy resources, or conflict with or obstruct a state or local plan for renewable energy or energy efficiency (Less than Significant)

The CEQA Guidelines require consideration of the potentially significant energy implications of a project. CEQA requires mitigation measures to reduce “wasteful, inefficient and unnecessary” energy usage (PRC Section 21100, subdivision [b][3]). According to Appendix G of the CEQA Guidelines, the means to achieve the goal of conserving energy include decreasing overall energy consumption, decreasing reliance on natural gas and oil, and increasing reliance on renewable energy sources. In particular, a project would be considered “wasteful, inefficient, and unnecessary” if it were to violate state and federal energy standards and/or result in significant adverse impacts related to project energy requirements, energy inefficiencies, energy intensiveness of materials, cause significant impacts on local and regional energy supplies or generate requirements for additional capacity, fail to comply with existing energy standards, otherwise result in significant adverse impacts on energy resources, or conflict or create an inconsistency with applicable plan, policy, or regulation.

Appendix B of the BAAQMD Air Quality Guidelines provides further guidance for the assessment of energy impacts, as described above in Section 3.6.3.

CONSTRUCTION IMPACTS

Energy use during construction of future development projects within the Plan Area would vary during different phases of construction, where the majority of construction equipment during demolition and grading would be gasoline-powered or diesel-powered, and the later construction

phases would be electricity-powered, such as interior construction and architectural coatings. Overall, the use of electricity would be temporary in nature and would fluctuate according to the phase of construction.

Transportation energy use depends on the type and number of trips, VMT, fuel efficiency of vehicles, and travel mode. Transportation energy used during construction would come from the transport and use of construction equipment, delivery vehicles and haul trucks, and construction employee vehicles that would use diesel fuel and/or gasoline. It is anticipated that the majority of off-road construction equipment, such as those used during demolition and grading activities, would be gasoline-powered or diesel-powered. To limit wasteful and unnecessary energy consumption, the construction contractors shall minimize non-essential idling of construction equipment during construction in accordance with Section 2449 of the CCR, Title 13, Article 4.8, Chapter 9.

Because implementation of the proposed Specific Plan does not directly approve or otherwise entitle any new development projects or infrastructure projects in the Plan Area, construction-related energy consumption from future projects cannot be known or quantified at this time. However, it is expected that construction of future development projects or infrastructure projects within the Plan Area would create temporary increased demands for energy and vehicle fuels compared to existing conditions and would result in short-term energy use.

OPERATIONAL IMPACTS

Future development accommodated by the proposed Specific Plan could include employment generating uses including, office, industrial, and other land uses (see Section 2.0, *Project Description*, for further detail). The amount of energy used in the Plan Area at buildout would directly correlate to the type and size of development, the energy consumption associated with unit appliances, outdoor lighting, and energy use associated with other buildings and activities. Other major sources of Plan Area energy consumption include fuel used by vehicle trips generated during construction and operational activities, and fuel used by off-road and on-road construction vehicles during construction. The following discussion provides a breakdown of the energy uses for future development within the Plan Area.

ELECTRICITY AND NATURAL GAS

The proposed electricity consumption for buildout of the Plan Area was estimated based on the GHG emissions modeling analysis. Assuming all building energy use, including the adjacent substation, is from electricity, the electricity consumption in megawatt-hours (MWh) was derived by applying the PG&E carbon intensity of 203.983 pounds CO₂ per MWh, as shown in Table 3.6-4.

Electrical service to the proposed project would be provided by PG&E through connections to existing offsite electrical lines and new on-site infrastructure. As shown in Table 3.6-4, using a conservative scenario to represent full buildout, future development within the proposed Specific Plan would have an annual electricity demand of 901,016 MWh/year. While development of the Plan Area would increase energy demand compared to existing conditions, future development or infrastructure projects would be required to comply with the applicable Building Energy Efficiency Standards and the CALGreen Code. As required under the BAAQMD thresholds, the proposed Specific Plan also would preclude any new natural gas connections within the Plan Area. Because

development under the proposed Specific Plan would be consistent with the requirements of these energy-related regulations – including CALGreen, it would not result in wasteful or unnecessary electricity demands.

TABLE 3.6-4: OPERATIONAL GHG EMISSIONS BY PHASE AND VARIATION

<i>PHASE</i>	<i>GHG EMISSIONS FROM BUILDING ENERGY (MTCO₂E/YR)</i>	<i>ELECTRICITY USE (MWH/YR)</i>
Phase 1	80,770	872,937
Phase 2	1,258	13,596
Phase 3	1,340	14,482
Full Buildout Total	83,368	901,016

The analysis above assumes all building energy needs are served by electricity. Therefore, buildout of the Plan Area would assist the State in its goal of carbon neutrality, and impacts would be less than significant.

TRANSPORTATION ENERGY

Implementation of the proposed Specific Plan would consume transportation energy during operations from the use of motor vehicles. Because the efficiency of the motor vehicles in use, such as the average miles per gallon for motor vehicles involved with buildout of the Plan Area are unknown, estimates of transportation energy use is assessed based on the mobile source GHG emissions estimates, using a conversion factor of 8.78 kg CO₂ per gallon of gasoline.

TABLE 3.6-5: OPERATIONAL GHG EMISSIONS BY PHASE AND VARIATION

<i>PHASE</i>	<i>GHG EMISSIONS FROM MOBILE SOURCES (MTCO₂E/YR)</i>	<i>GASOLINE USE (GALLON/YR)</i>
Phase 1	321	36,560
Phase 2	1,208	137,585
Phase 3	1,286	146,469
Full Buildout Total	2,815	320,615

As shown in Table 3.6-5, implementation of the proposed Specific Plan is estimated to result in the consumption of approximately 320,615 gallons of gasoline per year. Implementation of the proposed Specific Plan facilitates employment generating uses and would result in an increased daily home based VMT per worker (13.1) when compared to countywide total (12.9). Consistent with the City's Transportation Impact Analysis Guidelines, this increase will be mitigated by requiring future development projects to develop robust TDM plans with enforcement and monitoring, as described in Transportation and Circulation **MM 3.13-1** (see Section 3.13, *Transportation and Circulation*). This reduction would lower the expected daily home-work VMT per employee to a degree sufficient to bring it below the significance threshold of less than 85 percent than the countywide average.

Implementation of the proposed Specific Plan would also generate on-road vehicle trips during construction activities (from construction workers, vendors, and haulers). The vast majority of on-road mobile vehicle fuel used during the construction activities during buildout of the Plan Area

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would occur during building construction. Off-road construction vehicles would use diesel fuel during construction activities. A non-exhaustive list of off-road constructive vehicles expected to be used during construction activities includes cranes, forklifts, generator sets, tractors, excavators, and dozers. As discussed in Section 3.2, *Air Quality*, future development projects would implement measures to minimize the idling of construction equipment.

The proposed Specific Plan would require future development projects to install EV charging infrastructure in conformance with Tier 2 of CALGreen code.

Overall, it is expected that future buildout of the Plan Area would not result in an inefficient, wasteful, or unnecessary construction- and operation-related fuel energy usage. Through compliance with CalGreen Tier 2 requirements relative to EV infrastructure and VMT reductions to 15 percent below the regional average through application of TDMs, energy impacts associated with transportation would be less than significant.

Conclusion

Buildout of the Plan Area would use energy resources for the operation of buildings and for construction activities. Developers of individual projects within the Plan Area would be responsible for conserving energy, to the extent feasible, and would rely heavily on reducing per capita energy consumption to achieve this goal, including through statewide and local measures and requirements. For example, developers would be required to comply with the latest CalGreen requirements, in effect at the time. CalGreen requires developers to implement stringent requirements for insulation, renewable energy, water efficiency and conservation, construction waste reduction, indoor and outdoor air quality, material conservation and resource efficiency, and efficiency of building maintenance and operation. In addition, the proposed Specific Plan would require future development to adhere to CalGreen Tier 2 requirements relative to EV infrastructure.

Future development projects under the proposed Specific Plan would be required to comply with all applicable federal, state, and local regulations regulating energy usage. For example, PG&E is responsible for the mix of energy resources used to provide electricity for their customers and are in the process of implementing the RPS to increase the proportion of renewable energy (e.g. solar and wind) within their respective energy portfolios. PG&E is expected to achieve at least 60 percent renewables by 2030 and 100 percent zero-carbon electricity by 2045. Therefore, future development projects would not obstruct PG&E from implementing its current plans to achieve the State's goals pursuant to SB 100.

Other statewide measures, including those intended to improve the energy efficiency of the statewide passenger and heavy-duty truck vehicle fleet (e.g., the Pavley Bill and the Low Carbon Fuel Standard), would improve vehicle fuel economies, thereby conserving gasoline and diesel fuel. These energy savings would continue to accrue over time. Additionally, through application of TDMs, VMT would be 15 percent below the regional average.

Additionally, future development within the Plan Area would be required to adhere to Chapter 8.10 (Construction and Demolition Debris Recycling) PMC. The regulations require applicants to recycle or reuse construction and demolition (C&D) debris which consists of materials generated during

construction, renovation, and demolition projects in order to meet CalRecycle requirements for recycling utilizing the California Green Building Standards Code (CalGreen). . By recycling or diverting at least 50 percent of materials generated for discards by the proposed project in order to reduce the amount of demolition and construction waste going to the landfill. Diversion of solid waste saves energy by reusing and recycling materials for other uses instead of landfilling materials and using additional non-renewable resources.

As described under Impact 3.6-1 above, the proposed Specific Plan is consistent with the applicable goals, policies, and actions of the 2040 General Plan and Sustainability Plan related to energy conservation and renewable energy. Specifically, Policy 10-P-6.13 of the 2040 General Plan requires the City to implement development standards, mitigation measures, and best practices that require energy conservation and the reduction in GHGs including those listed below. All future development projects would be required to submit detailed design plans to the City for design review and to demonstrate consistency with these requirements.

- Require new development to incorporate energy-efficient features through passive design concepts (e.g., techniques for heating and cooling, building siting orientation, street and lot layout, landscape placement, and protection of solar access);
- Require construction standards which promote energy conservation including window placement, building eaves, and roof overhangs;
- Require all projects to meet or, when feasible, exceed the most current "green" development standards in the California Green Building Standards Code;
- Require projects to implement applicable Sustainability Plan strategies and actions;
- Require developments to include vehicle charging stations that meet or exceed the requirements of State law and to include outdoor electrical outlets. Discourage portable generators or other portable power sources;
- Require best practices in selecting construction methods, building materials, project appliances and equipment, and project design;
- Encourage projects to incorporate enhanced energy conservation measures, electric-only appliances, and other methods of reducing energy usage and GHG emissions; and
- Require large energy users to implement an energy conservation plan, which may include solar or other non-fossil fuel sources to meet the operation's full power demand and 100 percent fleet electrification, as part of the project review and approval process, and develop a program to monitor compliance with and effectiveness of that plan.

For the reasons described above, buildout of the Plan Area would not be expected to cause an inefficient, wasteful, or unnecessary use of energy resources nor conflict with or obstruct a State or local plan for renewable energy or energy efficiency. Therefore, impacts related to energy are **less than significant**, and no mitigation is required.

References

Association of Bay Area Governments, Metropolitan Transportation Commission, 2021. Draft Plan Bay Area Environmental Impact Report. State Clearinghouse No. 2020090519. June.

Bay Area Air Quality Management District. 2017. Bay Area 2017 Clean Air Plan. Adopted April 19, 2017.

Bay Area Air Quality Management District, 2022. California Environmental Quality Act Air Quality Guidelines. April 2022.

California Greenhouse Gas Emissions from 2000 to 2021: Trends of Emissions and Other Indicators Date of Release: December 14, 2023 https://ww2.arb.ca.gov/sites/default/files/2023-12/2000_2021_ghg_inventory_trends.pdf

California Energy Commission. 2021. Energy Almanac. Available: <http://energyalmanac.ca.gov/overview/index.html>.

California Energy Commission. 2023. California Energy Consumption Database. Available: <http://www.ecdms.energy.ca.gov/>

California Environmental Protection Agency. 2010. Climate Action Team Report to Governor Schwarzenegger and the Legislature. December 2010. http://www.climatechange.ca.gov/climate_action_team/reports/.

California Natural Resources Agency. 2018. State of California Sea-Level Rise Guidance. Available at: https://www.opc.ca.gov/webmaster/ftp/pdf/agenda_items/20180314/Item3_ExhibitA_OPC_SLR_Guidance-rd3.pdf.

California Office of Environmental Health Hazard Assessment. 2022. 2022 Report: Indicators of Climate Change in California. Available: <https://oehha.ca.gov/climate-change/epic-2022>

City of Pittsburg. 2019. City of Pittsburg Greenhouse Gas Emission Inventories Updated 2005 and 2016. Prepared for the City of Pittsburg with the assistance of Rincon Consultants, Inc. July 2019.

City of Pittsburg. 2023. City of Pittsburg Sustainability Plan. Prepared for the City of Pittsburg with the assistance of Rincon Consultants, Inc. July October 2023.

National Highway Traffic Safety Administration. 2018. Federal Register, Vol. 83, No. 72, Rules & Regulations, Mid-Term Evaluation of Greenhouse Gas Emissions Standards for Model Year 2022-2025 Light Duty Vehicles. April 13. Available at: <https://www.federalregister.gov/documents/2018/04/13/2018-07364/mid-term-evaluation-of-greenhouse-gas-emissions-standards-for-model-year-2022-2025-light-duty>. Accessed: February 2022.

National Resources Defense Council (NRDC). 2014. NRDC Fact Sheet: California Snowpack and the Drought. April 2014. Available at: <https://www.nrdc.org/sites/default/files/ca-snowpack-anddrought-FS.pdf>.

United States Energy Information Administration (U.S. EIA). 2022. California State Energy Profile. Last updated March 17, 2022. Available at: <https://www.eia.gov/state/print.php?sid=CA>.

US Environmental Protection Agency (EPA), 2024b. AP-42: Compilation of Air Emission Factors from Stationary Sources. Available: <https://www.epa.gov/air-emissions-factors-and-quantification/ap-42-compilation-air-emissions-factors-stationary-sources>. Accessed April 25, 2024.

EPA (2024). Draft Inventory of U.S. Greenhouse Gas Emissions and Sinks: 1990-2022 U.S. Environmental Protection Agency, EPA 430-D-24-001. <https://www.epa.gov/ghgemissions/draft-inventory-us-greenhouse-gas-emissions-and-sinks-1990-2022>

This section of the Program Environmental Impact Report (PEIR) evaluates the effects of buildout of the Pittsburgh Technology Park Specific Plan (proposed Specific Plan; proposed project) Area associated with hazards and hazardous materials. Hazardous materials may have the potential to affect the environment or human health. This section analyzes potential environmental impacts related to future development of the Plan Area on a hazardous materials site; the routine transport, use, storage, or disposal of hazardous materials; the potential release of hazardous materials into the environment; and the potential to emit hazardous emissions or handle hazardous materials within one-quarter mile of a school.

This section provides a background discussion of the hazardous materials and waste, fire hazards, and hazards from air traffic found in the Plan Area. This section is organized with an existing setting, regulatory setting, and impact analysis. Additional analysis related to wildfire hazards is contained in Section 3.15 of this Program Environmental Impact Report (PEIR). The information provided in this section is based on the following documents:

- City of Pittsburgh. *Pittsburgh 2040 General Plan*. Adopted May 2024.
- WSP USA Inc. January 2023. *Phase I Environmental Site Assessment and Limited Soil Screening (Phase I ESA)*.

3.7.1 ENVIRONMENTAL SETTING

HAZARDOUS MATERIALS AND WASTE

Hazardous Materials

A hazardous material is a substance or combination of substances which, because of its quantity, concentration, or physical, chemical, or infectious characteristics, may either (1) cause or significantly contribute to an increase in mortality or an increase in serious, irreversible, or incapacitating irreversible illness; or (2) pose a substantial present or potential hazard to human health and safety, or the environment when improperly treated, stored, transported, or disposed of. Hazardous materials are mainly present because of industries involving chemical byproducts from manufacturing, petrochemicals, and hazardous building materials.

Hazardous Waste

Hazardous waste is the subset of hazardous materials that has been abandoned, discarded, or recycled and is not properly contained, including soil or groundwater that is contaminated with concentrations of chemicals, infectious agents, or toxic elements sufficiently high to increase human mortality or to destroy the ecological environment. If a hazardous material is spilled and cannot be effectively picked up and used as a product, it is considered to be hazardous waste. If a hazardous material site is unused, and it is obvious there is no realistic intent to use the material, it is also considered to be a hazardous waste. Examples of hazardous materials include flammable and combustible materials, corrosives, explosives, oxidizers, poisons, materials that react violently with water, radioactive materials, and chemicals.

Transportation of Hazardous Materials

The transportation of hazardous materials within California is subject to various federal, state, and local regulations. It is illegal to transport explosives or inhalation hazards on any public highway not designated for that purpose, unless the use of the highway is required to permit delivery, or the loading of such materials (California Vehicle Code §§ 31602(b), 32104(a)). The California Highway Patrol (CHP) designates through routes to be used for the transportation of hazardous materials. Transportation of hazardous materials is restricted to these routes except in cases where additional travel is required from that route to deliver or receive hazardous materials to and from users.

HAZARDOUS SITES

The Plan Area was formerly the Delta View Golf Course (Golf Course), which began operations in 1953. The Plan Area has been vacant since the permanent closure of the Golf Course in 2018. A site reconnaissance was conducted for the Plan Area as part of the Phase I ESA. No evidence of the past use, treatment, storage, disposal or generation of hazardous substances or petroleum products was observed. However, the discussion below describes potential hazardous sites within one mile of the Plan Area.

Envirostor Data Management System

The Department of Toxic Substances Control (DTSC) maintains the *Envirostor Data Management System*, which provides information on hazardous waste facilities (both permitted and corrective action) as well as any available site cleanup information. This site cleanup information includes Federal Superfund Sites National Priorities List (NPL), State Response Sites, Voluntary Cleanup Sites, School Cleanup Sites, Corrective Action Sites, Tiered Permit Sites, and Evaluation / Investigation Sites. The hazardous waste facilities include Permitted–Operating, Post-Closure Permitted, and Historical Non-Operating.

The Phase I ESA revealed that there are three Envirostor sites within approximately one mile of the Plan Area. Table 3.7-1 provides the listings located within a one-mile radius of the Plan Area. A discussion and finding for each property follows the table. None of the sites have an active cleanup status.

TABLE 3.7-1: ENVIROSTOR LIST FOR ONE-MILE RADIUS OF PLAN AREA

NAME	STATUS	ADDRESS
Camp Stoneman	No Further Action	Railroad Avenue, Pittsburg
Range Road Middle School Site	No Further Action	Range Road/Leland Road, Pittsburg
The Stanley Works	Remedial Actions Completed; Deed and Land Use Restrictions, and Environmental Covenants Implemented	855 North Parkside Drive, Pittsburg

CAMP STONEMAN

Former Camp Stoneman, one-half mile east of the Plan Area, is a U.S. Army staging area and training facility. Thirteen areas of interest (AOIs) were identified at the site for potential environmental concern as a result of the Department of Defense (DoD) occupancy in 2005. Multiple investigations and assessments were carried out for the site. Four of the AOIs were in close proximity to the Plan Area in the north and deferred to the Military Munitions Response Program (MMRP) with succeeding records. A finding of No Department of Defense Actions Indicated (NDAI) for Hazardous, Toxic, and Radiological Waste (HTRW) was issued from USACE to the San Francisco Bay Regional Water Quality Control Board (RWQCB) in 2010.

RANGE ROAD MIDDLE SCHOOL SITE

This site one-half mile north of the Plan Area was under investigation as part of the former Camp Stoneman. It was part of the Small Arms Ranges AOI. The site was investigated for possible elevated concentrations of metals and ordnance. No contaminants of partial concern (COPCs) were identified, and no further environmental investigative activities were recommended.

THE STANLEY WORKS

This site is one mile north of the Plan Area. Three releases were reported at the site. Groundwater with uses other than drinking water and soil were potential media of concern. Petroleum/fuels/oils, and volatile organic compounds (VOCs) were potential contaminants of concern. A xylene leak was discovered during UST closure in 1987. VOCs contamination was associated with a septic system removed in 1992. A petroleum release from an adjacent property was discovered in 2004. Remedial actions were completed for all three cases. Deed restriction, land use restriction, and environmental covenants were implemented at the site.

A limited soil sampling was conducted as part of the Phase I ESA to provide additional information related to the operation of the former Delta View Golf Course and Camp Stoneman, and preliminarily determine whether topsoil in select areas had been potentially impacted by agricultural chemical use or the operation of the nearby former Camp Stoneman. The limited soil screening is based on knowledge of the Golf Course operation and previous reports on Camp Stoneman and metals identified as contaminants of potential concern. The limited soil screening found no evidence of significant releases of metals, Total Petroleum Hydrocarbons (TPHs), Polychlorinated biphenyls (PCBs), pesticides, or herbicides. No significant impacts from historical operations of the Golf Course or the adjoining former Camp Stoneman were found.

Cortese List

The Hazardous Waste and Substances Sites (Cortese) List is a planning document used by state, local agencies, and developers to comply with CEQA requirements in providing information about the location of hazardous materials release sites. Government Code Section 65962.5 requires the California Environmental Protection Agency (Cal-EPA) to develop an updated Cortese List annually. DTSC is responsible for a portion of the information contained in the Cortese List. Other state and local government agencies are required to provide additional hazardous material release information for the Cortese List.

3.7 HAZARDS AND HAZARDOUS MATERIALS

The Phase I ESA revealed that there is one Cortese site within the Plan Area, and one Cortese site located three-quarters of a mile east of the Plan Area. Table 3.7-2 provides the listings located within a one-mile radius of the Plan Area. A discussion and finding for each property follows the table.

TABLE 3.7-2: CORTESE LIST FOR ONE-MILE RADIUS OF PLAN AREA

<i>NAME</i>	<i>STATUS</i>	<i>ADDRESS</i>
Delta View Golf Course	Completed – Case Closed	2222-2242 Golf Club Road, Pittsburg, California
Service Station - SAP 135771	Completed – Case Closed	3737 Railroad, Pittsburg, California

DELTA VIEW GOLF COURSE

In 1994, an underground storage tank (UST) leak was discovered during the removal of a 1,100-gallon UST. Soil was the potential medium of concern and gasoline was the potential contaminant of concern. Substantially impacted soil was removed with extensive excavation, and no groundwater was encountered during excavation. Pockets of impacted soils remain in the sidewalls. The case was closed in 1997.

SERVICE STATION – SAP 135771

This property is located three-quarters of a mile east of the Plan Area. A UST leak was discovered during closure in 1989. Soil was the potential media of concern and gasoline was the potential contaminant of concern. The case was closed in 2004 as groundwater was found not to be impacted by the release in the Groundwater Assessment Program initiated by Shell Oil Products US.

GeoTracker

GeoTracker is the State Water Resources Control Board's online database that provides access to statewide environmental data and tracks regulatory data for the following types of sites:

- Leaking underground fuel tank cleanup sites;
- Cleanup Program Sites (CPS; also known as Site Cleanups and formerly known as Spills, Leaks, Investigations, and Cleanups [SLIC] sites);
- Military sites (consisting of military underground storage tank [UST] sites, military privatized sites, and military cleanup sites [formerly known as DoD non-UST]);
- Land disposal sites (landfills); and
- Permitted UST facilities.

As part of the Phase I ESA, a search of the GeoTracker database was conducted to identify any known or suspected (reported but not yet confirmed) sources of environmental hazards within the Plan Area. A leaking underground storage tank (LUST) case was listed for the Plan Area at the Delta View Golf Course and discussed above in the Cortese List section.

HAZARDS FROM AIR TRAFFIC

The Plan Area is not located within any Airport Land Use Commission (ALUCP) Airport Influence Areas (AIA).

Local Airport Facilities

There are no private or public airport facilities in the Plan Area. The nearest airport facilities to the Plan Area are Buchanan Field Airport (located approximately 10 miles or further southwest of the Plan Area). The Buchanan Field Airport (CCR) is a medium sized, primarily general and business aviation airport located in the City of Concord. The Buchanan Field Airport is used by pilots visiting the area and is home to approximately three major flight schools.

National Transportation Safety Board Aviation Accident Database

The NTSB Aviation Accident Database identifies two aircraft accidents with Pittsburg identified as the location between January 1, 1950, to June 12, 2019. (National Transportation Safety Board, 2019). These incidents were small, causing a total of two fatal accidents. The most recent accident occurred on October 25, 2016, in a Beechcraft A36 propeller plane (two fatal accidents). The second accident occurred on July 15, 1992, in a Cessna 150L plane (nonfatal).

HAZARDS FROM WILDLAND FIRES

The potential for wildland fires represents a hazard where development is adjacent to open space or within close proximity to wildland fuels. Steep hillsides and varied topography within portions of the City also contribute to the risk of wildland fires. Refer to Section 3.15, *Wildfires*, of this PEIR for more information on hazards from wildland fires.

3.7.2 REGULATORY SETTING

FEDERAL

Environmental Protection Agency (USEPA)

The primary regulator of hazards and hazardous materials is the USEPA, whose mission is to protect human health and the environment. The City of Pittsburg is located within USEPA Region 9, which includes Arizona, California, Hawaii, and New Mexico.

Clean Air Act

In accordance with the Federal Clean Air Act (FCAA), the United States Environmental Protection Agency (USEPA) has established National Emissions Standards for Hazardous Air Pollutants. Exceeding the emissions standard for a given air pollutant may cause an increase in illnesses and/or fatalities.

Clean Water Act (CWA)

The Clean Water Act (CWA), which amended the Water Pollution Control Act (WPCA) of 1972, sets forth the Section 404 program to regulate the discharge of dredged and fill material into Waters of

the U.S. and the Section 402 National Pollutant Discharge Elimination System (NPDES) to regulate the discharge of pollutants into Waters of the U.S. The Section 401 Water Quality Certification program establishes a framework of water quality protection for activities requiring a variety of Federal permits and approvals (including CWA Section 404, CWA Section 402, FERC Hydropower and Section 10 Rivers and Harbors).

Comprehensive Environmental Response, Compensation, and Liability Act

The Comprehensive Environmental Response, Compensation & Liability Act (CERCLA), commonly associated with the term “Superfund,” established:

- Regulations concerning closed and abandoned hazardous waste sites
- Liability of parties responsible for any releases of hazardous waste at these sites
- Funding for cleanup when responsible parties cannot be identified

Resource Conservation and Recovery Act (RCRA)

The Resource Conservation and Recovery Act (RCRA) established the United States Environmental Protection Agency (USEPA) “cradle to grave” control (generation, transportation, treatment, storage, and disposal) over hazardous materials and wastes. In California, DTSC has RCRA authorization.

Hazardous Materials Transportation Act

The Hazardous Materials Transportation Act, as amended, is the statute regulating hazardous materials transportation in the United States. The purpose of the law is to provide adequate protection against the risks to life and property inherent in transporting hazardous materials in interstate commerce. This law gives the U.S. Department of Transportation (USDOT) and other agencies the authority to issue and enforce rules and regulations governing the safe transportation of hazardous materials.

FY 2001 Appropriations Act

Title IV of the Appropriations Act required the identification of “Urban Wildland Interface Communities in the Vicinity of Federal Lands that are at High Risk from Wildfire” by the U.S. Departments of the Interior and Agriculture.

Federal Aviation Administration

Federal Regulation Title 14, Part 77 establishes standards and notification requirements for objects that may affect navigable airspace. The notification would evaluate construction impacts, determine potential hazards, identify safety mitigation measures, and record new objects as it relates to airport and airspace operations. The Part 77 notification process allows the Federal Aviation Administration (FAA) to identify any potential aeronautical hazards in advance in order to prevent/minimize adverse impacts to navigable airspace.

STATE

Assembly Bill 337

Per AB 337, local fire prevention authorities and the California Department of Forestry and Fire Protection (CalFire) are required to identify Very High Fire Hazard Severity Zones (VHFHSZ) in Local Responsibility Areas (LRA). Standards related to brush clearance and the use of fire-resistant materials in fire hazard severity zones are also established.

California Code of Regulations

Title 3 of the California Code of Regulations (CCR) pertains to the application of pesticides and related chemicals. Parties applying regulated substances must continuously evaluate application equipment, the weather, the treated lands and all surrounding properties. Title 3 prohibits any application that would:

- Contaminate persons not involved in the application
- Damage non-target crops or animals or any other public or private property
- Contaminate public or private property or create health hazards on said property

Title 14 of the CCR establishes minimum standards for solid waste handling and disposal.

Title 17 of the CCR establishes regulations relating to the use and disturbance of materials containing naturally occurring asbestos.

Title 22 of the CCR sets forth definitions of hazardous waste and special waste. The section also identifies hazardous waste criteria and establishes regulations pertaining to the storage, transport, and disposal of hazardous waste.

Title 26 of the CCR is a medley of State regulations pertaining to hazardous materials and waste that are presented in other regulatory sections. Title 26 mandates specific management criteria related to hazardous materials identification, packaging, and disposal. In addition, Title 26 establishes requirements for hazardous materials transport, containment, treatment, and disposal. Finally, staff training standards are set forth in Title 26.

Title 27 of the CCR sets forth a variety of regulations relating to the construction, operation and maintenance of the state's landfills. The title establishes a landfill classification system and categories of waste. Each class of landfill is constructed to contain specific types of waste (household, inert, special, and hazardous).

California Occupational Safety and Health Administration (Cal OSHA)

Title 8 of the CCR establishes Cal OSHA and requirements related to public and worker protection. Topics addressed in Title 8 include materials exposure limits, equipment requirements, protective clothing, hazardous materials, and accident prevention. Construction safety and exposure standards for lead and asbestos are set forth in Title 8.

California Health and Safety Code

Division 20 of the Health and Safety Code establishes Department of Toxic Substances Control (DTSC) authority and sets forth hazardous waste and underground storage tank regulations. In addition, the division creates a state superfund framework that mirrors the federal program.

Division 11 of the Health and Safety Code establishes regulations related to a variety of explosive substances and devices, including high explosives and fireworks. Section 12000 *et seq.* establishes regulations related to explosives and explosive devices, including permitting, handling, storage, and transport (in quantities greater than 1,000 pounds).

Division 12.5 of the Health and Safety Code establishes requirements for buildings used by the public, including essential services buildings, earthquake hazard mitigation technologies, school buildings, and postsecondary buildings.

Division 26 of the Health and Safety Code establishes California Air Resources Board (CARB) authority. The division designates CARB as the air pollution control agency per federal regulations and charges the Board with meeting Clean Air Act requirements.

California Health and Safety Code and UBC Section 13000 *et seq.*

State fire regulations are set forth in §13000 *et seq.* of the California Health and Safety Code, which is divided into “Fires and Fire Protection” and “Buildings Used by the Public.” The regulations provide for the enforcement of the UBC and mandate the abatement of fire hazards.

The Health and Safety Code establishes broadly applicable regulations, such as standards for buildings and fire protection devices, in addition to regulations for specific land uses, such as childcare facilities and high-rise structures.

California Vehicle Code §31600 (Transportation of Explosives)

This California Vehicle Code establishes requirements related to the transportation of explosives in quantities greater than 1,000 pounds, including licensing and route identification.

California Public Resources Code

The State’s Fire Safety Regulations are set forth PRC Section 4290, which include the establishment of State Responsibility Areas (SRAs). An SRA is the area where the State of California is financially responsible for the prevents and suppression of wildfires. An SRA does not include lands within city boundaries or in federal ownership. Areas in federal ownership are under Federal Responsibility Areas (FRA), and areas within city boundaries are included in LRAs.

Public Resources Code §4291 sets forth defensible space requirements, which are applicable to anyone who “...owns, leases, controls, operates, or maintains a building or structure in, upon, or adjoining a mountainous area, forest-covered lands, brush-covered lands, grass-covered lands, or land that is covered with flammable material” (§4291(a)).

California Fire Code

The 2019 California Fire Code (CCR Title 24, Part 9) establishes regulations to safeguard against the hazards of fire, explosion, or dangerous conditions in new and existing buildings, structures, and premises. The Fire Code also establishes requirements intended to provide safety for and assistance to firefighters and emergency responders during emergency operations. The provisions of the Fire Code apply to the construction, alteration, movement, enlargement, replacement, repair, equipment, use and occupancy, location, maintenance, removal, and demolition of every building or structure throughout California. The Fire Code includes regulations regarding fire-resistance-rated construction, fire protection systems such as alarm and sprinkler systems, fire services features such as fire apparatus access roads, means of egress, fire safety during construction and demolition, and wildland-urban interface areas.

State Oversight of Hazards and Hazardous Materials

The DTSC is chiefly responsible for regulating the handling, use, and disposal of toxic materials. The State Water Resources Control Board (SWRCB) regulates discharge of potentially hazardous materials to waterways and aquifers and administers the basin plans for groundwater resources in the various regions of the state. The Regional Water Quality Control Board (RWQCB) oversees surface and groundwater. Programs intended to protect workers from exposure to hazardous materials and from accidental upset are covered under OSHA at the federal level and Cal-OSHA and the California Department of Health Services (DHS) at the state level. Air quality is regulated through the CARB and BAAQMD. The State Fire Marshal is responsible for the protection of life and property through the development and application of fire prevention engineering, education, and enforcement; CalFire provides fire protection services for State and privately-owned wildlands.

Water Code

Division 7 of the California Water Code, commonly referred to as the Porter-Cologne Water Quality Control Act, created the SWRCB and RWQCB. In addition, water quality responsibilities are established for the SWRCB and RWQCBs.

LOCAL

Certified Unified Program Agency (CUPA)

The California EPA designates specific local agencies as Certified Unified Program Agencies (CUPA), typically at the county level. In Contra Costa County, the Contra Costa County Health Services Department Hazardous Materials Division is responsible for the County's CUPA programs. Each designated CUPA is responsible for the implementation of six statewide programs within its jurisdiction. These programs include:

- Underground storage of hazardous substances (USTs)
- Hazardous Materials Business Plan (HMBP) requirements
- Hazardous Waste Generator requirements
- California Accidental Release Prevention (Cal-ARP) program
- Uniform Fire Code hazardous materials management plan

3.7 HAZARDS AND HAZARDOUS MATERIALS

- Above Ground Storage Tanks (Spill Prevention Control and Countermeasures Plan only)

Implementation of these programs involves:

- Permitting and inspection of regulated facilities
- Providing educational guidance and notice of changing requirements stipulated in State or Federal laws and regulations
- Investigations of complaints regarding spills or unauthorized releases
- Administrative enforcement actions levied against facilities that have violated applicable laws and regulations

City of Pittsburg Hazard Mitigation Plan

The City of Pittsburg Hazard Mitigation Plan (HMP) was prepared in order to assess the natural, technological, and human-caused risks to Pittsburg so as to reduce the potential impact of the hazards by creating mitigation strategies. The HMP was updated in 2022. The 2022 HMP represents the City of Pittsburg's commitment to create a safer, more resilient, community by taking actions to reduce risk and by committing resources to lessen the effects of hazards on the people and property of Pittsburg. The HMP complies with the Federal Disaster Mitigation Act (2000), Federal Register 44 CFR Parts 201 and 206. The Pittsburg City Manager's Office and Police Department has coordinated preparation of the HMP in cooperation with other Pittsburg departments, community stakeholders, partner agencies, and members of the public. The HMP addresses hazards and risks associated with releases of hazardous materials, including incidents associated with refineries and chemical plants and establishes a Mitigation Action Plan to reduce risks and inform the City's response to disasters.

City of Pittsburg Emergency Operations Plan

The City of Pittsburg Emergency Operations Plan (EOP), adopted in 2018, is the official City emergency management document that guides the emergency response and assigns the roles and responsibilities of departments, units, and individuals during emergencies. The EOP establishes the organizational structure, policies, and procedures for the City's emergency response, including:

- Methods for carrying out emergency operations;
- The process for rendering mutual aid;
- Emergency services of local, state, and federal agencies;
- How resources are mobilized;
- Emergency public information; and
- Continuity of government.

As required by Government Code 8607, the Pittsburg EOP uses the Standardized Emergency Management System and the National Incident Management System for coordination of multi-agency or multi-jurisdictional emergencies.

Contra Costa County Emergency Operations Plan

The Contra Costa County Emergency Operations Plan (EOP) provides the basis for a coordinated response before, during, and after an emergency affecting Contra Costa County. The EOP establishes

emergency organization, assigns tasks, specifies policies and general procedures, and provides for the coordination of planning efforts of the various emergency staff and service elements in the Operational Area. The EOP facilitates multi-jurisdictional and interagency coordination in emergency operations and is designed to be utilized in coordination with applicable local, State and federal contingency plans. It also establishes the organizational framework of the California Standardized Emergency Management System (SEMS) and the National Incident Management System (NIMS) within Contra Costa County.

Contra Costa County Airport Land Use Compatibility Plan

The Contra Costa County Airport Land Use Compatibility Plan (ALUCP), adopted by the Contra Costa County ALUC on December 13, 2000, establishes policies applicable to land use compatibility planning in the vicinity of airports throughout the County, including the Buchanan Field Airport. The basic function of the ALUCP is to promote compatibility between airports and the land uses that surround them. The ALUCP serves as a tool for use by the ALUC in fulfilling its duty to review airport and adjacent land use development proposals.

City of Pittsburg 2040 General Plan

The City of Pittsburg General Plan was comprehensively updated in May of 2024. The City of Pittsburg 2040 General Plan (2040 General Plan) includes policies applicable to the hazards impact of the proposed Specific Plan including:

Safety and Resiliency Element

Policy 11-P-1.1: Ensure Pittsburg is prepared to effectively respond to any emergency or disaster, including flooding, fire, hazardous material releases, and seismic activity, in cooperation with other public agencies and appropriate organizations.

Policy 11-P-1.8: Ensure that all areas of the city are accessible to emergency response providers. Keep emergency access routes free of traffic impediments.

Policy 11-P-1.10: Require development to provide additional access roads when necessary to provide for safe access of emergency equipment and civilian evacuation concurrently.

Policy 11-P-5.2: Require hazardous waste generated within the city to be disposed of in a safe manner, consistent with all applicable local, State, and Federal laws.

Policy 11-P-5.3: Continue to support and require compliance with Contra Costa County's Countywide Integrated Waste Management Plan as well as all of the Consolidated Unified Protection Agency (CUPA) program elements.

Policy 11-P-5.4: Support Contra Costa County in implementing the Hazardous Materials Area Plan (HMAP) to coordinate emergency response and hazardous materials incidents affecting the City.

3.7 HAZARDS AND HAZARDOUS MATERIALS

Policy 11-P-5.5: Require compliance with the City's Hazardous Waste Management Plan (HWMP) in addressing the generation, transport, and disposal of hazardous waste in the city, from large and small generators.

Policy 11-P-5.6: Encourage and support as feasible the cleanup of contaminated sites during development and redevelopment projects.

City of Pittsburg Municipal Code

The City of Pittsburg Municipal Code (PMC) is the primary tool that regulates development in the City. Chapter 2.44 PMC, Emergency Organization and Functions, outlines the City's emergency organization and plan. The declared purpose of Chapter 2.44 PMC is to provide for the preparation and carrying out of plans for the protection of persons and property within this City in the event of an emergency, the direction of the emergency organization, and the coordination of the emergency functions of this city with all other public agencies, corporations, organizations and affected private persons.

Chapter 8.04 PMC, Refuse Removal and Disposal, regulates the storage and disposal of refuse, including hazardous waste.

Chapter 15.20 PMC, Fire Code – Regulations, includes the adoption of the 2019 California Fire Code.

Chapter 13.20 PMC, Industrial Waste Disposal, regulates the use of the City's waste collection, treatment and disposal system and industrial waste.

PMC subsection 18.84, Article VI. Hazardous Materials, regulates the use, handling, storage, and transport of hazardous materials and substances.

3.7.3 THRESHOLDS OF SIGNIFICANCE

Consistent with Appendix G of the CEQA Guidelines, the proposed project will have a significant impact from hazards and hazardous materials if it would:

- Create a significant hazard to the public or the environment through the routine transport, use, or disposal of hazardous materials;
- Create a significant hazard to the public or the environment through reasonably foreseeable upset and accident conditions involving the release of hazardous materials into the environment;
- Emit hazardous emissions or handle hazardous or acutely hazardous materials, substances, or waste within one-quarter mile of an existing or proposed school;
- Be located on a site which is included on a list of hazardous materials sites compiled pursuant to Government Code Section 65962.5 and, as a result, would it create a significant hazard to the public or the environment;
- For a project located within an airport land use plan or, where such a plan has not been adopted, within two miles of a public airport or public use airport, would the project result in a safety hazard for people residing or working in the Plan Area;

- Impair implementation of or physically interfere with an adopted emergency response plan or emergency evacuation plan; or
- Expose people or structures, either directly or indirectly, to a significant risk of loss, injury or death involving wildland fires.

3.7.4 IMPACTS AND MITIGATION MEASURES

Impact 3.7-1: Create a significant hazard to the public or the environment through the routine transport, use, or disposal of hazardous materials (Less than Significant)

Future development allowed within the Plan Area may involve the transportation, use, and/or disposal of hazardous materials. Hazardous materials are typically used in industrial and commercial uses. Future uses may involve the transport and disposal of such materials from time to time. Future development within the Plan Area may involve equipment or construction activities that use hazardous materials (e.g., coatings, solvents and fuels, and diesel-fueled equipment), the transportation of excavated soil and/or groundwater containing contaminants from unknown sources of contamination, or disposal of contaminated materials at an approved disposal site. While hazardous materials may be associated with industrial activities, hazardous materials may also be associated with the regular cleaning and maintenance of commercial office and other less intense uses.

The use, transportation, and disposal of hazardous materials is regulated and monitored by local fire departments, CUPAs, the Cal-OSHA and the DTSC consistent with the requirements of federal, state, and local regulations and policies. Facilities that store hazardous materials on-site are required to maintain a Hazardous Materials Business Plan in accordance with state regulations. In the event of an accidental release of hazardous materials, the local CUPA and emergency management agencies (e.g., police and fire departments) would respond. All future development within the Plan Area would be required to comply with the provisions of federal, state, and local requirements related to hazardous materials. As future development and infrastructure projects are considered by the City, each project would be evaluated for potential impacts, specific to the project, associated with hazardous materials as required under CEQA.

In addition to the requirements associated with federal and state regulations and the PMC, the City of Pittsburg 2040 General Plan includes policies and actions to address potential impacts associated with hazardous materials. Policies 11-P-5.2, 11-P-5.4, and 11-P-5.5 of the 2040 General Plan would ensure that potential hazards are disposed of in a safe manner, that development is located in areas where potential exposure to hazards and hazardous materials can be mitigated to an acceptable level, and that business operations comply with federal and state regulations regarding the use, transport, storage, and disposal of hazardous materials. Future development within the Plan Area is required to comply will all policies and actions in the 2040 General Plan.

As described previously in the regulatory setting, hazardous materials regulations related to the use, handling, and transport of hazardous materials are codified in Titles 8, 22, and 26 of the CCR, and their enabling legislation set forth in Chapter 6.95 of the California Health and Safety Code. These

laws were established at the state level to ensure compliance with federal regulations to reduce the risk to human health and the environment from the routine use of hazardous substances. These regulations must be implemented by employers/businesses, as appropriate, and are monitored by the state (e.g., Cal OSHA in the workplace or DTSC for hazardous waste) and/or the County. The haulers and users of hazardous materials are listed with the Contra Costa County Fire Protection District and are regulated and monitored by the County of Contra Costa. Therefore, compliance with all applicable federal, state and local regulations, including the 2040 General Plan, would ensure that potential impacts associated with the routine use, transport, storage, or disposal or accidental release of hazardous materials would be **less than significant**, and no mitigation is required.

Impact 3.7-2: Create a significant hazard to the public or the environment through reasonably foreseeable upset and accident conditions involving the release of hazardous materials into the environment (Less than Significant)

An accidental release of hazardous materials could occur during: (1) the routine use, transport, and disposal of materials during project operation (as discussed above); or (2) through the accidental upset of hazardous materials – either known or unknown – during excavation and construction of future site development. Exposure to hazardous materials could occur through contact with contaminated soil or groundwater, skin contact, or the inhalation of vapors or dust.

The results of the Phase I ESA indicate that all known contaminated sites in the Plan Area and within a one-mile radius of the Plan Area, as found in the Envirostor, Cortese List, and GeoTracker databases, have gone through remediation and the cases are closed. The Phase I ESA also included soil sampling that found no evidence of significant releases of metals, Total Petroleum Hydrocarbons (TPHs), Polychlorinated biphenyls (PCBs), pesticides, or herbicides and concluded that no significant impacts from historical operations of the Golf Course or the adjoining former Camp Stoneman were found. This indicated that accidental release of hazardous materials is unlikely.

In the unlikely event of an accidental release of hazardous materials, the local CUPA and emergency management agencies (e.g., police and fire departments) would respond. Additionally, the risks associated with the accidental release of hazardous materials would be managed through the implementation of California Code of Regulations, California Health and Safety Code, California Fire Code, DTSC regulations, RCRA regulations. Implementation of Title 49, Parts 171-180, of the Code of Federal Regulations would reduce any impacts associated with the potential for accidental release of hazardous materials. The 2040 General Plan also includes policies 11-P-1.1, 11-P-1.8, and 11-P-1.10, which ensure that the City has adequate emergency response and measures to respond in the event of an accidental release of a hazardous substance.

Therefore, compliance with all applicable federal, state and local regulations, including the 2040 General Plan, would ensure that potential impacts associated with accidental release of hazardous materials would be **less than significant**, and no mitigation is required.

Impact 3.7-3: Emit hazardous emissions or handle hazardous or acutely hazardous materials, substances, or waste within one-quarter mile of an existing or proposed school (Less than Significant)

The City of Pittsburg is served by three School Districts: Pittsburg Unified School District (PUSD), Antioch Unified School District (AUSD), and Mt. Diablo Unified School District (MDUSD). There is one school within one-quarter mile of the Plan Area, listed below in Table 3.7-3 and shown in Figure 3.7-1.

TABLE 3.7-3: PUBLIC SCHOOLS WITHIN ONE-QUARTER MILE OF PLAN AREA

<i>SCHOOL</i>	<i>GRADES SERVED</i>	<i>ADDRESS</i>	<i>ENROLLMENT (2021-2022 SCHOOL YEAR)</i>
<i>JUNIOR/MIDDLE SCHOOLS</i>			
Rancho Medanos Jr.	6-8	2301 Range Road, Pittsburg	799

SOURCES: SCHOOL ACCOUNTABILITY REPORT CARDS FOR PITTSBURG UNIFIED SCHOOL DISTRICT (PUSD), ANTIOCH UNIFIED SCHOOL DISTRICT (AUSD), AND MT. DIABLO UNIFIED SCHOOL DISTRICT (MDUSD).

FIGURE 3.7-1. PUBLIC SCHOOLS WITHIN ONE-QUARTER MILE OF PLAN AREA

Adherence to the California Code of Regulations, California Health and Safety Code, California Fire Code, DTSC regulations, RCRA regulations as well as compliance with the 2040 General Plan policies and actions related to land use compatibility and hazardous materials would ensure that the impact is **less than significant**, and no mitigation is required.

Impact 3.7-4: Be located on a site which is included on a list of hazardous materials sites compiled pursuant to Government Code Section 65962.5 and, as a result, would it create a significant hazard to the public or the environment (No Impact)

Federal and state regulations require adherence to detailed guidelines regarding the clean-up and/or remediation of hazardous material sites prior to development. As described in Section 3.7.1, none of the hazardous materials sites located within a one-mile radius are active. The two sites identified on the Cortese List are “Completed – Case Closed” sites. Because these sites are deemed completed, or require no further action, development on this site can proceed. Additionally, federal and state regulations ensure that existing hazards, including those associated with known hazardous materials sites, are addressed prior to development.

Overall, compliance with all applicable federal, state and local regulations and requirements included in the 2040 General Plan would ensure that potential impacts associated with the hazardous conditions on sites listed pursuant to Government Code Section 65962.5. Therefore, there will be no impact.

Impact 3.7-5: For a project located within an airport land use plan or, where such a plan has not been adopted, within two miles of a public airport or public use airport, would the project result in a safety hazard for people residing or working in the Plan Area (No Impact)

Hazards related to airports are typically grouped into two categories: air hazards and ground hazards. Air hazards jeopardize the safety of an airborne aircraft and expose passengers, pilots, and crews to danger. Examples of air hazards include tall structures, glare-producing objects, bird and wildlife attractants, radio waves from communication centers, or other features that have the potential to interfere with take-off or landing procedures, posing a risk to aircraft. Ground hazards jeopardize the safety of current and future residents and/or workers in the vicinity of an airport. The most obvious ground hazard is a crash, which may produce a serious, immediate risk to those residing in or using areas adjacent to the airport. Most accidents occur during take-off and landing. Therefore, the higher the density around an airport, including transportation facilities, the higher the risk associated with this type of hazard.

There are no private or public airport facilities in the city of Pittsburg. The nearest airport facility to the Plan Area is Buchanan Field Airport (located approximately 10 miles or further southwest of the Plan Area).

No portions of the City of Pittsburg, including the Plan Area, lie within the Runway Protection Zone, Inner/Outer Safety Zones, Inner Turning Zone, Sideline Safety Zone, or Traffic Pattern Zone for

3.7 HAZARDS AND HAZARDOUS MATERIALS

Buchanan Field Airport. The Plan Area is not located within any Airport Land Use Commission (ALUCP) or Airport Influence Areas (AIA).

The proposed Specific Plan does not include any policies or actions that would impact air hazards or safety. Future development within the Plan Area would not affect the Runway Protection Zone, Inner/Outer Safety Zones, Inner Turning Zone, Sideline Safety Zone, Traffic Pattern Zone, or other safety-related zones for the local or regional airports. Implementation of the proposed Specific Plan would result in no impact to the adopted airport land use plan.

Impact 3.7-6: Impair implementation of or physically interfere with an adopted emergency response plan or emergency evacuation plan (Less than Significant)

The City of Pittsburg adopted an Emergency Operation Plan (EOP) in 2018, as described in the Regulatory Setting section above. The EOP outlines the procedures in place for establishing evacuation routes in the case of a fire hazard. However, there are no set evacuation routes as it is difficult to predict which routes to use according to the conditions present at the time of an evacuation.

The proposed Specific Plan would allow a variety of new development types, including commercial and industrial, resulting in increased employment in the Plan Area. Road and infrastructure improvements would occur to accommodate the new growth. The proposed Specific Plan does not include land uses, policies, or other components that conflict with adopted emergency response or evacuation plans, including the City of Pittsburg's EOP.

The City is a member of the Contra Costa Operational Area. This entity provides mutual aid to communities via the Contra Costa County Sheriff's Department, Contra Costa County Fire Protection District, and the State of California Office of Emergency Services. The Contra Costa Operational Area EOP addresses the response to emergency incidents associated with emergencies affecting Contra Costa County, including the City of Pittsburg.

The proposed Specific Plan includes a mobility framework intended to guide future mobility infrastructure improvements within the Plan Area. The mobility framework ensures that there will be adequate emergency vehicle access routes for all phases of buildout of the Plan Area. Implementation of the proposed Specific Plan would result in a **less than significant** impact, and no mitigation is required.

Impact 3.7-7: Expose people or structures to a significant risk of loss, injury or death involving wildland fires (Less than Significant)

Wildland fires are a potential hazard to development and land uses located in the Plan Area. The severity of wildland fire problems depends on a combination of vegetation, climate, slope, and people; in addition to natural factors such as lightning, human activity is a primary factor

contributing to the incidence of wildfires. Campfires, smoking, debris burning, arson, public utility infrastructure, and equipment use are common human-related causes of wildland fires.

The state has charged the California Department of Forestry and Fire Protection (CalFire) with the identification of Fire Hazard Severity Zones (FHSZ) within State Responsibility Areas (SRAs). The SRA is the area of the state where the State of California is financially responsible for the prevention and suppression of wildfires. CalFire rates FHSZs areas for wildfire using categories of “moderate,” “high,” or “very high” based on fuel loading, slope, weather, and other relevant factors. In addition, CalFire must classify Very High Fire Hazard Severity Zones (VHFHSZs) identified within any Local Responsibility Areas (LRAs). LRAs are incorporated cities, urban regions, agriculture lands, and portions of the desert where the local government is responsible for wildfire protection. This is typically provided by city fire departments, fire protection districts, counties, and by CalFire under contract.

Future development within the Plan Area would allow the placement of people and/or structures on a currently undeveloped site that is identified as having a high risk of wildland fires. As shown in Figure 3.15-2 in Section 3.15 of this PEIR, a small portion of the Plan Area is in a “high” FHSZ. No portions of the Plan Area are categorized as containing a VHFHSZs by CalFire.

Another fire threat classification system is CalFire’s Threat Model. CalFire’s Threat Model identifies fire threats using fuel rank, which is a ranking system developed by CalFire that incorporates the following wildfire factors: fuel model, slope, ladder index, and crown index, and modeled characteristics regarding fire probability and behaviors. CalFire’s Fire Threat Model identifies the Plan Area to contain areas with “high” and “very high” fire threats, as shown in Figure 3.15-3 in Section 3.15 of this PEIR. “Very high” fire threats are located in the southern and western portions of the Plan Area, where there tends to be a greater amount of combustible vegetation and where slope grades increase. CalFire’s Threat Model also shows a mixture of “high” and “very high” fire threats for the areas immediately south, northeast, and west of the Plan Area.

The proposed Specific Plan identifies guidelines for landscaping and fire prevention in the Plan Area. The proposed Specific Plan states the following guidelines:

- Landscape design shall be designed, installed, and maintained in accordance with the following Pittsburg Municipal Code (PMC) 15.20 California Fire Code. Section 15.20 is an amended version of the 2022 California Fire Code (CFC).
- Future development shall incorporate fire suppression systems, such as fire hydrants, sprinklers, and smoke detectors, in alignment with the latest specifications outlined in the CFC. Every aspect of the project's development plans will undergo thorough review by the Contra Costa County Fire Protection District during future discretionary development applications and Building Permit review processes to ensure adherence to these code provisions. Additional fire safety measures, such as fire-resistant roof construction, secure attachments, vegetative buffer zones, and other precautions, may be mandated as part of this evaluation.
- In compliance with the California Fire Protection Standards, defensible space must be maintained throughout the Plan Area adjacent to open spaces. Should the designated

3.7 HAZARDS AND HAZARDOUS MATERIALS

defensible space distances prove challenging to achieve, then structures within this zone must be constructed using fire-resistant materials and practices to mitigate potential fire risks.

- Brush management shall be required through construction and operations of future development pursuant to the California Fire Code.

The proposed Specific Plan also includes requirements for adequate water supply and fire flow availability, ensuring adequate emergency access, adequate fire protection services, fire safe design site standards, and ensuring public awareness regarding fire safety.

All future development under the proposed Specific Plan would be required to comply with the provisions of federal, state, and local requirements related to wildland fire hazards, including state fire safety regulations associated with wildland-urban interfaces, fire-safe building standards, and defensible space requirements. As future developments in the Plan Area are considered by the City, each project would be evaluated for potential impacts, specific to the project, associated with wildland fire hazards as required under CEQA.

Future development projects would adhere to local and state requirements as discussed above and in Section 3.15 of this PEIR, which would reduce risks related to wildland fire to a **less than significant** impact. No mitigation measures are required.

This section of the Program Environmental Impact Report (PEIR) evaluates the effects of buildout of the Pittsburg Technology Park Specific Plan (Specific Plan; project) associated with hydrology and water quality. This section provides a background discussion of the regional hydrology, flooding, water quality, water purveyors, and water sources found in the Specific Plan Area (Plan Area). This section is organized by the environmental setting, regulatory setting, and impact analysis and uses information from the following documents/sources:

- City of Pittsburg. *Pittsburg 2040 General Plan*. Adopted May 2024.
- United States Department of Agriculture, Natural Resources Conservation Services. U.S. Watersheds.

3.8.1 EXISTING SETTING

REGIONAL HYDROLOGY

The California Department of Water Resources (DWR) has divided the State into 10 Hydrologic Regions, and the Plan Area is located within the San Francisco Bay Hydrologic Region. The San Francisco Bay Hydrologic Region covers approximately 2.88 million acres (4,500 square miles) and includes all of San Francisco and portions of Marin, Sonoma, Napa, Solano, San Mateo, Santa Clara, Contra Costa, and Alameda Counties. Significant geographic features include the Santa Clara, Napa, Sonoma, Petaluma, Suisun-Fairfield, and Livermore Valleys; the Marin and San Francisco Peninsulas; San Francisco, Suisun, and San Pablo Bays; and the Santa Cruz Mountains, Diablo Range, Bolinas Ridge, and Vaca Mountains of the Coast Range.

The San Francisco Bay Hydrologic Region has 28 identified groundwater basins. Despite the tremendous urban development in the region, groundwater use accounts for only about five percent (68,000 acre-feet) of the region's estimated average water supply for agricultural and urban uses, and accounts for less than one percent of statewide groundwater uses. The Sacramento and San Joaquin Rivers flow into the Sacramento-San Joaquin Delta (Delta) and into San Francisco Bay. The Delta is the largest estuary on the West Coast, receiving nearly 40 percent of the state's surface water from the Sierra Nevada and the Central Valley. The interaction between Delta outflow and Pacific Ocean tides determines how far salt water intrudes into the Delta. The resulting salinity distribution influences the distribution of many estuarine fish and invertebrates, as well as the distribution of plants, birds, and animals in wetlands areas.

The north lobe of San Francisco Bay is brackish and is known as San Pablo Bay. It is surrounded by Marin, Sonoma, Napa, and Solano Counties. Suisun Marsh is between San Pablo Bay and the Delta and is the largest contiguous brackish marsh on the West Coast of North America, providing more than 10 percent of California's remaining natural wetlands. The south and central lobes of San Francisco Bay are saltier than San Pablo Bay, as the marine influence dominates.

Local Watersheds (Hydrologic Sub-Areas)

The Plan Area is located in the Kirker Creek-Frontal Suisun Bay Estuaries sub-basin watershed, which in turn is within the greater Suisun Bay watershed. The Plan Area drains into Suisun Bay and New York Slough.

LOCAL DRAINAGE

The City's existing drainage system is composed primarily of channelized creeks fed by surface runoff and underground storm drains. Annual rainfall in the area is approximately 13.33 inches with nearly all of the precipitation occurring between November and April, the winter rainy season. The City is responsible for maintaining the local drainage and flood control system surrounding the Plan Area.

The Contra Costa Canal flows through the Plan Area, bringing water to the East Bay from the Sierra Nevada Mountains. The City of Pittsburg Stormwater Management Plan indicates the presence of two storm drainpipes under the Contra Costa Canal in the vicinity of the Plan Area. The storm drain pipes transport water from south of the canal to open channels that run through the Plan Area north of the canal, where it continues and discharges to the Plan Area/utility right-of-way.

The City's creeks are also a key part of the open space network. They are valuable physical, aesthetic, recreational, and ecological assets. Protection of creeks not only preserves surface water quality, but also reduces flood risks, preserves biodiversity and habitat, minimizes erosion of stream banks, and prevents downstream siltation.

An aquatic resources delineation was conducted for the study area. Seasonal wetland drainage accounted for 1.877 acres and was concentrated in the eastern and southern portion of the study area, which includes the entire Plan Area as well as a 250-foot buffer. Perennial wetland within drainages accounted for 0.169 acre and was split between two wetlands both in the northern portion of the study area. Seasonal wetland within drainages accounted for 1.230 acres spread throughout the study area, mainly along the eastern border.

GROUNDWATER

The Plan Area is located in the Pittsburg Plain Groundwater Basins. This groundwater basins is not adjudicated. The Pittsburg Plain Groundwater Basin is located in northern Contra Costa County along the south shore of Suisun Bay and is about 40 miles northeast of San Francisco. It is bounded by Suisun Bay on the north, on the east by the Tracy basin, and on the west by the Clayton basin. The southern boundary extends inland from Suisun Bay one to three miles. Hydrographs created from the Department of Water Resources (DWR) well data in the Pittsburg Plain Groundwater Basin indicate that groundwater levels have remained fairly stable over the period of record, with the exception of static water level drops and subsequent recovery associated with the 1976 to 1977 and 1987 to 1992 drought periods.

The City published the Pittsburg Plain Groundwater Management Plan (GWMP) in October 2012. The GWMP was established to manage and protect groundwater resources within the City and the underlying groundwater basin. The primary objective the GWMP is to provide a long-term strategy to maintain the quality, reliability, and sustainability of groundwater resources within the Pittsburg

Plain Groundwater Basin. To accomplish this, the City manages groundwater conjunctively with its surface water resources and supports Basin Management Objectives directed toward the sustainability and optimal use of groundwater supplies.

The Pittsburg Plain Groundwater Basin has not been adjudicated. Hydrographs created from the DWR well data in the Pittsburg Plain Groundwater Basin indicate that groundwater levels have remained fairly stable over the period of record, with the exception of static water level drops and subsequent recovery associated with noted drought periods. According to DWR, and based on present groundwater conditions, it is not expected that overdraft conditions would occur in the Pittsburg Plain Groundwater Basin. As such, the Pittsburg Plain Groundwater Basin is not listed as a critically overdrafted groundwater basin by DWR.

The City is located within the Contra Costa Water District (CCWD) service area and obtained approximately 83 percent of its water supply wholesale from CCWD during 2020. CCWD provides untreated surface water, pumped from the Delta and delivered through the Contra Costa Canal. The remainder of the City's water supply is obtained from two groundwater wells located within the City boundaries. These relatively shallow wells (approximately 200 feet deep) deliver approximately 600 (Rossmoor) and 1,200 (Bodega) gallons of water per minute (gpm), respectively. The total amount of groundwater pumped by the City from the Pittsburg Plain Groundwater Basin in 2020 was 1,480 acre-feet per year (AFY).

FLOODPLAIN MAPPING

FEMA Flood Zones

Federal Emergency Management Agency (FEMA) mapping provides important guidance to the City in planning for flooding events and regulating development within identified flood hazard areas. FEMA's National Flood Insurance Program (NFIP) is intended to encourage state and local governments to adopt responsible floodplain management programs and flood measures. As part of the program, NFIP defines floodplain and floodway boundaries that are shown on Flood Insurance Rate Maps (FIRMs). The FEMA FIRM for the Plan Area is shown on Figure 3.8-2.

Areas that are subject to flooding are indicated by a series of alphabetical symbols, indicating anticipated exposure to flood events:

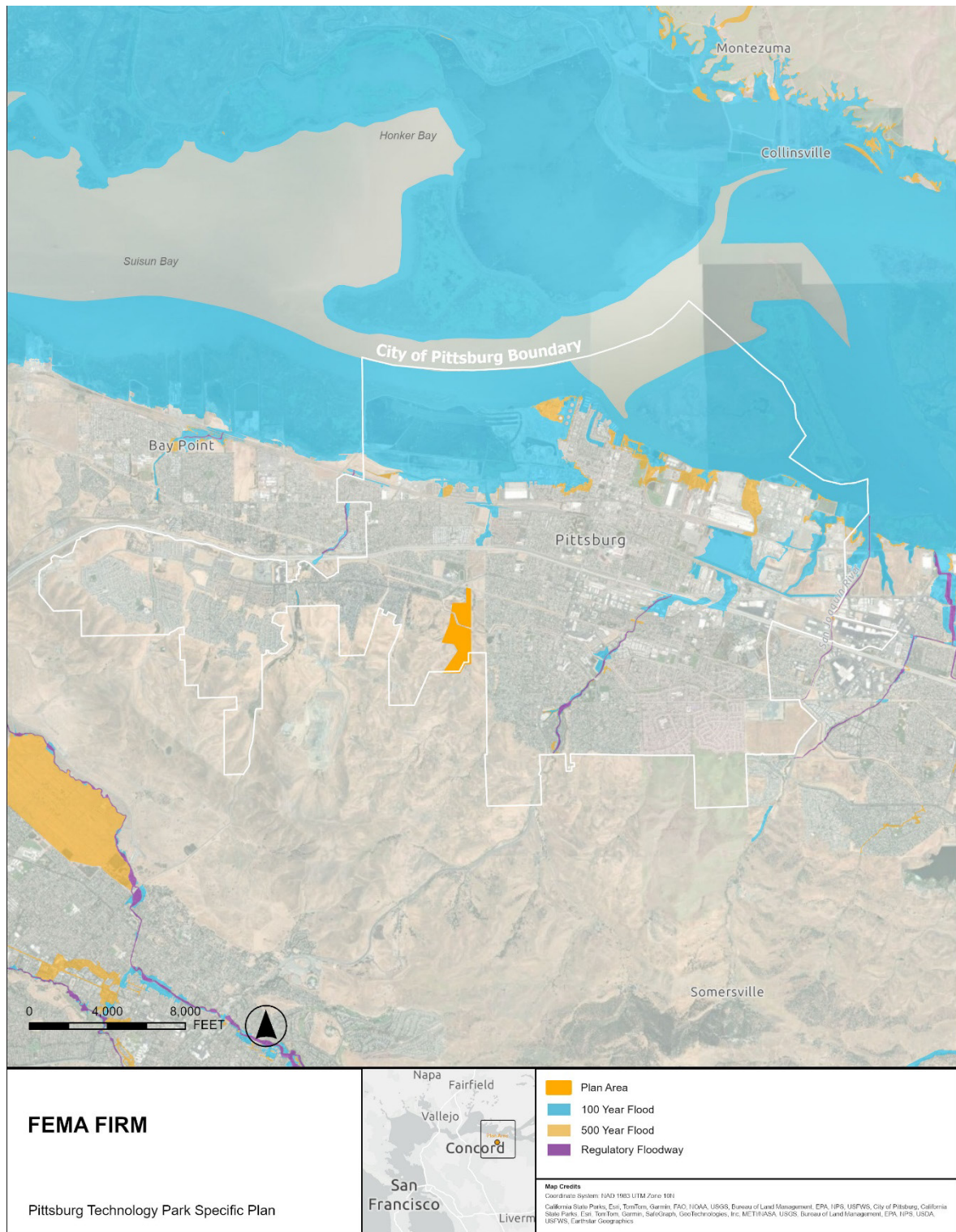
- **Zone A:** Subject to 100-year flooding with no base flood elevation determined. Identified as an area that has a one percent chance of being flooded in any given year.
- **Zone AE:** Subject to 100-year flooding with base flood elevations determined.
- **Zone AH:** Subject to 100-year flooding with flood depths between one and three feet being areas of ponding with base flood elevations determined.
- **500-year Flood Zone:** Subject to 500-year flooding. Identified as an area that has a 0.2 percent chance of being flooded in a given year.

The 100-year floodplain is largely confined to the northern portion of the City limits and the creeks traveling downslope from Mt. Diablo. Similarly, the 500-year floodplain is located along a section of

3.8 HYDROLOGY AND WATER QUALITY

Kirker Creek, which travels downslope from Mt. Diablo and along the border with the tidal marsh zone in the northern portion of the City limits.

The primary flood hazard within the Plan Area is the Contra Costa Canal running from north to south directly through the Plan Area as well as seasonal wetlands and the natural swales and stream courses that run within and along the edge of the Plan Area. However, because the Plan Area lies in the central part of the city, beyond the aforementioned flood zones, it is situated in an area with minimal flood risk as shown in Figure 3.8-1.

FIGURE 3.8-1. FEMA FLOOD INSURANCE RATE MAP

Dam Inundation

Dam failure can occur under three general conditions: as a result of an earthquake, an isolated incident due to structural instability, or because of intense rain in excess of design capacity. Earthquakes centered close to a dam are typically the most likely cause of dam failure. Dam inundation maps have been required in California since 1972, following the 1971 San Fernando Earthquake and near failure of the Lower Van Norman Dam. The closest dam to the Plan Area is the New Melones Dam, approximately 75 miles to the east. Additionally, the Mallard Reservoir and the Antioch Reservoir are approximately seven miles west and 5.9 miles southeast of the Plan Area, respectively. However, the Plan Area is approximately 0.90 mile south of the dam inundation area. Therefore, the Plan Area is not at risk for dam inundation.

WATER QUALITY

Surface water quality is affected by point source and non-point source pollutants. Point source pollutants are those emitted at a specific point, such as a pipe, while non-point source pollutants are typically generated by surface runoff from diffuse sources, such as streets, paved areas, and landscaped areas. Point source pollutants are controlled with pollutant discharge regulations or waste discharge requirements. Non-point source pollutants are more difficult to monitor and control, although they are important contributors to surface water quality in urban areas.

Stormwater runoff pollutants vary based on land use, topography, the amount of impervious surface, and the amount and frequency of rainfall and irrigation practices. Runoff in developed areas typically contains oil, grease, and metals accumulated in streets, driveways, parking lots, and rooftops, as well as pesticides, herbicides, particulate matter, nutrients, animal waste, and other oxygen-demanding substances from landscaped areas. The highest pollutant concentrations usually occur at the beginning of the wet season during the “first flush.”

Water quality within the Plan Area is governed by the San Francisco Bay Regional Water Quality Control Board (RWQCB), which sets water quality standards in their Water Quality Control Plans for the respective basins. Basin Plans identifies beneficial uses for surface water and groundwater and establishes water quality objectives to attain those beneficial uses.

The Clean Water Act (CWA) 303(d) list is a register of impaired and threatened waters which the CWA requires all states to submit for U.S. Environmental Protection Agency (USEPA) approval. The list identifies all waters where the required pollution control measures have so far been unsuccessful in reaching or maintaining the required water quality standards. Waters that are listed are known as “impaired.”

Suisun Bay is listed by the San Francisco Bay RWQCB as having limited water quality, as required by CWA Section 303(d). Suisun Bay is listed as containing 27,498 acres of polluted water surface and having water quality issues related to the following compounds and conditions:

- Chlordane;
- Dichlorodiphenyltrichloroethane (DDT);

- Dieldrin;
- Dioxin Compounds;
- Furan Compounds;
- Invasive Species;
- Mercury
- PCBs (both standard and dioxin-like); and
- Selenium.

Kirker Creek is also listed on the CWA Section 303(d) list for trash, toxicity, and pyrethroids.

3.8.2 REGULATORY SETTING

There are a number of regulatory agencies whose responsibility includes the oversight of the water resources of the state and nation including FEMA, the USEPA, the State Water Resources Control Board (SWRCB), the U.S. Army Corps of Engineers (USACE), and the RWQCB. The following is an overview of the federal, state, and local regulations that are applicable to the proposed project.

FEDERAL

Clean Water Act

The CWA (33 United States Code [U.S.C.] Section 1251 et seq.), formerly the Federal Water Pollution Control Act of 1972, was enacted with the intent of restoring and maintaining the chemical, physical, and biological integrity of the waters of the United States. The CWA required states to set standards to protect, maintain, and restore water quality through the regulation of point source and certain nonpoint source discharges to surface water. Those discharges are regulated by the National Pollutant Discharge Elimination System (NPDES) permit process (CWA Section 402). In California, NPDES permitting authority is delegated to, and administered by, the nine RWQCBs. The Plan Area is within the San Francisco Bay RWQCB. Projects that disturb one or more acres, including the proposed project, are required to obtain NPDES coverage under construction general permits.

Section 401, Water Quality Certification

Section 401 of the CWA requires that, prior to issuance of any federal permit or license, any activity (including river or stream crossing during road, pipeline, or transmission line construction) which may result in discharges into waters of the United States must be certified by the state, as administered by the RWQCB. This certification ensures that the proposed activity does not violate state and/or federal water quality standards.

Section 402. National Pollutant Discharge Elimination System

Section 402 of the CWA authorizes the State Water Resources Control Board (SWRCB) to issue a NPDES General Construction Storm Water Permit (Water Quality Order 2009-0009-DWQ), referred to as the “General Construction Permit.” Construction activities can comply with and be covered under the General Construction Permit provided that they meet the following criteria:

- Develop and implement a Storm Water Pollution Prevention Plan (SWPPP) which specifies best management practices (BMPs) that will prevent all construction pollutants

from contacting stormwater and intend to keep all products of erosion from moving off-site into receiving waters.

- Eliminate or reduce non-stormwater discharges to storm sewer systems and other waters of the United States.
- Perform inspections of all BMPs.

Section 303, Water Quality Standards and Implementation Plans

Section 303(d) of the CWA (33 U.S. Code 1250, et seq., at 1313(d)) requires states to identify “impaired” water bodies as those which do not meet water quality standards. States are required to compile this information in a list and submit the list to the U.S. EPA for review and approval. This list is known as the Section 303(d) list of impaired waters. As part of this listing process, states are required to prioritize waters and watersheds for future development of total maximum daily loads (TMDL) requirements. The SWRCB and RWQCBs have ongoing efforts to monitor and assess water quality, to prepare the Section 303(d) list, and to develop TMDL requirements.

The Safe Drinking Water Act of 1974 (42 U.S.C. §300f et seq.)

The Safe Drinking Water Act (SDWA) was originally passed by Congress in 1974 to protect public health by regulating the nation’s public drinking water supply. The law was amended in 1986 and 1996 and requires many actions to protect all waters actually or potentially designed for drinking use, whether from aboveground or underground sources, including rivers, lakes, reservoirs, springs, and groundwater wells (USEPA 2024). The SDWA authorizes the EPA to set national health-based standards for drinking water to protect against both naturally occurring and man-made contaminants that may be found in drinking water.

Federal Emergency Management Agency

FEMA is responsible for managing the National Flood Insurance Program (NFIP), which makes federally backed flood insurance available for communities that agree to adopt and enforce floodplain management ordinances to reduce future flood damage. The NFIP, established in 1968 under the National Flood Insurance Act, requires that participating communities adopt certain minimum floodplain management standards, including restrictions on new development in designated floodways, a requirement that new structures in the 100-year flood zone be elevated to or above the 100-year flood level (known as base flood elevation), and a requirement that subdivisions be designed to minimize exposure to flood hazards.

To facilitate identifying areas with flood potential, FEMA has developed Flood Insurance Rate Maps (FIRMs) that can be used for planning purposes, including floodplain management, flood insurance, and enforcement of mandatory flood insurance purchase requirements.

STATE

California Water Code

The CWA places the primary responsibility for the control of surface water pollution and for planning the development and use of water resources with the states, although this does establish certain

guidelines for the states to follow in developing their programs and allows the USEPA to withdraw control from states with inadequate implementation mechanisms.

California's primary statute governing water quality and water pollution issues with respect to both surface waters and groundwater is the Porter-Cologne Water Quality Control Act (Porter-Cologne Act) of 1970 (Division 7 of the California Water Code) (Porter-Cologne Act). The Porter-Cologne Act grants the SWRCB and each of the RWQCBs power to protect water quality and is the primary vehicle for implementation of California's responsibilities under the CWA. The Porter-Cologne Act grants the SWRCB and the RWQCBs authority and responsibility to adopt plans and policies, to regulate discharges to surface and groundwater, to regulate waste disposal sites and to require cleanup of discharges of hazardous materials and other pollutants. The Porter-Cologne Act also establishes reporting requirements for unintended discharges of any hazardous substance, sewage, or oil or petroleum product.

Each RWQCB must formulate and adopt a water quality control plan (Basin Plan) for its region, and the regional plans are to conform to the policies set forth in the Porter-Cologne Act and established by the SWRCB in its state water policy. The Porter-Cologne Act also provides that a RWQCB may include within its regional plan water discharge prohibitions applicable to particular conditions, areas, or types of waste.

Water Code Section 13260 requires all dischargers of waste that may affect water quality in waters of the state to prepare and provide a water quality discharge report to the RWQCB. Section 13260a-c is as follows:

- (a) Each of the following persons shall file with the appropriate regional board a report of the discharge, containing the information that may be required by the regional board:
 - (1) A person discharging waste, or proposing to discharge waste, within any region that could affect the quality of the waters of the state, other than into a community sewer system.
 - (2) A person who is a citizen, domiciliary, or political agency or entity of this state discharging waste, or proposing to discharge waste, outside the boundaries of the state in a manner that could affect the quality of the waters of the state within any region.
 - (3) A person operating, or proposing to construct, an injection well.
- (b) No report of waste discharge need be filed pursuant to subdivision (a) if the requirement is waived pursuant to Section 13269.
- I Each person subject to subdivision (a) shall file with the appropriate regional board a report of waste discharge relative to any material change or proposed change in the character, location, or volume of the discharge.

Department of Water Resources

The major responsibilities of the California DWR include preparing and updating the California Water Plan to guide development and management of the state's water resources; planning, designing, constructing, operating, and maintaining the State Water Resources Development System; regulating dams; providing flood protection; assisting in emergency management to safeguard life

and property; educating the public; and serving local water needs by providing technical assistance. In addition, the DWR cooperates with local agencies on water resources investigations, supports watershed and river restoration programs, encourages water conservation, explores conjunctive use of ground and surface water, facilitates voluntary water transfers, and, when needed, operates a state drought water bank.

Porter-Cologne Water Quality Control Act (California Water Code §13000 et seq.)

The Porter-Cologne Water Quality Control Act (Porter-Cologne Act) (Water Code Sections 13000 et seq.), passed in 1969, is the primary statute covering the quality of waters in California and requires protection of water quality by appropriate designing, sizing, and construction of erosion and sediment controls. The Porter-Cologne Act established the SWRCB and divided California into nine regions, each overseen by an RWQCB. The SWRCB is the primary State agency responsible for protecting the quality of the State's surface and groundwater supplies and has delegated primary implementation authority to the nine RWQCBs. The Porter-Cologne Act assigns responsibility for implementing the CWA Sections 401 through 402 and 303(d) to the SWRCB and the nine RWQCBs. The Porter-Cologne Act requires the development and periodic review of water quality control plans (basin plans) that designate beneficial uses of California's major rivers and groundwater basins and establish narrative and numerical water quality objectives for those waters, provide the technical basis for determining waste discharge requirements, identify enforcement actions, and evaluate clean water grant proposals. The basin plans are updated every three years. Compliance with basin plans is primarily achieved through implementation of the NPDES, which regulates waste discharges as previously discussed. The Porter-Cologne Water Quality Control Act requires that any person discharging waste or proposing to discharge waste within any region, other than to a community sewer system, which could affect the quality of the "waters of the State" file a report of waste discharge. Absent a potential effect on the quality of "waters of the State," no notification is required. However, the RWQCB encourages implementation of BMPs similar to those required for NPDES stormwater permits to protect the water quality objectives and beneficial uses of local surface waters.

Water Quality Control Plan for the San Francisco Bay Region

The Water Quality Control Plan for the San Francisco Bay Region (San Francisco Bay Region Basin Plan) includes a summary of beneficial water uses, water quality objectives needed to protect the identified beneficial uses, and implementation measures. The Basin Plan establishes water quality standards for all the ground and surface waters of the region. The term "water quality standards," as used in the CWA, includes both the beneficial uses of specific water bodies and the levels of quality that must be met and maintained to protect those uses. The Basin Plan includes an implementation plan describing the actions by the RWQCB and others that are necessary to achieve and maintain the water quality standards.

The RWQCB regulates waste discharges to minimize and control their effects on the quality of the region's ground and surface water. Permits are issued under a number of programs and authorities. The terms and conditions of these discharge permits are enforced through a variety of technical, administrative, and legal means. Water quality problems in the region are listed in the Basin Plan,

along with the causes, where they are known. For water bodies with quality below the levels necessary to allow all the beneficial uses of the water to be met, plans for improving water quality are included. The Basin Plan reflects, incorporates, and implements applicable portions of a number of national and statewide water quality plans and policies, including the California Water Code and THE CWA.

Urban Water Management Planning Act

The Urban Water Management Planning Act has as its objectives the management of urban water demands and the efficient use of urban water. Under its provisions, every urban water supplier is required to prepare and adopt an urban water management plan. An “urban water supplier” is a public or private water supplier that provides water for municipal purposes either directly or indirectly to more than 3,000 customers or supplying more than 3,000 AFY. The plan must identify and quantify the existing and planned sources of water available to the supplier, quantify the projected water use for a period of 20 years, and describe the supplier’s water demand management measures. The urban water supplier should make every effort to ensure the appropriate level of reliability in its water service sufficient to meet the needs of its various categories of customers during normal, dry, and multiple dry years. The DWR must receive a copy of an adopted urban water management plan.

State Water Resources Control Board Storm Water Strategy

The Storm Water Strategy is founded on the results of the Storm Water Strategic Initiative, which served to direct the SWRCB’s role in storm water resources management and evolve the Storm Water Program by a) developing guiding principles to serve as the foundation of the storm water program, b) identifying issues that support or inhibit the program from aligning with the guiding principles, and c) proposing and prioritizing projects that the Water Boards could implement to address those issues.

SWRCB staff created a strategy-based document called the Strategy to Optimize Management of Storm Water (STORMS). STORMS includes a program vision, missions, goals, objectives, projects, timelines, and consideration of the most effective integration of project outcomes into the SWRCB’s Storm Water Program.

California Fish and Wildlife Code

The California Department of Fish and Wildlife (CDFW) protects streams, water bodies, and riparian corridors through the streambed alteration agreement process under Section 1600 to 1616 of the California Fish and Game Code. The California Fish and Game Code establishes that “an entity may not substantially divert or obstruct the natural flow or substantially change the bed, channel or bank of any river, stream or lake, or deposit or dispose of debris, waste, or other material containing crumbled, flaked, or ground pavement where it may pass into any river stream, or lake” (Fish and Game Code Section 1602(a)) without notifying the CDFW, incorporating necessary mitigation and obtaining a streambed alteration agreement. The CDFW’s jurisdiction extends to the top of banks and often includes the outer edge of riparian vegetation canopy cover.

California Department of Health Services

The Department of Health Services, Division of Drinking Water and Environmental Management, oversees the Drinking Water Program. The Drinking Water Program regulates public water systems and certifies drinking water treatment and distribution operators. It provides support for small water systems and for improving their technical, managerial, and financial capacity. It provides subsidized funding for water system improvements under the State Revolving Fund and Proposition 50 programs. The Drinking Water Program also oversees water recycling projects, permits water treatment devices, supports and promotes water system security, and oversees the Drinking Water Treatment and Research Fund for Methyl Tertiary Butyl Ether (MTBE) and other oxygenates.

LOCAL

Regional Landscape Water Conservation Ordinance

The Contra Costa Water District and local planning agencies worked together to develop a Regional Landscape Water Conservation Ordinance (Regional Ordinance) to comply with the state mandate (AB 1881). The Regional Ordinance is designed to both meet the state's water conservation goals and to be uncomplicated for planning staff to review and administer.

Contra Costa Clean Water Program

To comply with the CWA, Contra Costa County, its 19 incorporated Cities and the CCCFCWCD have joined together to form the Contra Costa Clean Water Program (CCCWP). The CCCWP strives to eliminate stormwater pollution through public education, inspection and enforcement activities, and industrial outreach. The CCCWP is dedicated to maintaining a healthy environment in Contra Costa's creeks, rivers, the Delta, and the San Francisco Bay.

Contra Costa Clean Water Program Stormwater C.3 Guidebook

The 9th Edition of the CCCWP Stormwater C.3 Guidebook (2024) helps to ensure that applicable projects comply with the C.3 requirements in the California RWQCBs' Municipal Regional Permit. The Guidebook provides detailed information about how to prepare a Stormwater Control Plan. In addition, there are two Guidebook Addendums, "Contra Costa Clean Water Program Technical Criteria for Non-LID Facilities" and "Preparing a Stormwater Control Plan for a Small Land Development Project".

California Stormwater Quality Association (CASQA), BMP Handbook

CASQA publishes BMP Handbooks to provide guidance and support for compliance with several types of stormwater permits. The Construction BMP Handbook provides practical and industry leading resources to support implementation of the Construction General Permit (CGP) issued by the SWRCB. The handbook includes SWPPP templates for traditional projects and linear underground projects (LUP), BMP Fact Sheets for erosion and sediment control, non-stormwater management and material management, and guidance on selection of slope stabilization techniques.

San Francisco Bay Region Municipal Regional Stormwater NPDES Permit Order No. R2-2022-0018 NPDES Permit No. CAS612008

In response to the CWA, the Contra Costa Clean Water Program regulates waste dischargers under a NPDES Permit administered by the San Francisco RWQCB (Region 2). Specifically, the municipalities are regulated with regard to their jurisdiction over and/or maintenance responsibility for municipal storm drain systems and watercourses that they own or operate. The NPDES Permit is concerned primarily with regulating trash, pollutants of concern, and excessive hydrologic runoff which can carry sediment and cause flooding.

City of Pittsburg 2040 General Plan**Community Facilities Element**

Policy: 12-P-1.6: Consider the effect of incremental increases in the demands on groundwater supply and water quality when reviewing development applications.

Policy: 12-P-3.5: Maintain the ability to handle peak discharge flow while meeting State Regional Water Quality Control Board Standards as established in the current NPDES Permit.

Resource Conservation & Open Space Element

Policy: 10-P-3.1: Require development to use best management practices (BMPs) to minimize the runoff and erosion caused by earth movement.

Policy: 10-P-4.2: Protect the water availability and quality of the San Joaquin River Delta for beneficial uses and habitat protection.

Policy: 10-P-4.3: Comply with Regional Water Quality Control Board regulations and standards to maintain and improve the quality of both surface water and groundwater resources.

Policy: 10-P-4.4: Address soil and groundwater pollution during development, redevelopment, and reuse projects.

Policy: 10-P-4.5: Reduce sedimentation and erosion of waterways by minimizing site disturbance and vegetation removal.

Policy: 10-P-4.6: Encourage rehabilitation and revegetation of riparian corridors and wetlands throughout the City to contribute to bioremediation and improved water quality.

Policy: 10-P-4.7: Monitor water quality in the local creek and reservoir system to ensure clean supplies for human consumption and ecosystem health.

Policy: 10-P-4.8: Protect water quality by reducing non-point sources of pollution and the dumping of debris in and near creeks, storm drains, and Contra Costa Canal. All drainage from new development should either be directed to an appropriate storm drain system that avoids CCWD facilities and Contra Costa Canal right-of-way, or obtain an encroachment permit from CCWD consistent with Action 10-A-2.h.

3.8 HYDROLOGY AND WATER QUALITY

Policy: 10-P-4.9: Require projects to comply with best management practices for development and construction on sites where the erosion potential is moderate to severe or which may affect riparian areas, which may include:

- Use of bench terraces where areas of long slopes may create a stormwater gradient flow;
- Construction of berms between any riparian corridor and the construction site to preclude sediment in stormwaters and sheet-floods from entering riparian zones; and
- Completing the storm drainage system in the early phase of construction to manage stormwater runoff during construction.

Policy: 10-P-4.10: Continue use and implementation of the City's storm drain marking program in newly developed or redeveloped areas.

Policy: 10-P-4.11: Encourage groundwater recharge through water management strategies, including reducing urban runoff through low impact development designed to conserve natural resources and facilitate groundwater recharge.

Action 10-A-2.h: Require an encroachment permit from Contra Costa Water District (CCWD) for any storm drain facility or increase in runoff, as determined by a hydrological study, that will add load to existing facilities crossing or encroaching onto Contra Costa Canal rights-of-way.

Action 10-A-4.i: As part of the development review process, require new development to identify and implement BMPs to minimize creek bank instability, runoff of construction sediment, and flooding.

Safety & Resiliency Element

Policy: 11-P-3.1: Reduce the risk of loss of life, personal injury, and property damage resulting from flooding by properly maintaining storm drainage systems, natural flood control channels, and waterways and regulating runoff from new construction and development projects.

Policy: 11-P-3.4: Ensure that development projects mitigate impacts to the City's storm drainage capacity from storm water runoff occurring from the property. Project applicants shall demonstrate that projects implement Best Management Practices (BMPs) and Low Impact Development measures (LID) to treat stormwater before discharge from the site project and that project implementation would not result in increases in the peak flow runoff to adjacent lands or drainage facilities that would exceed the design capacity of the drainage facility or result in an increased potential for off-site flooding.

Policy: 11-P-3.5: Assure through the Master Drainage Plan and development ordinances that proposed new development adequately provides for on-site and downstream mitigation of potential flood hazards.

Policy: 11-P-3.7: Ensure that new developments comply with all applicable requirements of Municipal Code Chapter 15.-0 - Floodplain Management, the California Building Code as adopted by the City, and the latest promulgated FEMA standards for development in the flood hazard areas.

Community Facilities

Goal-12-7: Ensure the development of public infrastructure for energy, telecommunications, and other utilities meets the long-term needs of the community and ensure infrastructure is available at the time such facilities are needed.

Policy 12-P-7.1: Require all development projects to demonstrate how storm water runoff will be detained or retained on-site and/or conveyed to the nearest drainage facility as part of the development review process, including consideration of the near-term and cumulative capacity of the system serving the drainage area, and as required by the City's NPDES Municipal Regional Permit. Project applicants shall mitigate any drainage impacts as necessary and shall demonstrate that the project will not result in any increase in off-site runoff during rain and flood events.

Policy 12-P-7.2: Assure through the City standards, including the Master Drainage Plan and development ordinances, that proposed new development (residential, commercial, or industrial) adequately provides for on-site and downstream mitigation of potential flood hazards, including construction of required drainage improvements.

Policy 12-P-7.3: Ensure adequate minimum setbacks to reduce potential for property damage from storm flooding.

Policy 12-P-7.4: Reduce the risk of localized and downstream flooding and runoff through the use best management practices to minimize runoff from the site to the storm drainage system, including:

- High infiltration measures, including the maximization of permeable landscape,
- Using permeable surfaces for parking lots, sidewalks, and bike paths,
- Where feasible, using roof runoff as irrigation.

Policy 12-P-7.5: During the review of development plans, require all commercial projects to construct on-site retention facilities. Such facilities could be in the form of landscape features or underground swells.

Policy 12-P-7.6: Allow the construction of detention basins as mitigation in new developments. Ensure that detention basins located in residential neighborhoods, schools, or child-care facilities are surrounded by a gated enclosure, or protected by other safety measures.

Action 12-A-7.a: As part of project review and CEQA documentation, require an assessment of downstream drainage (creeks and channels) and City storm-water facilities impacted by potential project runoff and require development to include measures, including on-site improvements, to ensure that off-site runoff is not increased during rain and flood events.

City of Pittsburg Municipal Code

Chapter 13.28 (Stormwater Management and Discharge Control) of the City of Pittsburg Municipal Code (PMC) addresses stormwater and water quality. In compliance with the City's National Pollutant Elimination System (NPDES) permit, and consistent with the Porter-Cologne Water Quality Control Act, and the Federal Clean Water Act, the intent of this chapter is to protect and enhance the water quality in the City of Pittsburg's watercourses. In addition, this chapter also requires projects to prepare a stormwater control plan and construct and implement stormwater management and discharge control measures and comply with best management practices during project construction and operation. The best management practices and standards address litter, sidewalks, maintenance of facilities and landscaped areas, and parking lots. They also note that all construction projects shall incorporate site-specific BMPs, which can be a combination of BMPs from the California BMP Handbook, Construction, January 2003, the Caltrans Stormwater Quality Handbooks, Construction Site Best Management Practices Manual, March 2003, the San Francisco Bay Regional Water Quality Control Board Erosion and Sediment Control Field Manual 2002, the city's grading and erosion control ordinance and other generally accepted engineering practices for erosion control as required by the director. It is noted that each new development project subject to the development runoff requirements will submit a stormwater control plan and implement conditions of approval that reduce stormwater pollutant discharges through the construction, operation and maintenance of treatment measures and other appropriate source control and site design measures. Projects must develop and implement a stormwater pollution prevention plan, which must include an employee training program.

Chapter 15.88 (Grading, Erosion and Sediment Control) of the PMC addresses grading, cut and fill operations, water runoff and soil erosion. It is the intent of this chapter to promote the conservation of natural resources, including the natural beauties of the land, streams and watersheds, hills and vegetation; to protect public health and safety, including the reduction or elimination of the hazards of earth slides, mud flows, rock falls, undue settlement, erosion, siltation and flooding, or other special conditions as described in Government Code Section 54460(b). This chapter requires that a permit first be obtained before a person may grade, fill, excavate or store or dispose of soil and earth materials or perform any other land-disturbing or land-filling activity. As part of the application, a Grading Plan, Erosion and Sediment Control Plan, and Soils and Engineering Geology Report must also be prepared and submitted.

3.8.3 METHODOLOGY AND THRESHOLDS OF SIGNIFICANCE

METHODOLOGY

This section analyzes impacts on hydrology and water quality from the implementation of the proposed project based on changes to the environmental setting as described above, identifies drainage conditions in the Plan Area, and the current regulatory framework. The proposed project's potential impacts to hydrology and water quality have been evaluated using available online resources, published documents, the 2040 General Plan, and professional judgment. Impacts were analyzed according to CEQA significance criteria described below.

THRESHOLDS OF SIGNIFICANCE

Consistent with Appendix G of the CEQA Guidelines, the proposed project would have a significant impact on the environment associated with hydrology and water quality if it would:

- Violate any water quality standards or waste discharge requirements or otherwise substantially degrade surface or ground water quality.
- Substantially decrease groundwater supplies or interfere substantially with groundwater recharge such that the project may impede sustainable groundwater management of the basin.
- Substantially alter the existing drainage pattern of the site or area, including through the alteration of the course of a stream or river, or through the addition of impervious surfaces, in a manner which would:
 - result in a substantial erosion or siltation on –or off-site;
 - substantially increase the rate of amount of surface runoff in a manner which would result in flooding on-or offsite;
 - create or contribute runoff water which would exceed the capacity of existing or planned stormwater drainage systems or provide substantial additional sources of polluted runoff; or
 - impede or redirect flood flows.
- Result in a flood hazard, tsunami, seiche zones, risk release of pollutants due to project inundation.
- Conflict with or obstruct implementation of a water quality control plan or sustainable groundwater management plan.

3.8.4 IMPACTS AND MITIGATION

Impact 3.8-1: Violate water quality standards or waste discharge requirements or otherwise substantially degrade water quality or obstruct implementation of a water quality control plan (Less than Significant)

Water quality standards and waste discharge requirements could be violated if any future development projects within the Plan Area release polluted discharges into receiving waters without a permit. Polluted discharges can generate polluted stormwater runoff (i.e., water generated during storm events) or dry weather runoff (i.e., water generated during activities such as dust control). Polluted discharge can consist of sediment from erosion, pollutants from herbicides or pesticides applied to agricultural lands or vegetation, or pollutants from construction equipment, such as oil drippings or accidental spills of petroleum hydrocarbons.

CONSTRUCTION-RELATED WATER QUALITY IMPACTS

Grading, excavation, removal of vegetation cover, and loading activities associated with future construction could temporarily increase runoff, erosion, and sedimentation. Construction activities also could result in soil compaction and wind erosion impacts that could adversely affect soils and reduce the revegetation potential at construction sites and staging areas.

As required by the CWA, each future development project or improvement project will require an approved Storm Water Pollution Prevention Plan (SWPPP) that includes best management practices for grading and preservation of topsoil. A SWPPP is not required if the project will disturb less than one acre. SWPPPs are designed to control storm water quality degradation to the extent practicable using best management practices during and after construction.

Applicants of future development projects must submit the SWPPP with a Notice of Intent to the State Water Resources Control Board (SWRCB) to obtain a Construction General Permit. The SWRCB is the agency responsible for reviewing the SWPPP and the Notice of Intent, prior to issuance of a Construction General Permit for the discharge of storm water during construction activities. The SWRCB accepts Construction General Permit applications (with the SWPPP and Notice of Intent) after specific projects have been approved by the lead agency. The lead agency for each specific project that disturbs one acre or more is required to obtain a Construction General Permit for discharge of storm water during construction activities prior to commencing construction (per the CWA). Furthermore, future development projects would be required to adhere to the 2040 General Plan Policy 12-P-7.1, which requires development projects to demonstrate how storm water runoff will be detained or retained on-site and/or conveyed to the nearest drainage facility to ensure no increase in off-site runoff will occur during rain and flood events.

The proposed Specific Plan sets policies and actions for future development in the Plan Area, but it does not envision or authorize any specific development project. Because of this, the site-specific details of potential future development projects are currently unknown and analysis of potential impacts of such projects is not feasible and would be speculative. However, each future development project must include detailed project-specific drainage plans that control storm water runoff and erosion, both during and after construction. The SWRCB requires a project-specific SWPPP to be prepared for each future project that disturbs an area one acre or larger. The SWPPPs will include project-specific BMPs that are designed to control drainage and erosion.

NEW DEVELOPMENT-RELATED WATER QUALITY IMPACTS

New development and infrastructure improvements projects within the Plan Area that would result from implementation of the proposed Specific Plan could introduce constituents into the storm water system that are typically associated with urban runoff. These constituents include sediments, petroleum hydrocarbons, pesticides, fertilizers, and heavy metals, such as lead, zinc, and copper. These pollutants tend to build up during the dry months of the year. Precipitation during the early portion of the wet season (generally from November to April) washes away most of these pollutants, resulting in high pollutant concentrations in the initial wet weather runoff. This initial runoff is referred to as the “first flush” of storm events. Subsequent periods of rain would result in less concentrated pollutant levels in the runoff.

Future development and infrastructure projects accommodated by the proposed Specific Plan also have the potential to result in increases in the amount of impervious surfaces within the Plan Area. Future increases in impervious surfaces would result in increased urban runoff, pollutants, and first flush roadway contaminants, as well as an increase in nutrients and other chemicals from

landscaped areas. These constituents could result in water quality impacts to onsite and offsite drainage flows to area waterways.

The storm drain facilities under the Contra Costa Canal also have the potential to become impaired, if sedimentation were to occur from new upstream development. Obstruction of storm drains could cause sedimentation and debris to enter the Contra Costa Canal right-of-way and potentially overtop into Contra Costa Canal and/or exert pressure and damage Contra Costa Canal's lining or other facilities. This could result in impacts to Contra Costa Water District's potable water supply.

Waters that are listed under CWA Section 303(d) are known as "impaired." Suisun Bay is listed by the San Francisco Bay RWQCB as having limited water quality, as required by the CWA Section 303(d). Suisun Bay is listed as containing 27,498 acres of polluted water surface. Kirker Creek is also listed on the Section 303(d) list for trash, toxicity, and pyrethroids.

Storm water runoff may play a role in the water quality impairments described above. Runoff that occurs as overland flow across yards, driveways, and public streets is intercepted by the storm water drainage system and conveyed to local drainages before eventually being routed to the Pacific Ocean. This storm water can carry pollutants that can enter the local waterways and result in the types of water quality impairments described above. Common sources of storm water pollution in the City include litter, trash, pet waste, paint residue, organic material (yard waste), fertilizers, pesticides, sediments, construction debris, metals from automobile brake pad dust, air pollutants that settle on the ground or attach to rainwater, cooking grease, illegally dumped motor oil, and other harmful fluids.

Future development and infrastructure projects allowed by the proposed Specific Plan could result in an increase in the overall volume of runoff in the Plan Area compared to existing conditions. If the Plan Area's drainage system is not adequately designed, buildout of future projects could result in localized higher peak flow rates. Localized increases in flow would be significant if increases exceeded system capacity or contributed to bank erosion. This is considered a potentially significant impact if not mitigated through compliance with existing mandatory federal, state, and local regulations, including Chapter 15.88 PMC (Grading, Erosion and Sediment Control).

The proposed Specific Plan establishes policies and actions for future development and buildout within the Plan Area, but it does not envision or authorize any specific development project. Because of this, the site-specific details of potential future development projects are currently unknown and analysis of potential impacts of such projects is not feasible and would be speculative. However, each future development and infrastructure project within the Plan Area is required to prepare a detailed project-specific drainage plan, Water Quality Management Plan, and a SWPPP that will control storm water runoff and erosion, both during and after construction. If a project involves the discharge into surface waters the project proponent will need to acquire a Dewatering permit, NPDES permit, and Waste Discharge permit from the RWQCB and comply with all storm water sewer system (MS4) requirements. Furthermore, future development projects would be required to adhere to the 2040 General Plan policies related to storm water runoff, including 12-P-7.1 through 12-P-7.6.

As described above, under the Regulatory Setting, the City is required to implement a range of measures and procedures when reviewing new development and infrastructure projects. These measures include but are not limited to the City's stormwater regulations set forth in the PMC, as well as the requirements set forth in the CCCWP Stormwater C.3 Guidebook, which intend to protect and enhance the water quality in the City of Pittsburg's watercourses pursuant to, and consistent with, the Porter-Cologne Act (Water Code Section 13000 et seq.) and the CWA (33 USC Section 1251 et seq.) Included among these measures are the implementation of a Stormwater Control Plan; outlined prohibited discharges to the City stormwater system; and BMPs and standards for any person owning or operating premises that may contribute pollutants to the City's stormwater system.

Compliance with existing City, County, and Contra Costa Clean Water Program (i.e., the C.3 Guidebook) construction and stormwater management codes would reduce the potential for impacts related to stormwater quality. In addition, prior to the issuance of grading permits, each site developed under the proposed 2040 General Plan would be required to submit a site-specific drainage study and SWPPP to the City for approval.

The primary regulatory mechanisms for ensuring that future development and infrastructure projects do not result in adverse water quality impacts are contained in Chapter 15.88 PMC, described above in Section 3.8.2, Regulatory Setting. The City has also adopted the 2040 General Plan, of which includes additional policies and actions listed above in Section 3.8.2, Regulatory Setting, that further reduce water pollution from construction, new development, and new infrastructure projects, and protects and enhances natural storm drainage and water quality features. The policies and actions identified above include numerous requirements that would reduce the potential for development accommodated by the proposed Specific Plan to result in increased water quality impacts. Actions by the City during the development review process require the review of development projects to identify potential stormwater and drainage impacts and require development to include measures to ensure that off-site runoff is not increased beyond pre-development levels during rain and flood events. In addition, compliance with the CWA and regulations enforced by the RWQCB would ensure that impacts to water quality are minimized and future projects comply with all applicable laws and regulations.

Provision of stormwater detention facilities as needed would reduce runoff rates and peak flows. Existing regulatory requirements that manage water quality include requirements to obtain approval from the RWQCB for NPDES permits, other discharge permits, WQMPs, SWPPPs, and to implement BMPs. These regulatory requirements are intended to ensure that water quality does not degrade to levels that would violate water quality standards.

Through implementation of the PMC requirements identified above, compliance with mandatory federal, state, and local regulations, and compliance with the existing regulations for the Kirker Creek-Frontal Suisun Bay Estuaries and Suisun Bay watershed, impacts to water quality and water quality would be mitigated to a **less than significant level**, and no mitigation is required.

Impact 3.8-2: Substantially decrease groundwater supplies or interfere substantially with groundwater recharge such that the project may impede sustainable groundwater management of the basin. (Less than Significant)

The Plan Area is located in the Pittsburg Plain Groundwater Basin, which is not adjudicated and is not listed as a critically overdrafted groundwater basin by DWR. The Pittsburg Plain Groundwater Basin is located in northern Contra Costa County along the south shore of Suisun Bay. Hydrographs created from the DWR Resources well data in the Pittsburg Plain Groundwater Basin indicate that groundwater levels have remained fairly stable over the period of record with the exception of static water level drops and subsequent recovery associated with the 1976 to 1977 and 1987 to 1992 drought periods. The depth to groundwater is generally greatest in summer months and shallowest in winter months.

As noted previously, the Pittsburg Plain GWMP (published in October 2012) was established to manage and protect groundwater resources within the City and the underlying groundwater basin. The City manages groundwater conjunctively with its surface water resources and supports Basin Management Objectives directed toward the sustainability and optimal use of groundwater supplies.

Potable water supply for the Plan Area would include surface water deliveries supplied by the CCWD, which makes up the vast majority of the City's supply, as well as groundwater supplies provided from two groundwater wells. The Pittsburg 2020 Urban Water Management Plan (UWMP) provides projected water demands for the City through the 2045 planning horizon. Water demand projections for buildout of the Plan Area relative to water supplies are summarized in Table 3.14-5 in Section 3.14, *Utilities and Service Systems*, where a conservative demand factor for commercial development (1700 gal/day/gross acre) was used for buildout of the Plan Area. The total water needed for future buildout of the Plan Area is expected to be 169.15 acre-feet/year (AFY).

Future development projects accommodated under the proposed Specific Plan could result in new impervious surfaces and reduce rainwater infiltration and groundwater recharge. The amount of new pavement and impervious surfaces, and the extent to which they affect infiltration, depends on the site-specific features and soil types of a given project site. Projects located in urban areas typically have less of an impact than projects converting open lands and spaces. Because the existing Plan Area of the proposed Specific Plan is an abandoned, open space golf course, future development under the proposed Specific Plan would result in increased areas of impervious surfaces, resulting in the need for additional or expanded stormwater drainage, conveyance, and retention infrastructure. The infrastructure and facilities necessary to serve new development would involve on-site improvements. The specific impacts of providing new and expanded drainage facilities cannot be determined at this time, as the proposed Specific Plan does not propose or approve any specific development project nor does it designate specific sites for new or expanded public facilities.

Groundwater recharge, stormwater drainage, and any necessary conveyance facilities would be evaluated at the project-level in association with subsequent development projects. As future development and infrastructure projects are considered, each project will be evaluated for

conformance with the General Plan, PMC, and other applicable regulations. Subsequent development and infrastructure projects would also be analyzed for potential environmental impacts, consistent with the requirements of CEQA. As such, this is a **less than significant** impact and no additional mitigation is required.

Impact 3.8-3: Substantially alter the existing drainage pattern of the site or area, including through the alteration of the course of a stream or river, or through the addition of impervious surfaces, in a manner which would:

I) RESULT IN A SUBSTANTIAL EROSION OR SILTATION ON OR OFFSITE;

The Plan Area is part of the former Delta View Golf Course and consists of rolling hills along the southern edge of the City. Elevations within the Plan Area range from approximately 68 feet to 290 feet above sea level, trending upward in elevation from the northeast to the southwest. Natural swales and stream courses run along the edge of the Plan Area, and two artificial ponds have been developed. Some of these ponds were developed entirely within uplands, while others are impoundments of natural drainages. Most runoff in the Plan Area is conveyed by existing channels within the Delta View Golf Course, tying into the public storm water infrastructure along Golf Course Road. Stormwater within the Plan Area drains to the northeast to a culvert at a low point on the eastern face. Stormwater collects and discharges to an undeveloped area east of the Plan Area.

Grading for future development projects and infrastructure within the Plan Area could result in changes to existing onsite drainage patterns and flowpaths as well as in alteration of surface topography via ground disturbance and project facilities. If future site and drainage plans are not properly designed, this could cause localized flooding during major events within the Plan Area, along the margins of the Plan Area, or in offsite downstream drainage areas. Any changes to water flows would have to be anticipated on a project-specific basis.

Development and projects accommodated under the proposed Specific Plan have the potential to impact the Plan Area's storm drainage system. Soil erosion and the loss of topsoil is one of the most common sources of polluted stormwater runoff during construction activities. The proposed Specific Plan would facilitate development projects that would involve some land clearing, grading, and other ground-disturbing activities that could temporarily increase soil erosion rates during and shortly after project construction.

As future development and infrastructure projects are considered, each project will be evaluated for conformance with the General Plan, PMC, and other applicable regulations. Subsequent development and infrastructure projects would also be analyzed for potential environmental impacts, consistent with the requirements of CEQA. As such, this is a **less than significant** impact and no additional mitigation is required.

II) SUBSTANTIALLY INCREASE THE RATE OF AMOUNT OF SURFACE RUNOFF IN A MANNER WHICH WOULD RESULT IN FLOODING ON-OR OFFSITE;

The rate and amount of surface runoff is determined by multiple factors, including topography, the amount and intensity of precipitation, the amount of evaporation that occurs in the watershed, and

the amount of precipitation and water that infiltrates to the groundwater. Future development projects would not alter the amount or intensity of precipitation. In addition, the Plan Area is located in an area designated by FEMA as Zone X, which is an area of minimal flood hazard.

Future development projects accommodated under the proposed Specific Plan could alter the topography or flow regime within portions of the Plan Area and potentially alter runoff patterns and concentrations during future activities. These effects will be evaluated on a project-specific basis. Future projects are expected to comply with design specifications and BMPs as required by applicable regulations and policies.

The City of Pittsburg is part of the Contra Costa Clean Water Program. The Contra Costa Permittees are currently subject to NPDES Permit No. CAS612008, issued by Order No. R2-2009-0074 on October 14, 2009, which pertains to stormwater runoff discharge from storm drains and watercourses within their jurisdictions. The NPDES Permit is concerned primarily with regulating trash, pollutants of concern, and excessive hydrologic runoff which can carry sediment and cause flooding.

Construction activities are regulated by the NPDES General Construction Storm Water Permit. Compliance with the storm water permit during construction activities requires the preparation of a SWPPP that contains BMPs to control the discharge of pollutants, including sediment, into local surface water drainages. Additionally, the City, in accordance with the C.3 requirements and Guidebook Addendums, must implement a stormwater control plan, Low Impact Development (LID) site design, and integrated stormwater management practices in new development and redevelopment.

As future development and infrastructure projects are considered, each project will be evaluated for conformance with the General Plan, PMC, and other applicable regulations. Subsequent development and infrastructure projects would also be analyzed for potential environmental impacts, consistent with the requirements of CEQA. As such, this is a **less than significant** impact and no additional mitigation is required.

III) CREATE OR CONTRIBUTE RUNOFF WATER WHICH WOULD EXCEED THE CAPACITY OF EXISTING OR PLANNED STORMWATER DRAINAGE SYSTEMS OR PROVIDE SUBSTANTIAL ADDITIONAL SOURCES OF POLLUTED RUNOFF; OR

Individual future projects accommodated by the proposed Specific Plan could create new impervious surfaces. This could result in an incremental reduction in the amount of natural soil surfaces available for infiltration of rainfall and runoff, potentially generating additional runoff during storm events. In addition, the potential increase in impervious surfaces, along with the increase in surface water runoff, could increase the non-point source discharge of pollutants. Anticipated runoff contaminants include sediment, pesticides, oil and grease, nutrients, metals, bacteria, and trash. Contributions of these contaminants to stormwater and non-stormwater runoff would degrade the quality of receiving waters. During the dry season, vehicles and other urban activities release contaminants onto the impervious surfaces, where they can accumulate until the first storm event. During this initial storm event, or first flush, the concentrated pollutants would be

3.8 HYDROLOGY AND WATER QUALITY

transported via runoff to stormwater drainage systems. Contaminated runoff waters could flow into the stormwater drainage systems that discharge into rivers, agricultural ditches, sloughs, and channels, and ultimately could degrade the water quality of any of these water bodies. Implementation of applicable General Plan policies and actions, as well as the PMC requirements, would ensure that the potential for impacts are reduced.

The proposed Specific Plan sets policies and actions for buildout of the Plan Area, but it does not envision or authorize any specific development project. Because of this, the site-specific details of potential future development projects are currently unknown and analysis of potential impacts of such projects is not feasible and would be speculative. Future project applicants are required to determine the extent of their project impacts that would require permitting from USACE, CDFW, and RWQCB. Each future development project must also include detailed project specific floodplain and drainage studies that assess the drainage characteristics and flood risks so that an appropriate storm drainage plan can be prepared to control storm water runoff, both during and after construction. The drainage plan will ultimately include project specific best management measures that are designed to allow for natural recharge and infiltration of stormwater. Construction of storm drainage improvements would occur as part of an overall development or infrastructure project and is considered in the environmental impacts associated with project construction and implementation, as addressed throughout this PEIR.

As future development and infrastructure projects are considered, each project will be evaluated for conformance with the General Plan, PMC, and other applicable regulations. Subsequent development and infrastructure projects would also be analyzed for potential environmental impacts, consistent with the requirements of CEQA. As such, this is a **less than significant** impact and no additional mitigation is required.

IV) IMPEDE OR REDIRECT FLOOD FLOWS.

According to the FEMA FIRM, the Plan Area is not located within a FEMA-designated 100-year flood zone. Future developments projects would include drainage plans that would further minimize the potential for increased flooding.

The City is responsible for maintaining the flood control system within the incorporated area. Provision of stormwater detention facilities as needed would reduce runoff rates and peak flows. The policies identified in the 2040 General Plan would further reduce flooding from new development, reduce storm water pollution from new development, and protect and enhance natural storm drainage and water quality features, which will in turn reduce water quality impacts.

Further, as described previously, existing regulatory requirements, including NPDES and Waste Discharge permits from the RWQCB and implementation of BMPs, manage water quality. Future development rendered through the proposed Specific Plan would be subject to the NPDES and other RWQCB requirements.

As future development and infrastructure projects are considered, each project will be evaluated for conformance with the General Plan, PMC, and other applicable regulations. Subsequent development and infrastructure projects would also be analyzed for potential environmental

impacts, consistent with the requirements of CEQA. As such, this is a **less than significant** impact and no additional mitigation is required.

Impact 3.8-4: Result in a flood hazard, tsunami, seiche zones, risk release of pollutants due to project inundation. (Less than Significant)

FLOOD HAZARD

As noted previously, the Plan Area is within an area of minimal flood hazard and is outside of the 100-year or 500-year FEMA flood zones or regulatory floodways. The 100-year floodplain is largely confined to the northern portion of the City limits and the creeks traveling downslope from Mt. Diablo. Similarly, the 500-year floodplain is located along a section of Kirker Creek, which travels downslope from Mt. Diablo, and along the border with the tidal marsh zone in the northern portion of the City limits. Because the Plan Area is located within the central portion of the City, the Plan Area is not at risk of flooding from regulatory floodways.

The proposed Specific Plan would allow development and improvement projects that would involve some land clearing, grading, and other ground-disturbing activities that could temporarily increase soil erosion rates during and shortly after project construction. As required by the CWA, each subsequent development project or improvement project will require an approved SWPPP that includes best management practices for grading and preservation of topsoil. SWPPPs are designed to control storm water quality degradation to the extent practicable using best management practices during and after construction.

As described previously in the Regulatory Setting, the City of Pittsburg regulates storm water discharge in accordance with the NPDES permit through Chapter 13.28 PMC, Stormwater Management and Discharge Control. Additionally, Chapter 15.80 PMC, Floodplain Management, applies to all areas of special flood hazards in the City. PMC Section 15.80.050 includes provisions for flood hazard reduction for construction in special flood hazard areas.

In addition to complying with the Municipal Regional Stormwater Permit and C.3 Guidebook stormwater requirements, the proposed Specific Plan would be required to follow policies outlined within the 2040 General Plan, which contains policies to reduce impacts associated with stormwater and drainage including policies to maintain storm drainage systems, improve flood management facilities, and other best practices in order to protect the community from flood hazards and minimize the discharge of materials into the storm drain system that are toxic. Implementation of the proposed Specific Plan would therefore result in a **less than significant** impact relative to this topic.

TSUNAMI AND SEICHES

Tsunamis and seiches are standing waves that occur in the ocean or relatively large, enclosed bodies of water that can follow seismic, landslide, and other events from local sources (California, Oregon, Washington coast) or distant sources (Pacific Rim, South American Coast, Alaska/Canadian coast).

Pittsburg is located adjacent to Suisun Bay and approximately 36 miles from the Pacific Ocean at an elevation of approximately 18 feet above mean sea level. Based on tsunami inundation maps prepared by the DOC, Cal OES, and California Geological Survey, the City is not identified as being within a tsunami inundation or run-up zone.

Seiches are typically caused when strong winds and rapid changes in atmospheric pressure push water from one end of a body of water to the other. When the wind stops, the water rebounds to the other side of the enclosed area. The water then continues to oscillate back and forth for hours or even days. In a similar fashion, earthquakes, tsunamis, or severe storms may also cause seiches along ocean shelves and ocean harbors, or other bodies large of water. Any body of water may experience limited oscillation during storm events or following seismic events; however, oscillation in small bodies of water is generally limited. In smaller water bodies seiches may have the potential to damage or overtop dams. Generally, in lakes the threat of large-scale damage from seiches comes from downstream flooding that would be caused by large volumes of water overtopping a dam or reservoir.

As described previously, the Plan Area is outside of any dam inundation area. Further, the City of Pittsburg is not within a tsunami hazard area and would not be subject to substantial flooding hazards or impacts from seiche events. Therefore, impacts would **less than significant**, and no mitigation is required.

Impact 3.8-5: Conflict with or obstruct implementation of a water quality control plan or sustainable groundwater management plan. (Less than Significant)

As previously discussed, the Plan Area is located within the San Francisco Bay RWQCB jurisdiction and is subject to the applicable requirements of the Basin Plan administered by the RWQCB in accordance with the Porter Cologne Water Quality Control Act. The City published the Pittsburg Plain GWMP in October 2012. The Pittsburg Plain Groundwater Basin has not been adjudicated. The City is located within the CCWD service area.

The proposed Specific Plan sets policies and actions for buildout of the Plan Area, but it does not envision or authorize any specific development project. Because of this, the site-specific details of potential future development projects are currently unknown and analysis of potential impacts of such projects is not feasible and would be speculative. As previously discussed, future development projects within the Plan Area are required to adhere to all applicable state, regional, and local regulatory framework which would ensure that surface and groundwater quality are not adversely impacted during construction. This includes adherence to Sections 401, 402, and 303 of the CWA; the California Water Code; the San Francisco Bay Region Basin Plan; the California Fish and Wildlife Code; the Regional Landscape Water Conservation Ordinance; the Contra Costa Clean Water Program Stormwater C.3 Guidebook; NPDES Permit Order No. R2-2019-0004 NPDES Permit No. CAS612008; the 2040 General Plan; and the PMC, as listed above in Section 3.8.2, *Regulatory Setting*. Additionally, future projects are required to implement BMP measures in order ensure that water quality is not impacted, including principles and techniques for basic siting and design considerations, construction phase strategies, and post construction property management practices.

As future development and infrastructure projects are considered, each project will be evaluated for conformance with applicable water quality control plans and sustainable groundwater management plans. Subsequent development and infrastructure projects would also be analyzed for potential environmental impacts, consistent with the requirements of CEQA. As such, this is a **less than significant** impact and no additional mitigation is required.

This section of the Program Environmental Impact Report (PEIR) identifies the existing land use conditions and analyzes the proposed project's consistency with relevant planning documents and policies adopted for the purpose of avoiding or mitigating an environmental effect and recommends mitigation measures to avoid or minimize the significance of potential environmental impacts.

3.9.1 ENVIRONMENTAL SETTING

EXISTING CONDITIONS

The City of Pittsburg is in eastern Contra Costa County and is bordered by Suisun Bay to the north and Solano County to the north, the City of Antioch and unincorporated Contra Costa County to the east, the City of Concord to the west, and unincorporated Contra Costa County to the south. See Figure 2.0-1, Regional Location Map, in Chapter 2.0, *Project Description*.

The City is well-connected within the Bay Area region with access to all modes of transportation, from regional rail services, airports, state routes and more, including Pittsburg/Bay Point Bay Area Rapid Transit (BART) and the extension of the East Contra Costa County BART services (known as "eBART"). SR-4 provides regional motor vehicle access to the other major cities and towns in the Bay Area. This part of the region is characterized by rolling hills and proximity to the San Francisco Bay and Sacramento River Delta.

Pittsburg's early growth centered around industrial development. The growth of the Bay Area has brought many changes to the Pittsburg region, including residential, commercial development and marina development. Pittsburg has grown outward from the downtown area since the 1990s. Residential development continues in the southwestern portion of the City, generally south of Leland Road. Infill commercial development continues to occur along SR-4. The expansion of BART to serve Pittsburg, with the Bay Point Station opening in 1996 and the Pittsburg Center station opening in 2018, has encouraged transit-oriented development, including new retail, commercial offices, restaurants, and residential uses around the stations.

Plan Area Characteristics

The Plan Area is approximately 76 acres and is composed of two major project areas bisected by the Contra Costa Canal. The area north of the canal is composed of the following parcels: 095-160-001, and 095-160-002 approximately 22.05 acres. The southern area is mostly composed of 094-080-046 approximately 54.33 acres. The Plan Area was part of the former Delta View Golf Course and is currently vacant with a variety of natural habitats including grasslands, wetlands, remnant patches of landscaping trees, golf cart paths and parking areas.

Immediately north of the Plan Area are single-family residences and beyond that are educational facilities and the De Anza trail. To the east of the Plan Area is a Pacific Gas and Electric (PG&E) corridor that includes large transmission lines that traverse the City. Further east are residential neighborhoods and municipal facilities. Land south of the Plan Area is open space hillsides with dispersed trees and natural vegetation. West of the Plan Area is additional portions of the former Delta View Golf Course and beyond that are residential neighborhoods.

City of Pittsburg 2040 General Plan Land Use Designations

Plan Area

The 2040 General Plan Area is designated as Employment Center Industrial (ECI). The 2040 General Plan describes this land use as “fostering vibrant, diverse, and dynamic employment hubs that accommodate technology, advanced manufacturing, logistics, and other sectors that generate substantial employment opportunities. Other uses include administrative, financial, business, professional, medical and public offices, business incubators, research and development, custom and light manufacturing, limited assembly, warehousing and distribution, data centers, technology and innovation, energy, hospitals and large-scale medical facilities, services, light and heavy automobile services, and supporting commercial uses.”

The Plan Area is part of the West Leland Subarea. The West Leland Subarea primarily consists of single-family residential areas, along with the City’s combined Golf Course/Stoneman Park recreational facility. It features public amenities such as the Del Monte Community Center, an elementary school, and a recently constructed fire station. Although the Plan Area is within this subarea, no goals, policies and/or actions identified in the 2040 General Plan for the subarea are applicable to the proposed Specific Plan.

Zoning

To achieve internal consistency between the 2040 General Plan and the City’s Zoning Ordinance, as required by Government Code 65860, the City is proposing to rezone some areas designated as ECI by the 2040 General Plan to the “Limited Industrial with Limited Overlay” District (IL-O). The proposed IL-O District will allow for employment-generating and light manufacturing uses with specific development regulations to facilitate economic development within the City, while the city-wide conforming zoning updates proceed.

Surrounding Land Use

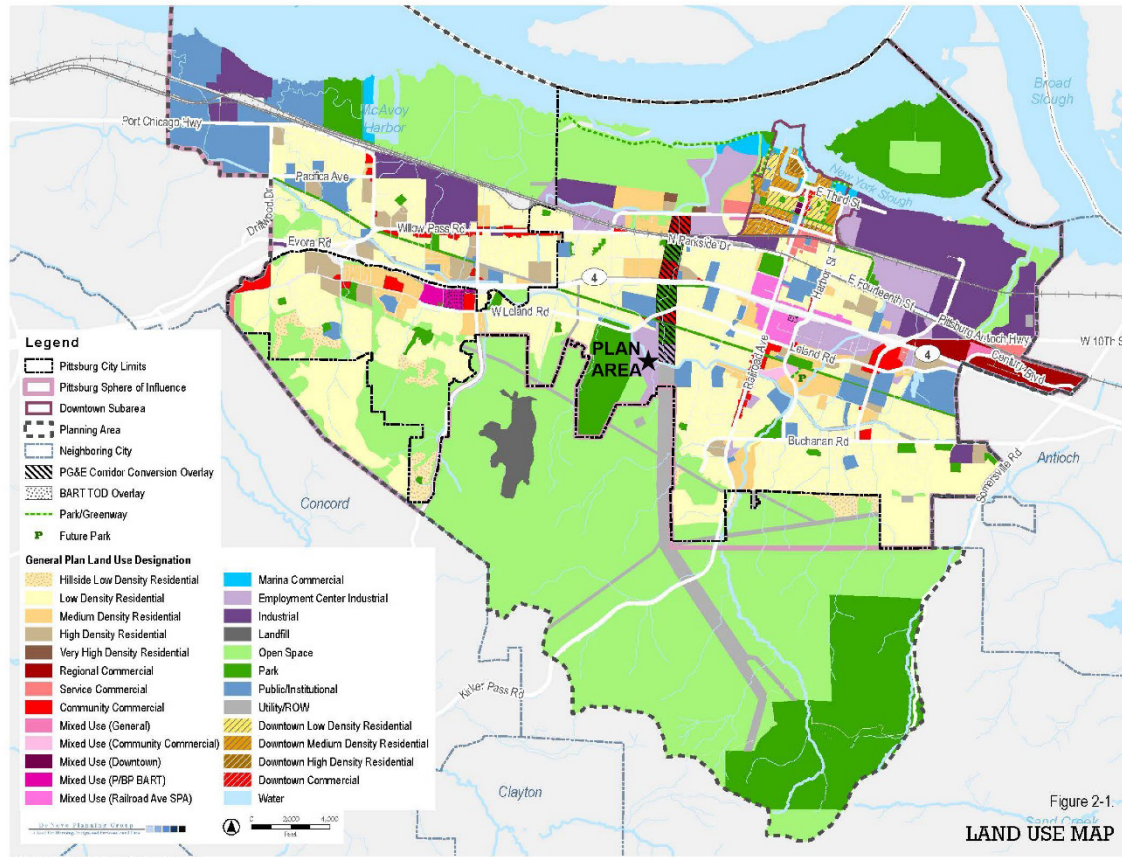
The Specific Plan Area has a General Plan land use designation of ECI. Land north of the Plan Area is designated as both Low Density Residential and Public/Institutional. Land to the east of the Plan Area is designated Utility/ROW, as well as ECI and Park with a PG&E Corridor Conversion Overlay. Land to the west of the Plan Area is designated as Park and land south of the Plan Area is within the jurisdiction of Contra Costa County and is designated Open Space by the Contra Costa County General Plan. Figure 3.9-1 shows the land uses within and adjacent to the Plan Area. The definitions of each land use are provided below.

- **Low Density Residential:** Low density residential designated land is used primarily as single-family residential (detached), attached single-family units permitted with ground-floor living area and private or common outdoor open space, duplexes, where allowed by State law.
- **Public/Institutional:** Public/institutional designated land is used for schools, government offices, transit sites, public utilities, cultural facilities, religious institutions fraternal organizations, and similar uses.
- **Utility/ROW:** Utility/ROW designated land is used for utilities, infrastructure, or road right-of-way.
- **PG&E Corridor Conversion Overlay:** The PG&E corridor conversion overlay area is applied to the PG&E transmission line corridor extending from the Pittsburg PG&E Power Plant through the City to the Contra Costa Canal. This overlay designation is intended to provide

for the relocation of the power plant and the conversion of the transmission line corridor to urban and recreation uses.

- **Park:** Park designated land uses include parks, recreation complexes, community fields, public golf courses, stadiums, greenways, local and regional trails.

FIGURE 3.9-1. 2040 GENERAL PLAN LAND USE DESIGNATIONS



Contra Costa County General Plan Land Use Designations

The Contra Costa County General Plan serves as a comprehensive framework designed to shape the county's trajectory of growth, development, and resource conservation. With a focus on fostering a sustainable "quality of life," it articulates broad goals, policies, and implementation measures reflective of community aspirations and concerns. Each element of the plan delineates objectives, principles, and standards to guide decision-making bodies and public agencies involved in land development and infrastructure enhancement. While primarily addressing physical development, the plan acknowledges the broader social and economic ramifications of its policies, recognizing their influence on community dynamics and well-being. Whether facilitating job creation through industrial expansion or promoting affordable housing and public amenities, the General Plan seeks to optimize the social and economic fabric of Contra Costa County.

The area south of the Plan Area is unincorporated Contra Costa County land. The Contra Costa County General Plan Open Space land use designation applies to this area south of the Plan Area. Open Space designated under the Contra Costa County General Plan includes publicly owned open

space lands which are not designated as Public and Semi-Public, Watershed, or Parks and Recreation. Lands designated Open Space include, without limitation, wetlands and tidelands and other areas of significant ecological resources, or geologic hazards.

The Open Space designation also includes privately-owned properties for which future development rights have been deeded to a public or private agency. Also included are the steep, unbuildable portions of approved subdivisions which may be deeded to agencies such as East Bay Regional Parks District (EBRPD), but which have not been developed as park facilities. Other privately-owned lands have been designated as Open Space consistent with adopted city general plans. The most appropriate uses in Open Space areas involve resource management, such as maintaining critical marsh and other endangered habitats or establishing "safety zones" around identified geologic hazards. Other appropriate uses are low-intensity, private recreation for nearby residents. One single-family residence on an existing legal lot is consistent with this designation.

3.9.2 REGULATORY SETTING

FEDERAL

There are no federal regulations for land use planning, housing, and population applicable to the proposed Specific Plan.

STATE

California Environmental Quality Act

CEQA was developed to protect the quality of the environment and the health and safety of persons from adverse environmental effects. Discretionary projects are required to be reviewed consistent with the requirements of CEQA to determine if there is potential for the project to cause a significant adverse effect on the environment. Depending on the type of project and its potential effects, technical traffic, noise, air quality, biological resources, and geotechnical reports may be needed. If potential adverse effects can be mitigated to less than significant levels, a mitigated negative declaration may be adopted. If potentially adverse effects cannot be mitigated to less than significant levels, an environmental impact report is required. These documents have mandated content requirements and public review times. Preparation of CEQA documents can be costly and time-consuming, potentially extending the processing time of a project by a year or longer.

Delta Plan

Since 2010, the Delta Plan has been continuously developed and implemented to achieve two coequal goals: securing a reliable water supply for California and protecting, restoring, and enhancing the Sacramento-San Joaquin Delta ecosystem and the fish, wildlife, and recreation it supports. The Delta is recognized as an "evolving" environment and outlined a state policy of reduced reliance on Delta water exports, opting for a strategy of improved conservation, the development and enhancement of regional supplies, and water use efficiency.

The Delta Reform Act of 2009 established an independent state agency – the Delta Stewardship Council – to develop and implement the Delta Plan, a plan that facilitates the declared coequal goals.

The act also established the Delta Independent Science Board and authorized it to research, monitor, and assess programs pursued under the Delta Plan, advising the Council of its findings.

California Government Code Section 11106 - Specific plans

California Government Code Section 11106 outlines the authority granted to participating municipalities to adopt a specific plan for the systematic implementation of a county or multi-municipal comprehensive plan, particularly for nonresidential areas. The specific plan must include detailed provisions regarding land use distribution, facilities design, transportation, population density, natural resource preservation, and implementation procedures. This provision allows municipalities to create detailed plans for nonresidential areas within the framework of broader county or multi-municipal comprehensive plans, ensuring consistency, streamlined approval processes, and protection against unfair cost burdens on applicants.

Subdivision Code

A subdivision is any division of land for the purpose of sale, lease or finance. The California Subdivision Map Act (Government Code § 66410) regulates subdivisions throughout the state. The goals of the Subdivision Map Act are as follows:

- To encourage orderly community development by providing for the regulation and control of the design and improvement of a subdivision with proper consideration of its relationship to adjoining areas.
- To ensure that areas within the subdivision that are dedicated for public purposes will be properly improved by the subdivider so that they will not become an undue burden on the community.
- To protect the public and individual transferees from fraud and exploitation.

The Subdivision Map Act allows cities flexibility in the processing of subdivisions. Pittsburg controls this process through the subdivision regulations in the City of Pittsburg Municipal Code (PMC) Title 7 (Subdivision Code). These regulations ensure that minimum requirements are adopted for the protection of public health, safety and welfare and that the subdivision includes adequate community improvements, municipal services, and other public facilities.

Subdivision Map Act

The Subdivision Map Act aims to regulate and oversee the planning and development of subdivisions, ensuring they are designed and improved in consideration of neighboring areas. Its requirements mandate that subdividers install necessary infrastructure, and it aims to prevent fraud and exploitation while safeguarding the interests of both the public and buyers of subdivided lands. According to the Act, a subdivision is defined as the division of any improved or unimproved land, shown as a unit on the county assessment roll, for the purpose of sale, lease, or financing. Exclusive occupancy rights serve as an indicator of a subdivision as per the Act.

A subdivision map is required when any subdivider divides any unit or units of improved or unimproved land, or any portion thereof, as depicted on the most recent equalized county

assessment roll, for the purpose of sale, lease, or financing, regardless of whether the transaction is immediate or future oriented.

LOCAL

City of Pittsburgh General Plan 2040

The City's 2040 General Plan was adopted by the Pittsburgh City Council on May 6, 2024. The Plan Area has a land use designation of 'Employment Center Industrial'. This land use designation is intended to foster "vibrant, diverse, and dynamic employment hubs that accommodate technology, advanced manufacturing, logistics, and other sectors that generate substantial employment opportunities; uses may also include administrative, financial, business, professional, medical and public offices, business incubators, research and development, custom and light manufacturing, limited assembly, warehousing and distribution, data centers, technology and innovation, energy, hospitals and large-scale medical facilities, services, light and heavy automobile services, and supporting commercial uses."

The 2040 General Plan contains several policies and actions applicable to the proposed Specific Plan, including:

Land Use

Goal 2-1: Promote optimal, orderly, well-planned, and diverse land uses, including a compact urban form within the City's projected municipal boundary that provides a mix and distribution of uses to meet Pittsburgh's needs, including mixed-use development, infill development, and reuse and revitalization of underutilized and brownfield sites.

Policy 2-P-1.2: Promote land use compatibility through development standards, use restrictions, environmental review, and design considerations.

Policy 2-P-1.5: Discourage development at urban densities or intensities in areas on the periphery of the City boundary.

Action 2-A-2.a. Amend the Zoning Ordinance to:

- Employ planned development to achieve high community design standards and provide projects beneficial to Pittsburgh, not to circumvent development intensity standards.
- Development projects shall be designed to:
 - (i) Utilize density transitions, less intense non-residential land use designations, and buffers, including open space, drainage features, landscaping, and multi-use paths, in order to protect the integrity of existing land use patterns and minimize the impacts on existing uses and residents.

Goal-2-4: Promote business development in a range of sectors that contribute to the local and regional economy, provide high-wage and skilled jobs for Pittsburgh residents.

Policy 2-P-4.1: Identify and allocate adequate lands in strategic locations throughout Pittsburgh to accommodate and encourage employment growth, focusing on sectors that provide high-paid and high-quality jobs and continue to promote business development sites through Think Pittsburgh and other local programs.

Policy 2-P-4.2: Encourage the development and intensification of employment centers, including high quality, professional office campuses, business parks, and industrial parks, along with innovation districts, related mixed-use development and open spaces. The centers shall be located in areas fully served by public facilities and services, located along major arterials with easy freeway access and with access from public transit, and accessible to bicyclists and pedestrians.

Policy 2-P-4.3: Promote large-scale office/business development, and reserve sites for Business Commercial uses in designated locations accessible from regional transportation systems.

Policy 2-P-4.5: Support office, business, and industrial land uses that will improve the City's employment base through high-quality, well-paid jobs that attract the technology, energy, and industrial sectors desired by the community.

Policy 2-P-4.6: Encourage the development of "clean" industries, such as research and development, technology and specialized manufacturing, and similar uses, that limit environmental impacts and health risks commonly associated with industrial uses.

Policy 2-P-4.10: Ensure that employment-generating development, such as industrial, warehouse, distribution, logistics, and fulfillment projects, does not result in adverse impacts (including health risks and nuisances), particularly to residential uses and other sensitive receptors, including impacts related to the location and scale of buildings, lighting, noise, smell, and other environmental and environmental justice considerations. When development is incompatible, require adequate buffers and/or architectural consideration to protect residential areas, developed or undeveloped, from intrusion of nonresidential activities that may degrade the quality of life in such residential areas.

Action 2-A-4.a: Update the City's Zoning Ordinance and Subdivision Regulations to:

- Require new employment centers and industrial development to incorporate such accessory uses as public open space amenities, transit amenities, childcare facilities, and non-office retail uses based on the size and location of the development and the availability and capacity of existing accessory uses.
- Require new and renovated employment center development be designed to accommodate safe and convenient walking, biking, and transit use, and provide an attractive, high-quality "campus environment."

Action 2-A-4.b: As part of the City's development review process, continue to ensure that employment-generating projects are designed to minimize conflicts with residential uses, sensitive receptors, and disadvantaged communities. Review of employment-generating

projects should ensure that the following design concepts are addressed in projects that abut residential areas, sensitive receptors, or disadvantaged communities:

- Appropriate building scale and/or siting;
- Site design and features to protect residential uses and other sensitive receptors, developed or undeveloped, from impacts of non-residential development activities that may cause unwanted nuisances and health risks and to ensure that disadvantaged communities are not exposed to disproportionate environmental or health risks. The site design and features shall be based on best management practices as recommended by CARB, Bay Area Air Quality Management District (BAAQMD), and the California Attorney General;
- Site design and noise-attenuating features to avoid exposure to excessive noise due to long hours of operation or inappropriate location of accessory structures;
- Site and structure design to avoid excessive glare or excessive impacts from light sources onto adjacent properties; and
- Site design to avoid unnecessary loss of community and environmental resources (archaeological, historical, ecological, recreational, etc.).

Action 2-A-4.c: When industrial projects and other higher intensity use projects, including warehouse projects, fulfillment centers, and other projects that may generate high volumes of truck trips and/or air quality emissions are proposed within 1,000 feet of existing or planned residential uses or other sensitive receptors, the City shall require:

- The preparation of a Health Risk Assessment (HRA) that meets the standards established by the Office of Environmental Health Hazard Assessment (OEHHA, and BAAQMD. Projects shall not be approved until it can be demonstrated that the project would not result in an exceedance of the established thresholds of significance for public health risks at nearby sensitive receptors; and
- The implementation of best management practices (BMPs) to reduce pollution exposure to sensitive receptors, particularly diesel particulate matter (DPM). The appropriate BMPs shall be established on a case-by-case basis, will be based on BMPs recommended by CARB, BAAQMD, and the California Attorney General, including the Warehouse Projects: Best Practices and Mitigation Measures to Comply with the California Environmental Quality Act and Good Neighbor Guidelines for Warehouse Distribution Facilities, and shall consider the following tools, methods, and approaches:
 - Creating physical, structural, and/or vegetative buffers that adequately prevent or substantially reduce pollutant dispersal between warehouses and any areas where sensitive receptors are likely to be present, such as homes, schools, daycare centers, hospitals, community centers, and parks.
 - Providing adequate areas for on-site parking, on-site queuing, and truck check-in that prevent trucks and other vehicles from parking or idling on public streets.

- Placing facility entry and exit points from the public street away from sensitive receptors, e.g., placing these points on the north side of the facility if sensitive receptors are adjacent to the south side of the facility. Exceptions can be made for emergency vehicle access (EVA) points.
- Locating warehouse dock doors and other onsite areas with significant truck traffic and noise away from sensitive receptors, e.g., placing these dock doors on the north side of the facility if sensitive receptors are adjacent to the south side of the facility.
- Screening dock doors and onsite areas with significant truck traffic with physical, structural, and/or vegetative barriers that adequately prevent or substantially reduce pollutant dispersal from the facility towards sensitive receptors.
- Posting signs clearly showing the designated entry and exit points from the public street for trucks and service vehicles.
- Posting signs indicating that all parking and maintenance of trucks must be conducted within designated on-site areas and not within the surrounding community or public streets.

Growth Management

Policy 3-P-1.2: Manage the City's growth to balance development of housing options and job opportunities, protection of open space and habit areas, construction of transportation improvements, and preservation of high-quality public facilities.

Policy 3-P-1.3: Provide a range of development intensities, with the highest intensities in Downtown and in areas proximate to transit and services, and lower intensities in hillside and at the City's southern edge, with an emphasis on land use patterns that make efficient use of the local and regional transportation systems and consider conservation of natural resources.

Urban Design

Policy 4-P-1.2: Encourage and support high-quality design that evokes Pittsburg's history and unique character through ensuring standards and guidelines for residential, commercial, industrial, mixed use, civic, and other uses incorporate features and materials design that reinforces Pittsburg's community character.

Policy 4-P-1.4: Seek methods to improve the visual character and design of Pittsburg, including establishing design standards for gateways, key corridors, residential uses, and non-residential uses, promoting high-quality redevelopment and reuse projects, and addressing features that may adversely affect views of gateways, ridgelines, open space, and other identified visual resources.

3.9 LAND USE AND PLANNING

Policy 4-P-2.10: Use revegetation as an erosion control measure to maintain the natural character of a hillside; utilize hydro-seed, silt traps, and other engineering solutions where erosion potential exists during development.

Economic Development

Policy 6-P-2.9: Encourage new development in areas where growth and investment have the potential to catalyze revitalization of existing uses.

Policy 6-P-2.11: Provide appropriate incentives for infill and redevelopment projects that have the potential to revitalize existing neighborhoods or commercial areas.

Policy 6-P-2.14: Encourage new businesses and project development under the Employment Center Industrial land use classification.

Action 6-A-5.c: Undertake a detailed study to assess the true costs of development and establish an appropriate impact fee schedule to ensure that new development “pays its own way” with respect to infrastructure and servicing.

Circulation and Transportation

Policy 7-P-1.1: Ensure that the City’s circulation network is a well-connected system of streets, roads, highways, sidewalks, trails, and paths that effectively and safely accommodate all users in a manner that considers the context of surrounding land uses, the needs of all roadway users, and is maintained and improved over time to support buildout of the General Plan.

Policy 7-P-1.5: Implement and continue to increase efforts to reduce regional vehicle miles traveled (VMT) by supporting land use patterns and site designs that promote active modes of transportation, and public transit.

Policy 7-P-1.6: Design streets to operate with vehicle speeds that are safer for all users, especially pedestrians and bicyclists, while providing adequate access for emergency vehicles. Speed reductions strategies should include reduced lane widths and application of traffic calming measures on local and collector streets and especially near parks, schools, trails, and in the Downtown core.

Policy 7-P-1.7: Strive to maintain delay-based level of service (LOS) D for motor vehicle traffic as the minimum acceptable service standard for all signalized and stop-controlled intersections at all times (including during peak periods) unless maintenance of LOS would, in the City’s judgement, be infeasible and/or conflict with the achievement of other City goals identified in this General Plan. Congestion in excess of LOS D may be acceptable in these cases, provided that provisions are made to improve traffic flow and/or promote multimodal or non-vehicular transportation as part of a development project or City-initiated project. In the designated Downtown core, as defined by the City’s General Plan and illustrated by the City’s Subdivision map, LOS E would be considered as an acceptable service standard to account for the more urban, pedestrian-oriented character of the area.

Policy 7-P-1.9: Implement transportation improvements to maintain and enhance roadway operations and safety while striving to improve accessibility and comfort for all users.

Action 7-A-1.a: Evaluate projects traffic and Vehicle Miles Traveled (VMT) impacts of development projects based on the City's Transportation Impact Analysis Guidelines to determine transportation impacts to all users, including pedestrians, bicyclists, transit riders, and motorists, and to require projects to address impacts consistent with the requirements of CEQA.

Action 7-A-1.b: Require proposed development projects with VMT levels above the City's threshold to consider reasonable and feasible project modifications and other measures during the project design and review stage and the environmental review stage that would reduce VMT effects in a manner consistent with the City's sustainability goals, the City's Transportation Impact Analysis Guidelines, and with State guidance on VMT reduction.

Action 7-A-1.d: Require new development to pay its fair share of the costs of street and other transportation improvements in conformance with the goals and policies established in this Circulation Element and the Transportation Impact Mitigation Fee (TIMF) program.

Action 7-A-1.e: Use traffic calming tools and speed reduction strategies in new development and the design of roadway improvements to assist in implementing complete street principles and encouraging active transportation. Possible tools include roundabouts, raised intersections, curb extensions, reduced roadway width, high visibility crosswalks, and rapid flashing beacons.

Policy 7-P-2.2: Encourage employers to provide programs for carpooling/transit/biking/walking subsidies, bicycle facilities, alternative work schedules, ridesharing, telecommuting, working at home, employee education, and preferential parking for carpools/vanpools.

Policy 7-P-2.4: Ensure that safe and continuous routes for pedestrians and bicyclists are provided within new development projects and on any roadways that are impacted as a result of new development.

Action 7-A-2.e: Preserve options for future transit use when designing improvements for roadways. Ensure that developers provide bus turnouts and/or shelters, where appropriate, as part of projects.

Action 7-A-2.f: Require new developments to provide public access and infrastructure, as appropriate, that support internal connectivity, multimodal transportation, and integration into the surrounding transportation networks.

Action 7-A-2.h: Require mitigation for development projects that increase transit demand above the service levels provided by public transit operators and agencies, or, create conflicts with existing transit operations.

Action 7-A-2.i: As part of development approval, ensure that safe and contiguous routes for pedestrians and bicyclists are provided within the development projects and on any roadways that are impacted as a result of new development.

Action 7-A-2.k: Encourage developers to provide enhanced TDM programs and alternative transportation infrastructure that exceeds minimum requirements, as per 7-A-2.j, in exchange for reduced parking requirements, with a focus on priority development areas and locations in proximity to high capacity transit.

Action 7-A-2.m: Encourage major employers to establish designated parking areas for carpools, designated electric vehicles, and clean air vehicles, and secure on-site bicycle facilities. Encourage the provision of charging stations/outlets for electric vehicles.

Action 7-A-2.O: Require development projects to provide or fund their fair-share of bicycle and pedestrian facilities improvements in order that sufficient facilities for pedestrians and bicyclists may be constructed throughout the City.

Policy 7-P-3.4: Ensure continued compliance with Title 24 of the California Building Code, requiring the removal of all barriers to disabled persons on City streets, and compliance with the Americans with Disabilities Act (ADA) to allow mobility-impaired users such as the disabled and elderly to safely and effectively use the City's circulation network.

Policy 7-P-3.5: Encourage secure bicycle facilities and other alternative transportation facilities to be provided as part of new developments, especially future employment sites, public facilities, and multi-family residential complexes.

Policy 7-P-4.2: Use the adopted regional and local Transportation Impact Mitigation Fee (TIMF) ordinances to ensure that all new developments pay a fair share of the cost of transportation improvements, or require mitigation for development proposals that are not part of the TIMF program which contribute more than one percent of the volume to an existing roadway or intersections.

Action 7-A-4.c: Continue to collect fees, plan, and design for the future construction of the improvements shown in Figure 7-1, including new roadways and roadway extensions, and improvements identified in Table 7-2 (Bailey Road and West Leland Road and Railroad Avenue and SR-4 WB On-Ramp).

Community Health & Environmental Justice

Policy 8-P-1.4: Consider the effects of planning decisions on the overall health and well-being of the community and its residents and specifically upon disadvantaged communities and vulnerable populations, such as areas with concentrated populations of seniors, persons with a disability, and low income residents.

Policy 8-P-1.6: Consider the effects on sensitive populations when siting industrial and other intensive uses, designating Citywide truck routes, and considering uses and projects that may have adverse impacts on disadvantaged and vulnerable communities.

Policy 8-P-1.12: Identify and assess disproportionate impacts of environmental pollution and work to remedy these impacts.

Action 8-A-1.b: Review all development proposals, planning projects, and infrastructure projects to ensure that potential adverse impacts to disadvantaged communities, such as exposure to pollutants, including toxic air contaminants, are not disproportionate, and are reduced to the greatest extent feasible.

Action 8-A-1.c: Promote and implement the goals, policies, and actions for each strategy of the Pittsburgh Sustainability Plan, including:

- C-1 Cornerstone to Climate Action Planning
- E-1 Electrify the Building Stock
- E-2 Decarbonize Electricity and In-use and Storage of Local Renewable Energy
- T-1 Reduce Passenger Car Vehicle Miles Traveled
- T-2 Increase Zero-Emission Vehicle and Equipment Use
- W-1 Increase Water Conservation and Local Water Supply
- W-2 Minimize Water Loss System-wide
- SW-1 Organic Waste Diversion
- SW-2 Reduce Community Waste Generation
- CS-1 Carbon Sequestration
- M-1 Commit to Climate Action
- M-2 Reduce Municipal Reliance on Natural Resources

Policy 8-P-2.2: Require future planning decisions, development, and infrastructure and public projects to consider the effects on the overall health and well-being of the community and its residents, with specific consideration provided to ensure disadvantaged communities have equitable access to services and amenities and to reduce exposure to hazardous materials, industrial activity, vehicle exhaust, other sources of pollution, and excessive noise on residents, with an emphasis on reducing exposure of any disadvantaged communities to such exposure.

Action 8-A-2.a: Review all development proposals, planning projects, and infrastructure projects to ensure that potential adverse impacts to disadvantaged communities, such as exposure to pollutants, including toxic air contaminants, and unacceptable levels of noise and vibration are reduced to the extent feasible and that measures to improve quality of life, such as connections to bicycle and pedestrian paths, community services, schools, and recreation facilities, access to healthy foods, and improvement of air quality are included in the project. The review shall address both the construction and operation phases of the project.

Recreation & Youth

Policy 9-P-1.5: Maintain park and recreation facility standards for new development to serve both residents and employees, attainable through, in order of priority: 1) provision of fully

developed parks, 2) dedication of parkland, or 3) payment of in-lieu fees dedicated to the provision of new park sites or enhancing existing facilities.

Policy 9-P-2.2: Development projects adjacent open space, shoreline, hillside, and other recreational areas shall provide public connections and linkages.

Policy 10-P-1.7: Provide, and encourage access to, public and private open space within urbanized parts of Pittsburg, in order to provide for the recreational and public health needs of residents and provide visual contrast with the built environment.

Policy 10-P-1.8: Require development projects to maximize the potential for open space, visual experiences, and passive and active recreation.

Action 10-A-1.c: Require all new development to provide linkages to existing and planned open space that would logically be connected through the project.

Resource Conservation & Open Space

Policy 10-P-1.8: Require development projects to maximize the potential for open space, visual experiences, and passive and active recreation.

Policy 10-P-2.5: Conserve natural terrain, native vegetation, and sensitive habitats and recognize the role of native vegetation, natural terrain and green infrastructure in natural resource and watershed management.

Policy 10-P-2.8: Require new development projects and expansion of existing uses to conserve sensitive habitat, including special status species.

Policy 10-P-2.11: Encourage the preservation of wildlife corridors to ensure the integrity of habitat linkages.

Policy 10-P-2.14: Collaborate with developers to maintain, and where feasible establish enhancements to, creeks, marshes, wetlands, and riparian corridors in the design of new development.

Policy 10-P-2.15: Protect and restore threatened natural resources, such as wildlife, estuaries, tidal zones, marine life, wetlands, and waterfowl habitat.

Policy: 10-P-2.16: Limit dredging and filling of wetlands and marshlands, particularly adjacent to Browns Islands Preserve.

Policy 10-P-2.18: Recognize that climate change impacts may influence future guidance, and best available data, and continue to ensure that up-to-date information is consulted when reviewing projects for potential impacts to biological resources, including the Bay, Delta, and sensitive habitats.

Action 10-A-2.g: Intermix areas of pavement with naturally vegetated infiltration sites to minimize the concentration of stormwater runoff from pavement and structures.

Action 10-A-2.h: Require an encroachment permit from Contra Costa Water District (CCWD) for any storm drain facility or increase in runoff, as determined by a hydrological study, that will add load to existing facilities crossing or encroaching onto Contra Costa Canal rights-of-way.

Policy 10-P-3.1: Require development to use best management practices (BMPs) to minimize the runoff and erosion caused by earth movement.

Policy 10-P-3.2: Encourage preservation of natural creeks and riparian habitat as best as possible.

Policy 10-P-4.4: Address soil and groundwater pollution during development, redevelopment, and reuse projects.

Policy 10-P-4.5: Reduce sedimentation and erosion of waterways by minimizing site disturbance and vegetation removal.

Policy 10-P-4.6: Encourage rehabilitation and revegetation of riparian corridors and wetlands throughout the City to contribute to bioremediation and improved water quality.

Policy 10-P-4.8: Protect water quality by reducing non-point sources of pollution and the dumping of debris in and near creeks, storm drains, and Contra Costa Canal. All drainage from new development should either be directed to an appropriate storm drain system that avoids CCWD facilities and Contra Costa Canal right-of-way, or obtain an encroachment permit from CCWD consistent with Action 10-A-2.h.

Policy 10-P-4.9: Require projects to comply with best management practices for development and construction on sites where the erosion potential is moderate to severe or which may affect riparian areas, which may include:

- Use of bench terraces where areas of long slopes may create a stormwater gradient flow;
- Construction of berms between any riparian corridor and the construction site to preclude sediment in stormwaters and sheet-floods from entering riparian zones; and
- Completing the storm drainage system in the early phase of construction to manage stormwater runoff during construction.

Action 10-A-4.d: Review and update BMPs as necessary to promote state-of-the-art construction practices to ensure that development projects consider the effects of construction debris and sediment on local water supplies.

Action 10-A-4.e: Monitor land uses discharging into groundwater recharge areas to prevent potential contamination from hazardous or toxic substances.

3.9 LAND USE AND PLANNING

Action 10-A-4.i: As part of the development review process, require new development to identify and implement BMPs to minimize creek bank instability, runoff of construction sediment, and flooding.

Policy 10-P-5.5: Require new development to avoid obstructing views of, and to minimize impacts to, significant visual resources through the following: creative site planning; integration of natural features into the project; appropriate scale, materials, and design to complement the surrounding natural landscape; clustering of development to preserve open space vistas and natural features; minimal disturbance of topography; and creation of contiguous open space networks.

Policy 10-P-5.6: Ensure that the visibility of new development from natural features and open space areas is minimized to preserve the landforms and ridgelines that provide a natural backdrop to the open space systems.

Policy 10-P-6.1: Support the principles of reducing air pollutants and greenhouse gas emissions through comprehensive and sustainable land use, transportation, and energy planning and addressing opportunities to decrease emissions associated with local government operations.

Policy 10-P-6.2: Ensure that new development is consistent with the energy objectives and targets identified by the City's Sustainability Plan.

Policy 10-P-6.4: Encourage and support infill, mixed use, and higher density development, where appropriate, in order to reduce GHG emissions associated with vehicle travel.

Policy 10-P-6.6: Reduce the generation of TACs such as ozone, carbon monoxide, lead, and particulate matter to work toward improving air quality and meeting all Federal and State ambient air quality standards.

Policy 10-P-6.7: Reduce the potential for human discomfort or illness due to local concentrations of toxic contaminants, odors, and dust.

Policy 10-P-6.9: Coordinate and review at the time of submittal of land use planning applications and development project BMPs and standards to prevent odors and odor complaints.

Policy 10-P-6.10: Require and condition all new public and privately constructed buildings to exceed, where feasible, and comply with construction and design standards that promote energy conservation, including the most current "green" development standards in the California Green Building Standards Code.

Policy 10-P-6.11: Require expanded innovative and green building best practices, where feasible, including, but not limited to, LEED certification for all new development and retrofitting existing uses, and encourage public and private projects to exceed the most current "green" development standards in the California Green Building Standards Code.

Policy 10-P-6.12: Require and condition construction and operation of new development to be managed to minimize fugitive dust and air pollutant emissions.

Policy 10-P-6.13: Implement development standards, mitigation measures, and best practices that require energy conservation and the reduction in greenhouse gases, including:

- Require new development to incorporate energy-efficient features through passive design concepts (e.g., techniques for heating and cooling, building siting orientation, street and lot layout, landscape placement, and protection of solar access);
- Require construction standards which promote energy conservation including window placement, building eaves, and roof overhangs;
- Require all projects to meet or, when feasible, exceed the most current "green" development standards in the California Green Building Standards Code;
- Require projects to implement applicable Sustainability Plan strategies and actions;
- Encourage projects to incorporate enhanced energy conservation measures, electric-only appliances, and other methods of reducing energy usage and greenhouse gas emissions; and
- Require large energy users to implement an energy conservation plan, which may include solar or other non-fossil fuel sources to meet the operation's full power demand and 100% fleet electrification, as part of the project review and approval process, and develop a program to monitor compliance with and effectiveness of that plan.

Policy 10-P-6.14: Encourage development of green and clean energy infrastructure and maintain land use designations to support and accommodate energy infrastructure projects that assist in meeting the State's goals to reduce carbon in the energy supply and reduce carbon-related emissions.

Safety

Policy 11-P-1.12: Ensure that City regularly reviews the local Hazard Mitigation Plan (HMP) recommendations and implements projects to protect critical facilities and infrastructure and to reduce risk of exposure to identified hazards.

Policy 11-P-2.1: Consider climate change impacts and adaptive responses in long-term planning and current development decisions consistent with the policies and programs of the City's Sustainability Plan and Local Hazard Mitigation Plan.

Policy 11-P-2.8: Make allowances for climate change in flood risk assessments to help minimize vulnerability and provide resilience to flooding and coastal change where protection, accommodation and managed relocation strategies should be considered.

Policy 11-P-3.4: Ensure that development projects mitigate impacts to the City's storm drainage capacity from storm water runoff occurring from the property. Project applicants

shall demonstrate that projects implement Best Management Practices (BMPs) and Low Impact Development measures (LID) to treat stormwater before discharge from the site project and that project implementation would not result in increases in the peak flow runoff to adjacent lands or drainage facilities that would exceed the design capacity of the drainage facility or result in an increased potential for off-site flooding.

Policy 11-P-3.7: Ensure that new developments comply with all applicable requirements of Municipal Code Chapter 15.80 - Floodplain Management, the California Building Code as adopted by the City, and the latest promulgated FEMA standards for development in the flood hazard areas.

Policy 11-P-4.7: Ensure that Bay Area Air Quality Management District requirements are implemented in construction projects to reduce soil and particulate matter transport.

Community Facilities

Policy 12-P-2.1: Continue water district and user conservation efforts to help reduce demand in light of drought patterns, groundwater management, raw water availability, and the potential for unforeseen shortfalls.

Policy 12-P-2.2: Continue water conservation efforts from industrial facilities, including continued enforcement of the City's water-efficient landscape standards and participation in a wastewater reclamation efforts.

Policy 12-P-3.4: Maintain environmentally appropriate wastewater management practices.

Action 2-A-3.f: Require that all wastewater dischargers within the City conform to Delta Diablo standards.

Policy 12-P-4.3: Reduce municipal waste generation by increasing recycling, on-site composting, and mulching, where feasible, at municipal facilities, as well as using resource efficient landscaping techniques in new or renovated medians and parks.

Policy 12-P-6.3: Require development in areas of high fire hazard to be designed and constructed to minimize potential losses and maximize the ability of fire personnel to suppress fire incidents.

Policy 12-P-6.4: Require existing and new development in or adjacent to high and very high fire hazard severity zones, wildland urban interface zones, and State Responsibility Areas to maintain defensible space zones, landscape using native, fire-resistant plants and fire-resistant materials, abate weeds, and, where feasible, harden structures and infrastructure against fires.

Policy 12-P-7.1: Require all development projects to demonstrate how storm water runoff will be detained or retained on-site and/or conveyed to the nearest drainage facility as part of the development review process, including consideration of the near-term and cumulative capacity of the system serving the drainage area, and as required by the City's

NPDES Municipal Regional Permit. Project applicants shall mitigate any drainage impacts as necessary and shall demonstrate that the project will not result in any increase in off-site runoff during rain and flood events.

Policy 12-P-7.2: Assure through the City standards, including the Master Drainage Plan and development ordinances, that proposed new development (residential, commercial, or industrial) adequately provides for on-site and downstream mitigation of potential flood hazards, including construction of required drainage improvements.

Policy 12-P-7.3: Ensure adequate minimum setbacks to reduce potential for property damage from storm flooding.

Policy 12-P-7.4: Reduce the risk of localized and downstream flooding and runoff through the use best management practices to minimize runoff from the site to the storm drainage system, including:

- High infiltration measures, including the maximization of permeable landscape,
- Using permeable surfaces for parking lots, sidewalks, and bike paths,
- Where feasible, using roof runoff as irrigation.

Policy 12-P-7.5: During the review of development plans, require all commercial projects to construct on-site retention facilities. Such facilities could be in the form of landscape features or underground swells.

Policy 12-P-7.6: Allow the construction of detention basins as mitigation in new developments. Ensure that detention basins located in residential neighborhoods, schools, or child-care facilities are surrounded by a gated enclosure, or protected by other safety measures.

Action 12-A-7.a: As part of project review and CEQA documentation, require an assessment of downstream drainage (creeks and channels) and City storm-water facilities impacted by potential project runoff and require development to include measures, including on-site improvements, to ensure that off-site runoff is not increased during rain and flood events.

Noise

Policy 13-P-1.2: Require development projects, including new uses, to meet the noise standards.

Policy 13-P-1.5: Continue efforts to incorporate noise considerations into land use planning decisions, including measures to control noise at the source through site design, building design, landscaping, hours of operation, and other techniques, for new development deemed to be noise generators, and guide the location and design of transportation facilities to minimize the effects of noise on adjacent land uses.

Policy 13-P-1.7: Limit generation of loud noises on construction sites adjacent to existing development to normal business hours between 8:00 AM and 5:00 PM.

3.9 LAND USE AND PLANNING

Policy 13-P-1.8: Reduce the impact of truck traffic noise on residential areas by limiting such traffic to appropriate truck routes. Consider methods to restrict truck travel times in sensitive areas.

Policy 13-P-1.11: Require the preparation of ground-borne vibration studies by qualified professionals when construction activities include vibration sensitive uses and significant site grading, foundation work, or underground work would occur within less than 100 feet of existing structures.

Policy 13-P-1.12: Require development projects to reduce adverse construction vibration impacts to sensitive receptors, as feasible, when vibration-related construction activities are to occur within 100 feet from existing sensitive receptors. Measures to reduce noise and vibration effect may include, but are not limited to:

- Phase demolition, earth-moving and ground-impacting operations so as not to occur in the same time period.
- The pre-existing condition of all buildings within a 100-foot radius will be recorded in order to evaluate damage from construction activities. Fixtures and finishes within a 100-foot radius of construction activities susceptible to damage will be documented (photographically and in writing) prior to construction. All damage will be repaired back to its pre-existing condition.
- Substituting vibration-generating equipment with equipment or procedures that would generate lower levels of vibration. For instance, in comparison to impact piles, drilled piles or the use of a sonic or vibratory pile driver are preferred alternatives where geological conditions would permit their use.
- Other specific measures as they are deemed appropriate by the implementing agency to maintain consistency with adopted policies and regulations regarding vibration.

Action 13-A-1.a: As part of development review, require projects to submit to meet the City's noise standards identified in Policies 13-P-1.1 through 13-P-4 and 13-P-9. Where projects would cause and/or be subject to noise levels in excess of the City's standards, require an acoustical analysis prepared by a qualified acoustical engineer that includes measures to reduce exposure to noise levels in excess of City standards and encourage use of noise-attenuating measures that avoid sound walls, except where uses are affected by State Route 4.

Action 13-A-1.b: Develop noise attenuation programs for mitigation of noise adjacent to existing residential areas, including such measures as wider setbacks, intense landscaping, double-paned windows, and building orientation muffling the noise source, and avoid sound walls where feasible.

Action 13-A-1.e: In making a determination of impact significance under the California Environmental Quality Act (CEQA), a substantial increase will occur if ambient noise levels experience a substantial permanent increase. Generally, a 3 dB increase in noise levels is

barely perceptible, and a 5 dB increase in noise levels is clearly perceptible. Therefore, increases in noise levels shall be considered to be substantial when the following occurs:

- When existing noise levels are less than 60 dB, a 5 dB increase in noise will be considered substantial;
- When existing noise levels are between 60 dB and 65 dB, a 3 dB increase in noise will be considered substantial;
- When existing noise levels exceed 65 dB, a 1.5 dB increase in noise will be considered substantial.

Additional or alternative criteria can be used for determining a substantial increase in noise levels. For instance, if the overall increase in noise levels occurs where no noise-sensitive uses are located, then the City may use its discretion in determining if there is any impact at all. In such a case, the following alternative factors may be used for determining a substantial increase in noise levels:

- the resulting noise levels;
- the duration and frequency of the noise;
- the number of people affected;
- conforming or non-conforming land uses;
- the land use designation of the affected receptor sites;
- public reactions or controversy as demonstrated at workshops or hearings, or by correspondence; and prior CEQA determinations by other agencies specific to the project.

City of Pittsburg Zoning Ordinance

Title 18 of the PMC is the City's Zoning Ordinance. The Zoning Ordinance carries out the policies of the General Plan by classifying and regulating the uses of land and structures within the City, consistent with the General Plan. The purpose of the Zoning Ordinance is to protect and promote public health, safety, and general welfare, and to implement the policies of the City's General Plan. More specifically, the Zoning Ordinance is intended to:

- A. Provide a precise guide for the physical development of the city in order to:
 1. Preserve the character and quality of residential neighborhoods,
 2. Foster convenient, harmonious and workable relationships among land uses, and
 3. Achieve the arrangement of land uses described in the general plan;
- B. Promote economic stability of existing land uses that are consistent with the General Plan and protect them from intrusions by inharmonious or harmful land uses;
- C. Prevent excessive population densities and overcrowding of land or buildings;
- D. Ensure the provision of adequate open space for light, air and fire safety;
- E. Permit the development of office, commercial, industrial, and related land uses that are consistent with the General Plan, in order to strengthen the city's economic base;
- F. Conserve and enhance the city's architectural and cultural resources;

- G. Conserve and enhance key visual features of Pittsburgh's setting, including the riverfront and major ridgelines, consistent with the general plan;
- H. Require adequate off-street parking and loading facilities, and promote a safe, effective traffic circulation system;
- I. Ensure that service demands of new development will not exceed the capacities of streets, water and utilities, and other public services;
- J. Encourage a built environment of the highest design and architectural quality.

Division III of the Zoning Ordinance outlines the base district regulations, Division IV outlines the overlay district regulations, and Division V outlines the general land use regulations.

City of Pittsburgh Municipal Code Section 17.24

Chapter 17.24 PMC locally implements the Subdivision Map Act. It ensures that the subdivision process adheres to regulatory standards. It mandates that the form, contents, accompanying data, and filing of parcel or final maps must conform to both the Act and the local regulations outlined in the chapter. The preparation of maps is entrusted to qualified professionals such as registered civil engineers or licensed land surveyors, ensuring accuracy and compliance with regulatory guidelines.

Flexibility is maintained within the regulations, as the city engineer has the authority to waive certain requirements if they are deemed inapplicable to a particular subdivision. However, stringent survey requirements are in place to guarantee the accuracy of the subdivision boundaries, including the establishment of durable monuments and adherence to specified error tolerances.

Detailed specifications govern the form and content of the maps, ensuring consistency and clarity in presenting subdivision information. Additionally, the subdivision approval process involves thorough review and approval by both the city engineer and city council, with opportunities for corrections and revisions to ensure compliance with regulatory standards.

Exceptions are made for certain scenarios such as judicial partitions, balancing the requirements of the Subdivision Map Act with legal considerations. Ultimately, upon approval, the maps are transmitted to the county recorder in accordance with the Subdivision Map Act, completing the formal process of subdivision approval.

Pittsburgh Sustainability Plan

The Pittsburgh Sustainability Plan, adopted on November 6, 2023, is a dynamic document intended to engage, excite, and empower the community toward a healthier, more sustainable future. It sets out practices that the community can implement for tangible positive change, with a focus on creating a sustainable, equitable, and healthy Pittsburgh while supporting California's climate goals. The plan is underpinned by pillars of economic viability, environmental protection, and social responsibility, and incorporates input from community members and stakeholders to establish a robust framework for achieving sustainability objectives. Specific GHG reduction targets have been set, aiming to reduce emissions to 3.0 MT CO₂e per capita by 2030 and to 0.0 MT CO₂e per capita by 2045. The plan offers various benefits, including enhanced health and safety, job development, energy security, and community savings.

Plan strategies include:

- Strategy C-1: Cornerstone to Climate Action Planning
- Strategy E-1 Electrify the Building Stock
- Strategy E-2 Decarbonize Electricity and Increase Use and Storage of Local Renewable Energy
- Strategy T-1 Reduce Passenger Car Vehicle Miles Traveled
- Strategy T-2 Increase Zero-Emission Vehicle and Equipment Use
- Strategy W-1 Increase Water Conservation and Local Water Supply
- Strategy W-2 Minimize Water Loss System-wide
- Strategy SW-1 Organic Waste Diversion
- Strategy SW-2 Reduce Community Waste Generation
- Strategy CS-1 Carbon Sequestration
- Strategy M-1 Commit to Climate Action
- Strategy M-2 Reduce Municipal Reliance on Natural Resources

Contra Costa County Airport Land Use Commission

The purpose of an Airport Land Use Commission (ALUC) is to conduct airport land use compatibility planning. ALUCs protect public health, safety, and welfare by ensuring the orderly expansion of airports and the adoption of land use measures that minimize the public's exposure to excessive noise and safety hazards within areas around public airports to the extent that these areas are not already devoted to incompatible uses. The statutes governing ALUCs are set forth in Division 9, Part 1, Chapter 4, Article 3.5, Sections 21670 – 21679.5 of the California Public Utilities Code (PUC).

The Contra Costa County Airport Land Use Compatibility Plan (ALUCP) prepared in December 2000 establishes the airport influence areas and associated safety zones for Buchanan Field Airport and Byron Airport, as well as compatible land uses within the safety zones of each airport. The City of Pittsburg and the Plan Area are located outside of the airport influence area and airspace protection surfaces of Buchanan Field Airport.

East Contra Costa County Habitat Conservation Plan/Natural Community Conservation Plan

The East Contra Costa County Habitat Conservation Plan/Natural Community Conservation Plan (HCP/NCCP) is intended to provide regional conservation and development guidelines to protect natural resources while improving and streamlining the permit process for endangered species and wetland regulations. The HCP/NCCP was developed by a team of scientists and planners with input from independent panels of science reviewers and stakeholders. Within the 174,018-acre inventory area, the HCP/NCCP will provide permits for between 8,670 and 11,853 acres of development and will permit impacts on an additional 1,126 acres from rural infrastructure projects. The Plan Area falls within the inventory area for the East Contra Costa County HCP/NCCP.

The heart of the conservation strategy is a system of new preserves linked to existing protected lands to form a network of protected land outside the area where new urban growth will be covered under the HCP/NCCP. The conservation strategy is designed to create a preserve system that will:

3.9 LAND USE AND PLANNING

- Preserve approximately 23,800 acres of land under the initial urban development area or approximately 30,300 acres of land under the maximum urban development area for the benefit of covered species, natural communities, biological diversity, and ecosystem function.
- Preserve major habitat connections linking existing protected lands. East Contra Costa County Habitat Conservation Plan Association
- Enable management of habitats to enhance populations of covered species and maintain ecosystem processes.

The Plan describes a detailed but flexible process to assemble the Preserve System using acquisition of fee title or conservation easements, and partnerships with other conservation organizations already active in the region. Assembly of the Preserve System will be based on the availability of willing sellers. However, preserve assembly will be required to stay ahead of the impacts of covered activities.

The Preserve System to be acquired under the HCP/NCCP will encompass 23,800 to 30,300 acres of land that will be managed for the benefit of 28 species as well as the natural communities that they, and hundreds of other species, depend upon. By proactively addressing the long-term conservation needs, the HCP/NCCP strengthens local control over land use and provides greater flexibility in meeting other needs such as housing, transportation, and economic growth in the area.

3.9.3 THRESHOLDS OF SIGNIFICANCE

Consistent with Appendix G of the CEQA Guidelines, the proposed project will have a significant impact on land use if it will:

- Physically divide an established community;
- Cause a significant environmental impact due to a conflict with any land use plan, policy, or regulation adopted for the purpose of avoiding or mitigating an environmental effect;

3.9.4 IMPACTS AND MITIGATION MEASURES

Impact 3.9-1: Physically divide an established community (Less than Significant)

The proposed Specific Plan provides the policy and implementation actions for future development of a technology park employment area on a portion of the former Delta View Golf Course. An overall goal of the proposed Specific Plan is to foster economic opportunities within the community by expanding the variety of technology-focused business park uses. While the proposed Specific Plan does allow for new development at the former golf course, the Plan Area is located south of residential areas and is abutting open space, therefore it would not divide existing communities.

The proposed Specific Plan would not preclude future linkages between the residential area and adjacent open space and recreation, such as the class I bike path along the Contra Costa Canal identified in *Pittsburg Moves*. During the development of the proposed Specific Plan, coordination between the agencies indicated that incorporating the bike path along the canal would require the undergrounding of the canal, which would not be feasible in the near-term future (City of Pittsburg

2024). In addition, the Contra Costa Canal bike path is not listed within the City's capital improvement plan, as the improvement is not identified within a high priority corridor. The proposed project would not interfere with the future undergrounding or incorporation of a class I bike path along Contra Costa Canal, and development would not interfere with required future groundwork. The proposed Specific Plan would have a **less than significant** impact associated with the physical division of an established community, and no mitigation is required.

Impact 3.9-2: Cause a significant environmental impact due to a conflict with any land use plan, policy, or regulation adopted for the purpose of avoiding or mitigating an environmental effect (Less than Significant)

STATE PLANS

Discussion of the proposed project's consistency with state regulations, plans, and policies associated with specific environmental issues (e.g., air quality, traffic, water quality, etc.) is provided in the relevant chapters of this PEIR.

EAST CONTRA COSTA COUNTY HCP/NCCP

As discussed in Section 3.4, *Biological Resources*, of this PEIR, the East Contra Costa County HCP/NCCP is intended to provide regional conservation and development guidelines to protect natural resources while improving and streamlining the permit process for endangered species and wetland regulations.

The proposed Specific Plan does not re-designate any land currently designated for open space or habitat protection. As such, the proposed Specific Plan would be consistent with the adopted HCP/NCCP in terms of land uses and habitat protection.

Chapter 4 of the proposed Specific Plan states the Plan Area is subject to the Regional General Permit (RGP). The HCP/NCCP provides a streamlined Army Corps of Engineers (ACOE) permitting and mitigation process, specifically tailored for the Plan Area. The HCP/NCCP allows for rapid and streamlined biological resource permitting, making the site well-suited for redevelopment. Additionally, it offers a mechanism for mitigation by allowing the payment of pre-determined fees rather than requiring the establishment of an on-site mitigation area. This streamlined process reduces the potential conflict with land use plans, policies, or regulations adopted to avoid or mitigate environmental effects. Therefore, the proposed project's adherence to the HCP/NCCP and its streamlined permitting and mitigation processes justifies the conclusion that the proposed development would have less than a significant environmental impact.

DELTA PLAN

As noted previously, the Delta Plan was originally adopted in May 2013 and incorporated 14 regulatory policies and 73 non-regulatory recommendations that contributed to the realization of the coequal objectives, including reduced reliance on Delta exports; final approval and adoption of the Bay Delta Conservation Plan; enhanced water quality standards; protection of the Delta's unique ecosystem; mitigation of the multiple stressors affecting the Delta; improvement of emergency preparedness throughout the Delta region; reduction of flood risk; and prioritized state investment

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in levee maintenance and upgrading. The Delta Plan is applicable to “covered actions” which are determined by the State or Local Agency State or local agency carrying out the proposed plans, programs, or project.

The proposed Specific Plan is not within the primary or secondary zones of the Delta Plan. Therefore, the Delta Plan is not applicable to the proposed project.

CITY PLANS

As set forth by state law, the 2040 General Plan serves as the primary planning document for the City and subordinate documents and plans would be updated to be consistent with the General Plan. An analysis of the proposed project’s consistency with Citywide goals, policies, and action in the 2040 General Plan is provided in Table 3.9-1 below. Goals, policies, and actions that are not applicable to the proposed project are not addressed in the table.

Overall, the proposed Specific Plan is consistent with the 2040 General Plan as it focuses on a balanced land use pattern, creating a community where new development blends with existing neighborhoods, and promoting the Plan Area as a desirable place to work. The proposed Specific Plan carries forward and enhances policies and measures from the 2040 General Plan that were intended for environmental protection and would not remove or conflict with City plans, policies, or regulations adopted for environmental protection. The proposed Specific Plan aligns with land use and zoning designations for the Plan Area set forth in the 2040 General Plan.

Subsequent development of the technology park accommodated by the proposed Specific Plan would be required to be consistent with all applicable policies, standards, and regulations, including those land use plans, policies, and regulations adopted to mitigate environmental effects by the City as well as those adopted by agencies with jurisdiction over components of future development projects. Any potential environmental impact associated with conflicts with land use plans, policies, or regulations adopted for the purpose of avoiding or mitigating an environmental effect would be **less than significant**.

TABLE 3.9-1: PROJECT CONSISTENCY WITH CITY PLANS

CITY OF PITTSBURG 2040 GENERAL PLAN	
GOALS AND POLICIES	CONSISTENCY
LAND USE	
Goal 2-1: Promote optimal, orderly, well-planned, and diverse land uses, including a compact urban form within the City's projected municipal boundary that provides a mix and distribution of uses to meet Pittsburgh's needs, including mixed-use development, infill development, and reuse and revitalization of underutilized and brownfield sites.	CONSISTENT The proposed Specific Plan would guide development for a diverse employment center on a vacant portion of the former municipal Delta View Golf Course. The proposed Specific Plan serves as a policy document with guidelines to develop a technology park. The proposed Specific Plan would be consistent with the City's goal of providing a mix and distribution of uses and use an under-utilized site.
Policy 2-P-1.2: Promote land use compatibility through development standards, use restrictions, environmental review, and design considerations.	CONSISTENT The proposed Specific Plan is consistent with the land use designation identified by the 2040 General Plan. The proposed Specific Plan proposes land use, development standards, environmental review, and design considerations that would implement the General Plan and promote compatible land use.
Action 2-A-2.a: Amend the Zoning Ordinance to: • Employ planned development to achieve high community design standards and provide projects beneficial to Pittsburgh, not to circumvent development intensity standards. • Development projects shall be designed to: ○ (i) Utilize density transitions, less intense non-residential land use designations, and buffers, including open space, drainage features, landscaping, and multi-use paths, in order to protect the integrity of existing land use patterns and minimize the impacts on existing uses and residents.	CONSISTENT Future development in the Plan Area would adhere to design standards outlined in the proposed Specific Plan that would consider materials, colors, textures, building size and proportions to blend into the natural character of the area. The proposed Specific Plan ensures adequate buffers and screening would be implemented between the Plan Area and residential areas that compliment building facades to maintain the existing surrounding character. Landscape design would also be used to soften the appearance of buildings and provide a buffer with open areas and the roadway to minimize the impacts on surrounding uses and residents.
Goal-2-4: Promote business development in a range of sectors that contribute to the local and regional economy, provide high-wage and skilled jobs for Pittsburgh residents.	CONSISTENT Allowed uses under the proposed Specific Plan would generate employment in various industries, specifically in emerging sectors such as technology and innovation. Other employment opportunities include administrative offices, research and development, manufacturing, warehouse and distribution, energy, and automobile services, which are generally high-wage sectors.

CITY OF PITTSBURG 2040 GENERAL PLAN	
GOALS AND POLICIES	CONSISTENCY
Policy 2-P-4.1: Identify and allocate adequate lands in strategic locations throughout Pittsburgh to accommodate and encourage employment growth, focusing on sectors that provide high-paid and high-quality jobs and continue to promote business development sites through Think Pittsburgh and other local programs.	CONSISTENT The Plan Area is identified in the 2040 General Plan as a strategic site for economic development within the West Leland Subarea to encourage employment growth in the area.
Policy 2-P-4.2: Encourage the development and intensification of employment centers, including high quality, professional office campuses, business parks, and industrial parks, along with innovation districts, related mixed-use development and open spaces. The centers shall be located in areas fully served by public facilities and services, located along major arterials with easy freeway access and with access from public transit, and accessible to bicyclists and pedestrians.	CONSISTENT Development in the proposed Specific Plan would generate economic employment in various industries, specifically in emerging sectors including technology and innovation. The Plan Area is currently served by utilities and would require extensions of the existing public water main line along the extension of Golf Club Road. The Plan Area is served by regional access from State Route 4 and local access from West Leland Road and Golf Club Road. Transit services are provided in the vicinity of the Plan Area, including bus and fixed rail transit. Bicycle and pedestrian facilities in the vicinity of the Plan Area include Class II bicycle facilities, sidewalks, crosswalks, pedestrian signals, and multi-use trails.
Policy 2-P-4.3: Promote large-scale office/business development, and reserve sites for Business Commercial uses in designated locations accessible from regional transportation systems.	CONSISTENT The proposed Specific Plan would guide economic generating uses to support business development in the Plan Area consistent with the 2040 General Plan ECI designation. The ECI permitted uses include offices and could be proposed as a future development project. The Plan Area is accessible by the regional transportation system. The Pittsburgh-Bay Point BART Transfer Substation is the closest rail station to the Plan Area approximately 1.3 miles away. Bus Routes 388 and 390 operate along West Leland Road.
Policy 2-P-4.5: Support office, business, and industrial land uses that will improve the City's employment base through high-quality, well-paid jobs that attract the technology, energy, and industrial sectors desired by the community.	CONSISTENT Allowed uses within the proposed Specific Plan would generate employment in emerging sectors, including technology, energy, and industrial sectors, which would generate economic opportunity within the city.

CITY OF PITTSBURG 2040 GENERAL PLAN	
GOALS AND POLICIES	CONSISTENCY
Policy 2-P-4.6: Encourage the development of “clean” industries, such as research and development, technology and specialized manufacturing, and similar uses, that limit environmental impacts and health risks commonly associated with industrial uses.	CONSISTENT Allowed uses within the proposed Specific Plan include research and development, technology and innovation including data centers, energy, focusing on clean-tech uses.
Policy 2-P-4.10: Ensure that employment-generating development, such as industrial, warehouse, distribution, logistics, and fulfillment projects, does not result in adverse impacts (including health risks and nuisances), particularly to residential uses and other sensitive receptors, including impacts related to the location and scale of buildings, lighting, noise, smell, and other environmental and environmental justice considerations. When development is incompatible, require adequate buffers and/or architectural consideration to protect residential areas, developed or undeveloped, from intrusion of nonresidential activities that may degrade the quality of life in such residential areas.	CONSISTENT Goal 3 of the proposed Specific Plan aims to incorporate development into the existing landscape while minimizing impacts to the environment and sensitive receptors. The Proposed project would employ buffers between the Plan Area and residential districts. For more information on how future development would ensure no adverse impacts to the environment or communities, please refer to Section 3.1, <i>Aesthetics and Visual Resources</i> , 3.2, <i>Air Quality</i> , and 3.10, <i>Noise</i> .
Action 2-A-4.a: Update the City’s Zoning Ordinance and Subdivision Regulations to: - Require new employment centers and industrial development to incorporate such accessory uses as public open space, amenities, transit amenities, child care facilities, and non-office retail uses based on the size and location of the development and the availability and capacity of existing accessory uses. - Require new and renovated employment center development be designed to accommodate safe and convenient walking, biking, and transit use, and provide an attractive, high-quality “campus environment.”	CONSISTENT The Plan Area would include an integrated sidewalk and roadway network meant to encourage movement of vehicles, pedestrians, and cyclists as stated in Section 6.3 of the proposed Specific Plan. Future development would be required to adhere to the City’s zoning Ordinance and Subdivision Regulations.
Action 2-A-4.b: As part of the City’s development review process, continue to ensure that employment-generating projects are designed to minimize conflicts with residential uses, sensitive receptors, and disadvantaged communities. Review of employment-generating projects should ensure that the following design concepts are addressed in projects that abut residential areas, sensitive receptors, or disadvantaged communities:	CONSISTENT Future development in the Plan Area would incorporate design concepts that would reduce conflicts with surrounding uses and communities at the site level. Standards outlined in the proposed Specific Plan consider screening and buffering between equipment and residential districts, truck ingress and egress located at the back of buildings, and materials that are textured as to reduce glare onto other properties.

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• Appropriate building scale and/or siting; • Site design and features to protect residential uses and other sensitive receptors, developed or undeveloped, from impacts of non-residential development activities that may cause unwanted nuisances and health risks and to ensure that disadvantaged communities are not exposed to disproportionate environmental or health risks. The site design and features shall be based on best management practices as recommended by CARB, Bay Area Air Quality Management District (BAAQMD), and the California Attorney General; • Site design and noise-attenuating features to avoid exposure to excessive noise due to long hours of operation or inappropriate location of accessory structures; • Site and structure design to avoid excessive glare or excessive impacts from light sources onto adjacent properties; and • Site design to avoid unnecessary loss of community and environmental resources (archaeological, historical, ecological, recreational, etc.).	Landscape design would be used to soften the appearance of buildings and provide a buffer with open areas and the roadway to minimize the impacts on surrounding uses and residents. Future projects would be required to comply with air quality mitigation measures (MM) 3.2-1 through MM 3.2-4 and noise measures MM 3.10-1 through 3.10-3 to minimize unwanted nuisances and health risks to adjacent sensitive receptors. Future development projects would also be required to implement biological mitigation measures MM 3.3-1 through 3.3-10 to protect special status species and habitat. Furthermore, future development would implement MM 3.4-1 through 3.4-3 and 3.5-1 through 3.5-3 to avoid unnecessary loss of archaeological, historical, and paleontological resources.
Action 2-A-4.c: When industrial projects and other higher intensity use projects, including warehouse projects, fulfillment centers, and other projects that may generate high volumes of truck trips and/or air quality emissions are proposed within 1,000 feet of existing or planned residential uses or other sensitive receptors, the City shall require: • The preparation of a Health Risk Assessment (HRA) that meets the standards established by the Office of Environmental Health Hazard Assessment (OEHHA, and BAAQMD. Projects shall not be approved until it can be demonstrated that the project would not result in an exceedance of the established thresholds of significance for public health risks at nearby sensitive receptors; and	CONSISTENT Future development within the Plan Area would be required to conform to the 2040 General Plan, PMC, and proposed Specific Plan zoning, development standards and design guidelines. More detail on how future development would adhere to air quality conformance standards can be found in Section 3.2, <i>Air Quality</i>.

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- The implementation of best management practices (BMPs) to reduce pollution exposure to sensitive receptors, particularly diesel particulate matter (DPM). The appropriate BMPs shall be established on a case-by-case basis, will be based on BMPs recommended by CARB, BAAQMD, and the California Attorney General, including the Warehouse Projects: Best Practices and Mitigation Measures to Comply with the California Environmental Quality Act and Good Neighbor Guidelines for Warehouse Distribution Facilities, and shall consider the following tools, methods, and approaches: - Creating physical, structural, and/or vegetative buffers that adequately prevent or substantially reduce pollutant dispersal between warehouses and any areas where sensitive receptors are likely to be present, such as homes, schools, daycare centers, hospitals, community centers, and parks. - Providing adequate areas for on-site parking, on-site queuing, and truck check-in that prevent trucks and other vehicles from parking or idling on public streets. - Placing facility entry and exit points from the public street away from sensitive receptors, e.g., placing these points on the north side of the facility if sensitive receptors are adjacent to the south side of the facility. Exceptions can be made for emergency vehicle access (EVA) points. - Locating warehouse dock doors and other onsite areas with significant truck traffic and noise away from sensitive receptors, e.g., placing these dock doors on the north side of the facility if sensitive receptors are adjacent to the south side of the facility. - Screening dock doors and onsite areas with significant truck traffic with physical, structural, and/or vegetative barriers	

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that adequately prevent or substantially reduce pollutant dispersal from the facility towards sensitive receptors. ○ Posting signs clearly showing the designated entry and exit points from the public street for trucks and service vehicles. ○ Posting signs indicating that all parking and maintenance of trucks must be conducted within designated on-site areas and not within the surrounding community or public streets.	
GROWTH MANAGEMENT	
Policy 3-P-1.2: Manage the City's growth to balance development of housing options and job opportunities, protection of open space and habit areas, construction of transportation improvements, and preservation of high quality high-quality public facilities.	CONSISTENT The proposed Specific Plan is consistent with the 2024 General Plan land use patterns, as it would provide job opportunities proximal to housing while preserving hillside open space, sensitive habitats, such as drainages (outside of building envelopes), and necessary transportation infrastructure to support the proposed project.
Policy 3-P-1.3: Provide a range of development intensities, with the highest intensities in Downtown and in areas proximate to transit and services, and lower intensities in hillside and at the City's southern edge, with an emphasis on land use patterns that make efficient use of the local and regional transportation systems and consider conservation of natural resources.	CONSISTENT The proposed Specific Plan would support land use patterns by providing job opportunities close to housing while at the same time preserving hillside open space, sensitive habitats, such as drainages (outside of building envelopes). Future development within the Plan Area would support transportation infrastructure and maintain connectivity from the Plan Area to the City and regional circulation systems.
URBAN DESIGN	
Policy 4-P-1.2: Encourage and support high-quality design that evokes Pittsburgh's history and unique character through ensuring standards and guidelines for residential, commercial, industrial, mixed use, civic, and other uses incorporate features and materials design that reinforces Pittsburgh's community character.	CONSISTENT Future development would be required to adhere to design standards identified in the proposed Specific Plan, which are intended to ensure buildings would blend with the character of the existing environment. See Section 3.1, <i>Aesthetics and Visual Resources</i> , of this PEIR for more detail.
Policy 4-P-1.4: Seek methods to improve the visual character and design of Pittsburgh, including establishing design standards for gateways, key corridors, residential uses, and non-residential uses, promoting high-quality redevelopment and reuse projects, and addressing features that may adversely	CONSISTENT. Future development would be required to adhere to design standards in the proposed Specific Plan, which are intended to ensure buildings would blend with the character of the Plan Area. Landscaping throughout the Plan Area would soften the appearance of buildings and blend with the natural environment. Landscape design would be used as

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affect views of gateways, ridgelines, open space, and other identified visual resources.	buffering between open areas and roadways. See Section 3.1, <i>Aesthetics and Visual Resources</i> , of this PEIR for more detail.
Policy 4-P-2.10: Use revegetation as an erosion control measure to maintain the natural character of a hillside; utilize hydro-seed, silt traps, and other engineering solutions where erosion potential exists during development.	CONSISTENT Landscaping would be used as storm water management best practices to reduce stormwater related erosion. Landscape design standards also require ground cover to reach 100 percent within one year. See Section 3.8, <i>Hydrology and Water Quality</i> , for more detail.
ECONOMIC DEVELOPMENT	
Policy 6-P-2.9: Encourage new development in areas where growth and investment have the potential to catalyze revitalization of existing uses.	CONSISTENT Allowed uses within the proposed Specific Plan would facilitate economic development and employment in an area that is surrounded by supportive uses including residential and community commercial. The proposed Specific Plan would re-purpose and revitalize the former golf course, which has been closed for over six years.
Policy 6-P-2.11: Provide appropriate incentives for infill and redevelopment projects that have the potential to revitalize existing neighborhoods or commercial areas.	CONSISTENT The proposed Specific Plan would redevelop the former municipal Delta View Golf Course, which is currently closed and vacant, providing increased opportunity to revitalize the surrounding area.
Policy 6-P-2.14: Encourage new businesses and project development under the Employment Center Industrial land use classification.	CONSISTENT The proposed Specific Plan would permit land uses under the Employment Center Industrial land use classification, generating new business opportunities and future development.
Action 6-A-5.c: Undertake a detailed study to assess the true costs of development and establish an appropriate impact fee schedule to ensure that new development “pays its own way” with respect to infrastructure and servicing.	CONSISTENT Future development allowed by the proposed Specific Plan would be required to adhere to the City’s development impact fee standards.
CIRCULATION AND TRANSPORTATION	
Policy 7-P-1.1: Ensure that the City’s circulation network is a well-connected system of streets, roads, highways, sidewalks, trails, and paths that effectively and safely accommodate all users in a manner that considers the context of surrounding land uses, the needs of all roadway users, and is maintained and improved over time to support buildout of the General Plan.	CONSISTENT The proposed Specific Plan would provide connections from the Plan Area to the City’s existing circulation network via Golf Club Drive. Future development would be required to pay Transportation Impact Mitigation Fees (TIMF) to pay its fair share for a well-connected system, per MM 3.13-3 . See Section 3.13, <i>Transportation and Circulation</i> , of this PEIR for more detail.

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Policy 7-P-1.5: Implement and continue to increase efforts to reduce regional vehicle miles traveled (VMT) by supporting land use patterns and site designs that promote active modes of transportation, and public transit.	CONSISTENT The proposed Specific Plan includes standards that encourage pedestrian circulation through an integrated sidewalk network with access points at Golf Club Road. Future development would adhere to CalGreen code, which includes standards for bike and pedestrian facilities. Furthermore, Transportation and Circulation MM 3.13-1 would require future development to create and implement a Travel Demand Management Plan (TDM Plan) to encourage a reduction in regional VMT. See Section 3.13, <i>Transportation and Circulation</i> , of this PEIR for more detail.
Policy 7-P-1.6: Design streets to operate with vehicle speeds that are safer for all users, especially pedestrians and bicyclists, while providing adequate access for emergency vehicles. Speed reductions strategies should include reduced lane widths and application of traffic calming measures on local and collector streets and especially near parks, schools, trails, and in the Downtown core.	CONSISTENT As described in the proposed Specific Plan and Section 3.13 of this PEIR, the proposed Specific Plan would allow for an extension of Golf Club Road to serve the Plan Area, which is intended to provide private access to the Plan Area. Additionally, three emergency vehicle access roadways would provide access to the Plan Area. These roadways are private and only used when necessary by emergency responders. Therefore, constructing these roadways to City standards to include traffic calming and speed-reduction features would not be required.
Policy 7-P-1.7: Strive to maintain delay-based level of service (LOS) D for motor vehicle traffic as the minimum acceptable service standard for all signalized and stop-controlled intersections at all times (including during peak periods) unless maintenance of LOS would, in the City's judgement, be infeasible and/or conflict with the achievement of other City goals identified in this General Plan. Congestion in excess of LOS D may be acceptable in these cases, provided that provisions are made to improve traffic flow and/or promote multimodal or non-vehicular transportation as part of a development project or City-initiated project. In the designated Downtown core, as defined by the City's General Plan and illustrated by the City's Subdivision map, LOS E would be considered as an acceptable service standard to account for the more urban, pedestrian-oriented character of the area.	CONSISTENT Future development would be required to perform a level of service in accordance with the City's Traffic Impact Analysis Guidelines. Any violations of the guidance shall result in improvement measures developed to eliminate those violations, per MM 3.13-2 . See Section 3.13, <i>Transportation and Circulation</i> , of this PEIR for more detail.

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Policy 7-P-1.9: Implement transportation improvements to maintain and enhance roadway operations and safety while striving to improve accessibility and comfort for all users.	CONSISTENT As previously described, future development accommodated by the proposed Specific Plan would be required to pay all applicable TIMFs to support future transportation improvements within the City, per MM 3.13-3 .
Action 7-A-1.a: Evaluate projects traffic and Vehicle Miles Traveled (VMT) impacts of development projects based on the City's Transportation Impact Analysis Guidelines to determine transportation impacts to all users, including pedestrians, bicyclists, transit riders, and motorists, and to require projects to address impacts consistent with the requirements of CEQA.	CONSISTENT A VMT analysis was prepared for buildout of the Plan Area as detailed in Section 3.13. Results of the VMT analysis concludes that future development would result in VMT levels above the City's threshold. Travel Demand Management (TDM) Plans shall be prepared and implemented for future development to minimize impacts from increased VMT, per MM 3.13-1 . TDM plans shall identify trip reduction strategies and the mechanisms for funding and monitoring of such programs and strategies.
Action 7-A-1.b: Require proposed development projects with VMT levels above the City's threshold to consider reasonable and feasible project modifications and other measures during the project design and review stage and the environmental review stage that would reduce VMT effects in a manner consistent with the City's sustainability goals, the City's Transportation Impact Analysis Guidelines, and with State guidance on VMT reduction.	CONSISTENT See response to Action 7-A-1.a above.
Action 7-A-1.d: Require new development to pay its fair share of the costs of street and other transportation improvements in conformance with the goals and policies established in this Circulation Element and the Transportation Impact Mitigation Fee (TIMF) program.	CONSISTENT Future development accommodated by the proposed Specific Plan would be required to pay TIMFs, per MM 3.13-3 .
Action 7-A-1.e: Use traffic calming tools and speed reduction strategies in new development and the design of roadway improvements to assist in implementing complete street principles and encouraging active transportation. Possible tools include roundabouts, raised intersections, curb extensions, reduced roadway width, high visibility crosswalks, and rapid flashing beacons.	CONSISTENT The proposed Specific Plan would extend Golf Club Road, which is intended to provide private access to the Plan Area. Additionally, three emergency vehicle access roadways would provide access to the Plan Area. These roadways are private and only used when necessary by emergency responders. Therefore, constructing these roadways to City standards to include traffic calming and speed-reduction features would not be required.

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Policy 7-P-2.2: Encourage employers to provide programs for carpooling/transit/biking/walking subsidies, bicycle facilities, alternative work schedules, ridesharing, telecommuting, working at home, employee education, and preferential parking for carpools/vanpools.	CONSISTENT Future Travel Demand Management (TDM) Plans shall be prepared and implemented for future development, per MM 3.13-1 . TDM plans shall identify trip reduction strategies and the mechanisms for funding and monitoring of such programs and strategies. These strategies may include but are not limited to car-sharing programs and alternate work schedules.
Policy 7-P-2.4: Ensure that safe and continuous routes for pedestrians and bicyclists are provided within new development projects and on any roadways that are impacted as a result of new development.	CONSISTENT The proposed Specific Plan would extend Golf Club Road, which is intended to provide private access to the Plan Area. Additionally, three emergency vehicle access roadways would provide access to the Plan Area. Therefore, constructing these roadways to City standards to include safe and continuous routes for pedestrians and bicyclists would not be required.
Action 7-A-2.e: Preserve options for future transit use when designing improvements for roadways. Ensure that developers provide bus turnouts and/or shelters, where appropriate, as part of projects.	CONSISTENT Transit stops are already located directly north of the Plan Area near its entrance along west Leland Road. Future development within the Plan Area would be required to preserve and replace or provide options for future transit use should additional stops be needed in the future, as outlined in future TDM Plans.
Action 7-A-2.f: Require new developments to provide public access and infrastructure, as appropriate, that support internal connectivity, multimodal transportation, and integration into the surrounding transportation networks.	CONSISTENT Future development within the Plan Area would provide connections to the City's existing circulation network to facilitate efficient access to surrounding streets and transportation networks, including roadways, bicycle, and pedestrian improvements.
Action 7-A-2.h: Require mitigation for development projects that increase transit demand above the service levels provided by public transit operators and agencies, or, create conflicts with existing transit operations.	CONSISTENT Future development would not conflict with transit, pedestrian, or bicycle facilities. Future development would be required to pay TIMFs, per MM 3.13-3 .
Action 7-A-2.i: As part of development approval, ensure that safe and contiguous routes for pedestrians and bicyclists are provided within the development projects and on any roadways that are impacted as a result of new development.	CONSISTENT The proposed Specific Plan would extend Golf Club Road, which is intended to provide private access to the Plan Area. Additionally, three emergency vehicle access roadways would provide access to the Plan Area. Therefore, constructing these roadways to City standards to include safe and continuous routes for pedestrians and bicyclists would not be required.

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Action 7-A-2.k: Encourage developers to provide enhanced TDM programs and alternative transportation infrastructure that exceeds minimum requirements, as per 7-A-2.j, in exchange for reduced parking requirements, with a focus on priority development areas and locations in proximity to high capacity transit.	CONSISTENT Travel Demand Management (TDM) Plans shall be prepared and implemented for future development, per MM 3.13-1 . TDM plans shall identify trip reduction strategies and the mechanisms for funding and monitoring of such programs and strategies.
Action 7-A-2.m: Encourage major employers to establish designated carpool parking areas, designated electric vehicle (EV) / Clean Air Vehicle (CAV) parking, and secure on-site bicycle facilities.	CONSISTENT Future development accommodated by the proposed Specific Plan would be required to comply with the current California Building Code at the time of application, including the “CalGreen” code for electric vehicle parking standards. In addition, bike facilities would be required and determined based on a ratio to the number of parking required. Furthermore, per MM 3.13-1 , TDM Plans shall identify additional details on bicycle facility improvements for each subsequent phase of development.
Action 7-A-2.o: Require development projects to provide or fund their fair-share of bicycle and pedestrian facilities improvements in order that sufficient facilities for pedestrians and bicyclists may be constructed throughout the City.	COSISTENT Future development accommodated by the proposed Specific Plan would be required to pay TIMFs, per MM 3.13-3 .
Policy 7-P-3.4: Ensure continued compliance with Title 24 of the California Building Code, requiring the removal of all barriers to disabled persons on City streets, and compliance with the Americans with Disabilities Act (ADA) to allow mobility-impaired users such as the disabled and elderly to safely and effectively use the City’s circulation network.	CONSISTENT All future development accommodated by the proposed Specific Plan would be required to comply with the current California Building Code.
Policy 7-P-3.5: Encourage secure bicycle facilities and other alternative transportation facilities to be provided as part of new developments, especially future employment sites, public facilities, and multi-family residential complexes.	CONSISTENT Future development accommodated by the proposed Specific Plan would be required to comply with the current California Building Code at the time of application, including the “CalGreen” code for electric vehicle parking standards. In addition, bike facilities would be required and determined based on a ratio to the number of parking required. Furthermore, per MM 3.13-1 , TDM Plans shall identify additional details on bicycle facility improvements for each subsequent phase of development.

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Policy 7-P-4.2: Use the adopted regional and local Transportation Impact Mitigation Fee (TIMF) ordinances to ensure that all new developments pay a fair share of the cost of transportation improvements, or require mitigation for development proposals that are not part of the TIMF program which contribute more than one percent of the volume to an existing roadway or intersections.	CONSISTENT Future development would be required to pay TIMFs to contribute to the necessary capital for improvement projects for a well-connected system, per MM 3.13-3 .
Action 7-A-4.c: Continue to collect fees, plan, and design for the future construction of the improvements shown in Figure 7-1, including new roadways and roadway extensions, and improvements identified in Table 7-2 (Bailey Road and West Leland Road and Railroad Avenue and SR-4 WB On-Ramp).	CONSISTENT Future development accommodated by the proposed Specific Plan would be required to pay applicable TIMFs, per MM 3.13-3 .
COMMUNITY HEALTH & ENVIRONMENTAL JUSTICE	
Policy 8-P-1.4: Consider the effects of planning decisions on the overall health and well-being of the community and its residents and specifically upon disadvantaged communities and vulnerable populations, such as areas with concentrated populations of seniors, persons with a disability, and low income residents.	CONSISTENT Future development within the Plan Area would be required to adhere to best management practices established by the Bay Area Air Quality Management District (BAAQMD) to reduce pollution exposure to sensitive receptors. Furthermore, air quality mitigation measures MM 3.2-1 through 3.2-3 would be implemented as applicable, to ensure air quality thresholds are not exceeded (see MM 3.2-1 through MM 3.2-4). Development projects accommodated by the proposed Specific Plan shall not be approved until it can be demonstrated that the proposed project would not result in an exceedance of the thresholds as advised by the Office of Environmental Health Hazard Assessment and Bay Area Air Quality Management District for public health risks at nearby sensitive receptors. Additionally, future development accommodated by the proposed Specific Plan would be required to reduce noise levels to acceptable thresholds during construction and operations. If noise levels are anticipated to be above acceptable thresholds, MM 3.10-1 through 3.10-3 would be implemented. See Sections 3.2, <i>Air Quality</i> and 3.10, <i>Noise</i> , of this PEIR for more detail.

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Policy 8-P-1.6: Consider the effects on sensitive populations when siting industrial and other intensive uses, designating Citywide truck routes, and considering uses and projects that may have adverse impacts on disadvantaged and vulnerable communities.	CONSISTENT Development accommodated by the proposed Specific Plan would incorporate best management practices that would consider certain tools, methods, and approaches in reducing pollution, particularly diesel particulate matter, on disadvantaged and vulnerable communities. Air quality mitigation measures MM 3.2-1 through 3.2-3 would be implemented as applicable to ensure air quality thresholds are not exceeded. Similarly, noise measures MM 3.10-1 through 3.10-3 would be implemented as applicable to ensure noise thresholds are not exceeded. Refer to Sections 3.2, <i>Air Quality</i> and 3.10, <i>Noise</i> , of this PEIR for more detail.
Policy 8-P-1.12: Identify and assess disproportionate impacts of environmental pollution and work to remedy these impacts.	CONSISTENT Future development accommodated by the proposed Specific Plan would be required to conduct a project-level air quality analysis to determine potential construction air quality impacts. Identification of mitigation measures necessary to reduce any significant impacts shall be developed in coordination with the BAAQMD (MM 3.2-1). See Section 3.2, <i>Air Quality</i> , of this PEIR for more detail. Similarly, future development accommodated by the proposed Specific Plan would be required to reduce noise levels to acceptable thresholds. If noise levels are anticipated to be above acceptable thresholds, MM 3.10-1 through 3.10-3 would be implemented. Refer to Section 3.10, <i>Noise</i> , of this PEIR for further discussion.
Action 8-A-1.b: Review all development proposals, planning projects, and infrastructure projects to ensure that potential adverse impacts to disadvantaged communities, such as exposure to pollutants, including toxic air contaminants, are not disproportionate, and are reduced to the greatest extent feasible.	CONSISTENT Future development accommodated by the proposed Specific Plan would incorporate best management practices and measures, such as air quality MM 3.2-1 through 3.2-4 to ensure development would not have an adverse impact.
Action 8-A-1.c: Promote and implement the goals, policies, and actions for each strategy of the Pittsburgh Sustainability Plan, including: • C-1 Cornerstone to Climate Action Planning • E-1 Electrify the Building Stock	CONSISTENT The Sustainability Plan contains goals and policies to guide the City towards a sustainable future by meeting the needs of the community. This includes promoting economic viability, environmental protection, and social responsibility, all while lowering GHG emissions. Allowable uses and the location of the Plan Area ensures access to a diverse economy, while

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• E-2 Decarbonize Electricity and Inase Use and Storage of Local Renewable Energy • T-1 Reduce Passenger Car Vehicle Miles Traveled • T-2 Increase Zero-Emission Vehicle and Equipment Use • W-1 Increase Water Conservation and Local Water Supply • W-2 Minimize Water Loss System-wide • SW-1 Organic Waste Diversion • SW-2 Reduce Community Waste Generation • CS-1 Carbon Sequestration • M-1 Commit to Climate Action • M-2 Reduce Municipal Reliance on Natural Resources	incorporating TDM strategies to lower GHG emissions. Future development would adhere to CalGreen code, including site design standards that support bike and pedestrian facilities, and electric charging stations for a shift from non-renewable energy dependency. Allowable uses within the Plan Area include sustainable energy sectors, which would promote clean energy while promoting economic growth for a viable and sustainable future.
Policy 8-P-2.2: Require future planning decisions, development, and infrastructure and public projects to consider the effects on the overall health and well-being of the community and its residents, with specific consideration provided to ensure disadvantaged communities have equitable access to services and amenities and to reduce exposure to hazardous materials, industrial activity, vehicle exhaust, other sources of pollution, and excessive noise on residents, with an emphasis on reducing exposure of any disadvantaged communities to such exposure.	CONSISTENT Subsequent development within the Plan Area would be required to incorporate best management practices that would minimize pollution exposure, particularly diesel particulate matter, on nearby sensitive receptors (see MM 3.2-1 through 3.2-3). Furthermore, if future development cannot adhere to the applicable noise level thresholds, a construction and/or operation noise mitigation plan shall be submitted prior to development (see MM 3.10-1 through 3.10-3). Refer to Sections 3.2, <i>Air Quality</i> and 3.10, <i>Noise</i>, of this PEIR for more detail.
Action 8-A-2.a: Review all development proposals, planning projects, and infrastructure projects to ensure that potential adverse impacts to disadvantaged communities, such as exposure to pollutants, including toxic air contaminants, and unacceptable levels of noise and vibration are reduced to the extent feasible and that measures to improve quality of life, such as connections to bicycle and pedestrian paths, community services, schools, and recreation facilities, access to healthy foods, and improvement of air quality are included in the project. The review shall address both the construction and operation phases of the project.	CONSISTENT see response to Policy 8-P-2.2 above.

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RECREATION & YOUTH	
Policy 9-P-1.5: Maintain park and recreation facility standards for new development to serve both residents and employees, attainable through, in order of priority: 1) provision of fully developed parks, 2) dedication of parkland, or 3) payment of in-lieu fees dedicated to the provision of new park sites or enhancing existing facilities.	CONSISTENT Future development accommodated by the proposed Specific Plan would be required to pay development impact fees that would contribute to the maintenance of park and recreation facilities throughout the City. Refer to Section 3.12, <i>Public Services and Recreation</i> , of this PEIR for more detail.
Policy 9-P-2.2: Development projects adjacent to open space, shoreline, hillside, and other recreational areas shall provide public connections and linkages.	CONSISTENT Development within the Plan Area would not preclude future connections by the City or other agencies to adjacent open space or recreational areas, including the potential future bikeway along the Contra Costa Canal, as identified in the 2040 General Plan.
Policy 10-P-1.7: Provide, and encourage access to, public and private open space within urbanized parts of Pittsburg, in order to provide for the recreational and public health needs of residents and provide visual contrast with the built environment.	CONSISTENT See response to Policy 9-P-2.2 above.
Policy 10-P-1.8: Require development projects to maximize the potential for open space, visual experiences, and passive and active recreation.	CONSISTENT As described above, development in the Plan Area would not preclude future connections by the City or other agencies to development of the future Contra Costa Canal bikeway connection, as described in the 2040 General Plan. Future development of this bikeway could maximize the potential for open space and active recreation by linking the Plan Area to adjacent recreational facilities such as the John Henry Park and Stoneman Trail. Additionally, proposed Specific Plan guidelines incorporate landscape materials for visual interest and blending the natural and built environment within the Plan Area.
Action 10-A-1.c: Require all new development to provide linkages to existing and planned open space that would logically be connected through the project.	CONSISTENT See response to Policy 9-P-2.2 above.
RESOURCE CONSERVATION & OPEN SPACE	
Policy 10-P-1.8: Require development projects to maximize the potential for open space, visual experiences, and passive and active recreation.	CONSISTENT Future development would be required to adhere to urban design and resource conservation & open space policies that encourages the preservation of ridgeline views, as described further in Section 3.1, <i>Aesthetics and Visual Resources</i> , of this PEIR.

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Policy 10-P-2.5: Conserve natural terrain, native vegetation, and sensitive habitats and recognize the role of native vegetation, natural terrain and green infrastructure in natural resource and watershed management.	CONSISTENT Siting of future development would be encouraged to be placed in areas that are feasible for ground stability and erosion control. Hillside placement would be avoided, and the natural terrain would be preserved. Additionally, landscape design standards in the proposed Specific Plan would ensure a blend of the natural environment by utilizing native vegetation as landscape materials. Furthermore, native vegetation would serve as stormwater best management practices, contributing to the reduction in stormwater pollution on watersheds.
Policy 10-P-2.8: Require new development projects and expansion of existing uses to conserve sensitive habitat, including special status species.	CONSISTENT Future development projects would be required to adhere to the East Contra Costa HCP/NCCP requirements. This includes preconstruction surveys for Golden Eagle, Burrowing Owl, Swainson's Hawk, and San Joaquin kit fox, per MM 3.3-3 . Additionally, future development would be required to conduct preconstruction surveys by a qualified entomologist for several special-status species including candidate bumble bee, monarch butterfly, western pond turtle, candidate nesting birds, bald eagle, candidate bats, San Joaquin pocket mouse, and American badger, per MM 3.3-5 through MM 3.3-12 , respectively.
Policy 10-P-2.14: Collaborate with developers to maintain, and where feasible establish enhancements to, creeks, marshes, wetlands, and riparian corridors in the design of new development.	CONSISTENT The proposed Specific Plan establishes envelopes for future development, which preserve stream corridors and riparian habitat within the Plan Area.
Policy 10-P-2.15: Protect and restore threatened natural resources, such as wildlife, estuaries, tidal zones, marine life, wetlands, and waterfowl habitat.	CONSISTENT As described in response to Policy 10-P-2.8 above, future development would protect and restore biological resources by complying with the East Contra Costa HCP/NCCP requirements. Refer to Section 3.4, <i>Biological Resources</i> , of this PEIR for more detail.
Policy: 10-P-2.16: Limit dredging and filling of wetlands and marshlands, particularly adjacent to Browns Islands Preserve.	CONSISTENT Future development would be encouraged to preserve existing wetlands in the Plan Area as described in response to Policy 10-P-2.14 above. Any dredging or filling of wetlands required by development would be required to adhere to the East Contra Costa HCP/NCCP requirements details in Section 3.4, <i>Biological Resources</i> , of this PEIR.

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Policy 10-P-2.18: Recognize that climate change impacts may influence future guidance, and best available data, and continue to ensure that up-to-date information is consulted when reviewing projects for potential impacts to biological resources, including the Bay, Delta, and sensitive habitats.	CONSISTENT During the development review process, applicants would be required to provide supportive documents for project approval that indicate biological conformance, such as proof of East Contra Costa HCP/NCCP fee payment and copies of regulatory resource agency permits.
Action 10-A-2.g: Intermix areas of pavement with naturally vegetated infiltration sites to minimize the concentration of stormwater runoff from pavement and structures.	CONSISTENT Landscape design standards require the use of native vegetation at stormwater best management practices sites, which are typical of biological infiltration. Additionally, future development will be required to submit detailed landscape design plans as part of the design review process.
Action 10-A-2.h: Require an encroachment permit from Contra Costa Water District (CCWD) for any storm drain facility or increase in runoff, as determined by a hydrological study, that will add load to existing facilities crossing or encroaching onto Contra Costa Canal rights-of-way.	CONSISTENT Future development projects would be required to obtain all applicable permits, including an encroachment permit from CCWD.
Policy 10-P-3.1: Require development to use best management practices (BMPs) to minimize the runoff and erosion caused by earth movement.	CONSISTENT As described in Section 3.8, <i>Hydrology and Water Quality</i> , of this PEIR, future development project applicants must develop and implement a Storm Water Pollution Prevention Plan (SWPPP) that includes BMPs to minimize runoff and erosion.
Policy 10-P-3.2: Encourage preservation of natural creeks and riparian habitat as best as possible.	CONSISTENT See response to Policy 10-P-2.14.
Policy 10-P-4.4: Address soil and groundwater pollution during development, redevelopment, and reuse projects.	CONSISTENT As discussed in Section 3.8 of this PEIR, impacts to groundwater recharge and stormwater drainage would be evaluated at the project-level in association with subsequent development projects. As future development and infrastructure projects are considered, each project will be evaluated for conformance with the General Plan, PMC, and other applicable regulations.
Policy 10-P-4.5: Reduce sedimentation and erosion of waterways by minimizing site disturbance and vegetation removal.	CONSISTENT As described in Section 3.8, <i>Hydrology and Water Quality</i> , of this PEIR, future development project applicants must develop and implement a Storm Water Pollution Prevention Plan (SWPPP) that includes BMPs to minimize sedimentation and erosion of waterways.

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Policy 10-P-4.6: Encourage rehabilitation and revegetation of riparian corridors and wetlands throughout the City to contribute to bioremediation and improved water quality.	CONSISTENT As described in Section 3.3, <i>Biological Resources</i> , of this PEIR, future development projects accommodated by the proposed Specific Plan would implement MM 3.4-1 and MM 3.4-3 , ensuring that effects to riparian corridors and wetlands are avoided and/or compensated.
Policy 10-P-4.8: Protect water quality by reducing non-point sources of pollution and the dumping of debris in and near creeks, storm drains, and Contra Costa Canal. All drainage from new development should either be directed to an appropriate storm drain system that avoids CCWD facilities and Contra Costa Canal right-of-way, or obtain an encroachment permit from CCWD consistent with Action 10-A-2.h.	CONSISTENT As future development and infrastructure projects are considered, each project will be evaluated for conformance with the General Plan, PMC, and other applicable regulations. Implementation of BMPs identified in the approved SWPPP will further protect water quality.
Policy 10-P-4.9: Require projects to comply with best management practices for development and construction on sites where the erosion potential is moderate to severe or which may affect riparian areas, which may include: • Use of bench terraces where areas of long slopes may create a stormwater gradient flow; • Construction of berms between any riparian corridor and the construction site to preclude sediment in stormwaters and sheet-floods from entering riparian zones; and • Completing the storm drainage system in the early phase of construction to manage stormwater runoff during construction.	CONSISTENT As future development and infrastructure projects are considered, each project will be evaluated for conformance with the General Plan, PMC, and other applicable regulations. Implementation of BMPs identified in the approved SWPPP will further protect water quality.
Action 10-A-4.d: Review and update BMPs as necessary to promote state-of-the-art construction practices to ensure that development projects consider the effects of construction debris and sediment on local water supplies.	CONSISTENT Future development projects accommodated under the proposed Specific Plan would comply with design specifications and BMPs as required by applicable regulations and policies.
Action 10-A-4.e: Monitor land uses discharging into groundwater recharge areas to prevent potential contamination from hazardous or toxic substances.	CONSISTENT Future development would be required to comply with the applicable NPDES permit, which regulates trash, pollutants of concern, and excessive hydrologic runoff which can carry sediment and cause flooding. Additionally, if accidental release of hazardous materials were to occur, the local CUPA and emergency management agencies would response. The release of hazardous or toxic substances would be managed through the implementation of California Code of Regulations, California Health and

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	Safety Code, California Fire Code, DTSC regulations, RCRA regulations. See Section 3.8, <i>Hydrology and Water Quality</i> , and 3.7, <i>Hazards and Hazardous Materials</i> , of this PEIR for more detail.
Policy 10-P-5.5: Require new development to avoid obstructing views of, and to minimize impacts to, significant visual resources through the following: creative site planning; integration of natural features into the project; appropriate scale, materials, and design to complement the surrounding natural landscape; clustering of development to preserve open space vistas and natural features; minimal disturbance of topography; and creation of contiguous open space networks.	CONSISTENT New development would be required to adhere to the 2040 General Plan policy that supports high quality design to protect visual resources and proposed Specific Plan design guidelines regarding building form, materials, landscaping, and screening. Refer to Section 3.1, <i>Aesthetics and Visual Resources</i> , of this PEIR for more detail.
Policy 10-P-5.6: Ensure that the visibility of new development from natural features and open space areas is minimized to preserve the landforms and ridgelines that provide a natural backdrop to the open space systems.	CONSISTENT Future development would be required to adhere to urban design and resource conservation & open space policies that encourages the preservation of ridgeline views, as described further in Section 3.1, <i>Aesthetics and Visual Resources</i> , of this PEIR.
Policy 10-P-6.1: Support the principles of reducing air pollutants and greenhouse gas emissions through comprehensive and sustainable land use, transportation, and energy planning and addressing opportunities to decrease emissions associated with local government operations.	CONSISTENT Future development is consistent with the City's Sustainability Plan, as described in Section 3.2, and 3.6 of this PEIR. In addition, TDM Plans would be required for future development, as described further in Section 3.13, <i>Transportation and Circulation</i> , of this PEIR.
Policy 10-P-6.2: Ensure that new development is consistent with the energy objectives and targets identified by the City's Sustainability Plan.	CONSISTENT Future development would adhere to the objectives and targets identified by the City's Sustainability Plan, as described in 3.6, <i>Greenhouse Gas Emissions and Energy</i> , of this PEIR.
Policy 10-P-6.4: Encourage and support infill, mixed use, and higher density development, where appropriate, in order to reduce GHG emissions associated with vehicle travel.	CONSISTENT The proposed Specific Plan proposes employment generating uses on an infill site in close proximity to housing and transit.
Policy 10-P-6.6: Reduce the generation of TACs such as ozone, carbon monoxide, lead, and particulate matter to work toward improving air quality and meeting all Federal and State ambient air quality standards.	CONSISTENT Subsequent development in the Plan Area would be required to adhere to 2040 General Plan policies that limit or avoid the exposure of toxic contaminants, odors, and dust on receptors, with guidance from the Bay Area Air Quality Management District. These policies are further described in Section 3.2, <i>Air Quality</i> , of this PEIR.

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Policy 10-P-6.7: Reduce the potential for human discomfort or illness due to local concentrations of toxic contaminants, odors, and dust.	CONSISTENT Subsequent development in the Plan Area would be required to adhere to 2040 General Plan policies that limit or avoid the exposure of toxic contaminants, odors, and dust on receptors, with guidance from the Bay Area Air Quality Management District. These policies are further described in Section 3.2, <i>Air Quality</i> , of this PEIR.
Policy 10-P-6.9: Coordinate and review at the time of submittal of land use planning applications and development project BMPs and standards to prevent odors and odor complaints	CONSISTENT Future development would adhere to all applicable standards for project approval, as directed by the City as further described in Section 3.2, <i>Air Quality</i> , of this PEIR.
Policy 10-P-6.10: Require and condition all new public and privately constructed buildings to exceed, where feasible, and comply with construction and design standards that promote energy conservation, including the most current “green” development standards in the California Green Building Standards Code.	CONSISTENT Future development accommodated by the proposed Specific Plan would be required to comply with the current California Building Code at the time of application, including the “CalGreen” code for electric energy conservation, as further described in Section 3.6, <i>Greenhouse Gases, Climate Change and Energy</i> , of this PEIR.
Policy 10-P-6.11: Require expanded innovative and green building best practices, where feasible, including, but not limited to, LEED certification for all new development and retrofitting existing uses, and encourage public and private projects to exceed the most current “green” development standards in the California Green Building Standards Code.	CONSISTENT Future development accommodated by the proposed Specific Plan would be required to comply with the current California Building Code at the time of application, including the “CalGreen” code for electric energy conservation, as further described in Section 3.6, <i>Greenhouse Gases, Climate Change and Energy</i> , of this PEIR.
Policy 10-P-6.12: Require and condition construction and operation of new development to be managed to minimize fugitive dust and air pollutant emissions.	CONSISTENT Future development would adhere to any air quality standards, including minimizing fugitive dust and air pollutant emissions standards during construction and operation, as further described in Section 3.2, <i>Air Quality</i> , of this PEIR.
Policy 10-P-6.13: Implement development standards, mitigation measures, and best practices that require energy conservation and the reduction in greenhouse gases, including: Require new development to incorporate energy-efficient features through passive design concepts (e.g., techniques for heating and cooling, building siting orientation, street and lot layout, landscape placement, and protection of solar access);	Future development accommodated by the proposed Specific Plan would be required to comply with the following requirements as part of the design review process. Incorporate energy-efficient features through design concepts, including but not limited to, techniques for heating and cooling, building siting orientation, street and lot layout, landscape placement, and protection of solar access.

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- Require construction standards which promote energy conservation including window placement, building eaves, and roof overhangs; - Require all projects to meet or, when feasible, exceed the most current "green" development standards in the California Green Building Standards Code; - Require projects to implement applicable Sustainability Plan strategies and actions; - Encourage projects to incorporate enhanced energy conservation measures, electric-only appliances, and other methods of reducing energy usage and greenhouse gas emissions; and - Require large energy users to implement an energy conservation plan, which may include solar or other non-fossil fuel sources to meet the operation's full power demand and 100% fleet electrification, as part of the project review and approval process, and develop a program to monitor compliance with and effectiveness of that plan.	- Incorporate construction standards that promote energy conservation, including but not limited to, window placement, building eaves, and roof overhangs. - Incorporate enhanced energy conservation measures and other methods of reducing energy usage and GHG emissions. - Large energy-consuming development projects would be required to develop and implement an energy conservation plan to meet the operation's full power demand. The energy conservation plan would be required to also include a monitoring program to ensure compliance with and effectiveness of that plan. Furthermore, future development accommodated by the proposed Specific Plan would be required to comply with the current California Building Code at the time of application, including the "CalGreen" code for electric energy conservation. Future projects would also be required to comply with the Sustainability Plan as described above and as further described in Section 3.6, <i>Greenhouse Gases Emissions and Energy</i>, of this PEIR.
SAFETY	
Policy 11-P-1.12: Ensure that City regularly reviews the local Hazard Mitigation Plan (HMP) recommendations and implements projects to protect critical facilities and infrastructure and to reduce risk of exposure to identified hazards.	CONSISTENT Future development projects would be required to comply with the City's HMP. See Section 3.7, <i>Hazards and Hazardous Materials</i> , of this PEIR for more detail.
Policy 11-P-2.1: Consider climate change impacts and adaptive responses in long-term planning and current development decisions consistent with the policies and programs of the City's Sustainability Plan and Local Hazard Mitigation Plan.	CONSISTENT Future development would be required to comply with the City's current Sustainability Plan and Local Hazard Mitigation Plan. More detail on compliance with these plans can be found in Section 3.6, <i>Greenhouse Gas Emissions and Energy</i> , and 3.7, <i>Hazards and Hazardous Materials</i> , of this PEIR.
Policy 11-P-2.8: Make allowances for climate change in flood risk assessments to help minimize vulnerability and provide resilience to flooding and coastal change where protection, accommodation and managed relocation strategies should be considered.	CONSISTENT Future development projects accommodated by the proposed Specific Plan would be required to conform to the applicable 2040 General Plan, PMC, and proposed Specific Plan guidelines and standards, including those intended to respond to any emergency disaster such as flooding.

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Policy 11-P-3.4: Ensure that development projects mitigate impacts to the City's storm drainage capacity from storm water runoff occurring from the property. Project applicants shall demonstrate that projects implement Best Management Practices (BMPs) and Low Impact Development measures (LID) to treat stormwater before discharge from the site project and that project implementation would not result in increases in the peak flow runoff to adjacent lands or drainage facilities that would exceed the design capacity of the drainage facility or result in an increased potential for off-site flooding.	CONSISTENT Future development within the Plan Area would be required to comply with City grading, erosion, and sediment control standards to reduce and treat stormwater runoff to adjacent lands or drainage facilities. Refer to Section 3.8, <i>Hydrology and Water Quality</i> , of this PEIR for more detail.
Policy 1-P-3.7: Ensure that new developments comply with all applicable requirements of Municipal Code Chapter 15.80 - Floodplain Management, the California Building Code as adopted by the City, and the latest promulgated FEMA standards for development in the flood hazard areas.	CONSISTENT Future development within the Plan Area would be required to comply with all applicable PMC.
Policy 11-P-4.7: Ensure that Bay Area Air Quality Management District requirements are implemented in construction projects to reduce soil and particulate matter transport.	CONSISTENT Future development within the Plan Area would be required to adhere to best management practices established by the Bay Area Air Quality Management District. See Section 3.2, <i>Air Quality</i> , of this PEIR for more detail.
Policy 10-P-6.14: Encourage development of green and clean energy infrastructure and maintain land use designations to support and accommodate energy infrastructure projects that assist in meeting the State's goals to reduce carbon in the energy supply and reduce carbon-related emissions.	CONSISTENT Future development accommodated by the proposed Specific Plan would be required to comply with the following requirements as part of the design review process. • Incorporate energy-efficient features through design concepts, including but not limited to, techniques for heating and cooling, building siting orientation, street and lot layout, landscape placement, and protection of solar access. • Incorporate construction standards that promote energy conservation, including but not limited to, window placement, building eaves, and roof overhangs. • Incorporate enhanced energy conservation measures and other methods of reducing energy usage and GHG emissions. • Large energy-consuming development projects would be required to develop and implement an energy conservation plan to meet the

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	operation's full power demand. The energy conservation plan would be required to also include a monitoring program to ensure compliance with and effectiveness of that plan. Furthermore, future development accommodated by the proposed Specific Plan would be required to comply with the current California Building Code at the time of application, including the "CalGreen" code for electric energy conservation.
COMMUNITY FACILITIES	
Policy 12-P-2.1: Continue water district and user conservation efforts to help reduce demand in light of drought patterns, groundwater management, raw water availability, and the potential for unforeseen shortfalls.	CONSISTENT The use of recycled water for future development would be encouraged and considered at the project-level. Furthermore, the proposed Specific Plan outlines guidelines for using drought-tolerant plants.
Policy 12-P-2.2: Continue water conservation efforts from industrial facilities, including continued enforcement of the City's water-efficient landscape standards and participation in a wastewater reclamation efforts.	CONSISTENT See response to Policy 12-P-2.1 above.
Policy 12-P-3.4: Maintain environmentally appropriate wastewater management practices.	CONSISTENT Wastewater treatment and conveyance facilities would be evaluated at the project-level in association with subsequent development projects. Future development projects would be subject to compliance review with building code standards of the PMC and other applicable regulations that pertain to wastewater utilities and building standards for plumbing design.
Policy 12-A-3.f: Require that all wastewater dischargers within the City conform to Delta Diablo standards.	CONSISTENT Future development projects would be required to conform to Delta Diablo Standards. For more detail, refer to Section 3.14, <i>Utilities and Service Systems</i> , of this PEIR.
Policy 12-P-4.3: Reduce municipal waste generation by increasing recycling, on-site composting, and mulching, where feasible, at municipal facilities, as well as using resource efficient landscaping techniques in new or renovated medians and parks.	CONSISTENT Future development projects would be required to comply with Assembly Bill 341, which requires businesses to arrange for recycling services, in order to reuse, recycle, compost or otherwise divert solid waste from disposal. For more detail, refer to Section 3.14, <i>Utilities and Services Systems</i> , of this PEIR. Furthermore, the proposed Specific Plan includes

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	guidelines for efficient, drought-tolerant landscaping to be incorporated throughout the Plan Area.
Policy 12-P-6.3: Require development in areas of high fire hazard to be designed and constructed to minimize potential losses and maximize the ability of fire personnel to suppress fire incidents.	CONSISTENT Future development would be required to adhere to PMC and proposed Specific Plan guidelines related to fire management. These requirements include ensuring adequate defensible space, brush management, landscape design standards, heat island reduction, and overall energy reduction methods to reduce fire risk. See Section 3.15, <i>Wildfires</i> , of this PEIR for more detail.
Policy 12-P-6.4: Require existing and new development in or adjacent to high and very high fire hazard severity zones, wildland urban interface zones, and State Responsibility Areas to maintain defensible space zones, landscape using native, fire-resistant plants and fire-resistant materials, abate weeds, and, where feasible, harden structures and infrastructure against fires.	CONSISTENT See response to Policy 12-P-6.3 above.
Policy 12-P-7.1: Require all development projects to demonstrate how storm water runoff will be detained or retained on-site and/or conveyed to the nearest drainage facility as part of the development review process, including consideration of the near-term and cumulative capacity of the system serving the drainage area, and as required by the City's NPDES Municipal Regional Permit. Project applicants shall mitigate any drainage impacts as necessary and shall demonstrate that the project will not result in any increase in off-site runoff during rain and flood events.	CONSISTENT Future development within the Plan Area would be required to comply with City grading, erosion, and sediment control standards to reduce and treat stormwater runoff to adjacent lands or drainage facilities. Furthermore, each future development and infrastructure project within the Plan Area would be required to prepare a detailed project-specific drainage plan, Water Quality Management Plan, and a Storm Water Pollution Prevention Plan (SWPPP) that will control storm water runoff and erosion, both during and after construction. Refer to Section 3.8, <i>Hydrology and Water Quality</i> , of this PEIR for more detail.
Policy 12-P-7.2: Assure through the City standards, including the Master Drainage Plan and development ordinances, that proposed new development (residential, commercial, or industrial) adequately provides for on-site and downstream mitigation of potential flood hazards, including construction of required drainage improvements.	CONSISTENT As discussed in Section 3.8, <i>Hydrology and Water Quality</i> , of this PEIR, mitigation of potential flood hazards would be evaluated at the project-level in association with subsequent development projects. As future development and infrastructure projects are considered, each project will be evaluated for conformance with the General Plan, PMC, and other applicable regulations.

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Policy 12-P-7.3: Ensure adequate minimum setbacks to reduce potential for property damage from storm flooding.	CONSISTENT Future development projects accommodated by the proposed Specific Plan would comply with design specifications and BMPs as required by applicable regulations and policies.
Policy 12-P-7.4: Reduce the risk of localized and downstream flooding and runoff through the use best management practices to minimize runoff from the site to the storm drainage system, including: • High infiltration measures, including the maximization of permeable landscape, • Using permeable surfaces for parking lots, sidewalks, and bike paths, • Where feasible, using roof runoff as irrigation.	CONSISTENT As described in Section 3.8, <i>Hydrology and Water Quality</i> , of this PEIR, future development projects must develop and implement a Storm Water Pollution Prevention Plan (SWPPP) that includes BMPs to minimize stormwater runoff.
Policy 12-P-7.5: During the review of development plans, require all commercial projects to construct on-site retention facilities. Such facilities could be in the form of landscape features or underground swells.	CONSISTENT Construction of on-site retention facilities would be evaluated at the project-level in association with subsequent development projects. As future development projects are considered, each project will be evaluated for conformance with the 2040 General Plan, PMC, and other applicable regulations.
Policy 12-P-7.6: Allow the construction of detention basins as mitigation in new developments. Ensure that detention basins located in residential neighborhoods, schools, or child-care facilities are surrounded by a gated enclosure, or protected by other safety measures.	CONSISTENT Construction of detention basins as mitigation would be evaluated at the project-level in association with subsequent development projects. As future development and infrastructure projects are considered, each project will be evaluated for conformance with the 2040 General Plan, PMC, and other applicable regulations.
Action 12-A-7.a: As part of project review and CEQA documentation, require an assessment of downstream drainage (creeks and channels) and City storm-water facilities impacted by potential project runoff and require development to include measures, including on-site improvements, to ensure that off-site runoff is not increased during rain and flood events.	CONSISTENT Future development projects accommodated by the proposed Specific Plan would evaluate impacts to downstream drainage and City storm-water facilities on a project-level basis. As future development and infrastructure projects are considered, each project will be evaluated for conformance with the 2040 General Plan, PMC, and other applicable regulations.

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NOISE	
Policy 13-P-1.2: Require development projects, including new uses, to meet the noise standards.	CONSISTENT Future development within the Plan Area would be required to adhere to performance standards (described in Section 3.10, <i>Noise</i> , of this PEIR) which would bring noise to acceptable noise levels. During development review, applicants would be required to provide evidence that the proposed project can meet standards, and any exceedance would require site-specific construction and operational mitigation plans, per MM 3.10-1 and MM 3.10-2 .
Policy 13-P-1.5: Continue efforts to incorporate noise considerations into land use planning decisions, including measures to control noise at the source through site design, building design, landscaping, hours of operation, and other techniques, for new development deemed to be noise generators, and guide the location and design of transportation facilities to minimize the effects of noise on adjacent land uses.	CONSISTENT Subsequent development accommodated by the proposed Specific Plan would be required to adhere to performance standards for operational generated noise. If during development review, it is determined that a project would exceed performance standards (described in Section 3.10, <i>Noise</i> , of this PEIR), a site-specific operational mitigation plan would be required, per MM 3.10-2 . The plan would incorporate noise control techniques to the site-design such as proper site layout that would distance noise generating uses away from sensitive receptors as feasible.
Policy 13-P-1.7: Limit generation of loud noises on construction sites adjacent to existing development to normal business hours between 8:00 AM and 5:00 PM.	CONSISTENT Any subsequent development accommodated by the proposed Specific Plan would adhere to PMC, which limits construction noise of 65 dBA to daytime hours only. Furthermore, it is not anticipated that proposed project implementation would require nighttime construction activity.
Policy 13-P-1.8: Reduce the impact of truck traffic noise on residential areas by limiting such traffic to appropriate truck routes. Consider methods to restrict truck travel times in sensitive areas.	CONSISTENT West Leland Road is a designated Route of Regional Significance and a City designated truck route. Other designated truck routes in the Plan Area proximity include Railroad Avenue and Bailey Road. Truck traffic would primarily use designated truck routes. In addition, as described in Section 3.10, <i>Noise</i> , of this PEIR, traffic modeling predicts noise impacts along West Leland Road would not increase by 5 dBA.

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Policy 13-P-1.12: Require development projects to reduce adverse construction vibration impacts to sensitive receptors, as feasible, when vibration-related construction activities are to occur within 100 feet from existing sensitive receptors. Measures to reduce noise and vibration effect may include, but are not limited to: • Phase demolition, earth-moving and ground-impacting operations so as not to occur in the same time period. • The pre-existing condition of all buildings within a 100-foot radius will be recorded in order to evaluate damage from construction activities. Fixtures and finishes within a 100-foot radius of construction activities susceptible to damage will be documented (photographically and in writing) prior to construction. All damage will be repaired back to its pre-existing condition. • Substituting vibration-generating equipment with equipment or procedures that would generate lower levels of vibration. For instance, in comparison to impact piles, drilled piles or the use of a sonic or vibratory pile driver are preferred alternatives where geological conditions would permit their use. • Other specific measures as they are deemed appropriate by the implementing agency to maintain consistency with adopted policies and regulations regarding vibration.	CONSISTENT Subsequent development within the Plan Area would be required to adhere to performance standards (described in Section 3.10, <i>Noise</i>, of this PEIR) which would bring construction related noise impacts to acceptable standards, per MM 3.10-1. During the time of application, applicants must show adherence to performance standards, which include significant source of vibration (impact pile driving, etc.) in relation to acceptable levels. Considering the closest noise-sensitive receptor is 800 feet away, a pile driver would not be a significant source of vibration even at 500 feet away, per Caltrans' vibration thresholds.
Action 13-A-1.a: As part of development review, require projects to submit to meet the City's noise standards identified in Policies 13-P-1.1 through 13-P-4 and 13-P-9. Where projects would cause and/or be subject to noise levels in excess of the City's standards, require an acoustical analysis prepared by a qualified acoustical engineer that includes measures to reduce exposure to noise levels in excess of City standards and encourage use of noise-attenuating measures that avoid sound walls, except where uses are affected by State Route 4.	CONSISTENT Future development within the Plan Area would be required to comply with performance standards that would keep noise levels below significance per the 2040 General Plan. Any exceedance would be required to adhere to MM 3.10-1 and MM 3.10-2, which would reduce project-specific noise levels to acceptable standards.

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GOALS AND POLICIES	CONSISTENCY
Action 13-A-1.b: Develop noise attenuation programs for mitigation of noise adjacent to existing residential areas, including such measures as wider setbacks, intense landscaping, double-paned windows, and building orientation muffling the noise source, and avoid sound walls where feasible.	CONSISTENT Subsequent development accommodated by the proposed Specific Plan would be required to adhere to performance standards for operational generated noise. If during development review, it is determined that a project would exceed performance standards (described in Chapter 3.10 <i>Noise</i> of this EIR), a site-specific operational mitigation plan would be required, per MM 3.10-2. The plan would incorporate noise control techniques to the site-design such as proper site layout that would distance noise generating uses away from sensitive receptors as feasible.
Policy 13-A-1.e: In making a determination of impact significance under the California Environmental Quality Act (CEQA), a substantial increase will occur if ambient noise levels experience a substantial permanent increase. Generally, a 3 dB increase in noise levels is barely perceptible, and a 5 dB increase in noise levels is clearly perceptible. Therefore, increases in noise levels shall be considered to be substantial when the following occurs: • When existing noise levels are less than 60 dB, a 5 dB increase in noise will be considered substantial; • When existing noise levels are between 60 dB and 65 dB, a 3 dB increase in noise will be considered substantial; • When existing noise levels exceed 65 dB, a 1.5 dB increase in noise will be considered substantial. Additional or alternative criteria can be used for determining a substantial increase in noise levels. For instance, if the overall increase in noise levels occurs where no noise-sensitive uses are located, then the City may use its discretion in determining if there is any impact at all. In such a case, the following alternative factors may be used for determining a substantial increase in noise levels: • the resulting noise levels; • the duration and frequency of the noise; • the number of people affected; • conforming or non-conforming land uses;	CONSISTENT Noise monitoring at adjacent receptor sites capture noise level at less than 60 dB. The noise study prepared for the proposed Specific Plan predicts that noise associated with future traffic on West Leland Road would not create increased noise levels by 5 dBA. Furthermore, future development would be considered by the City during the development review process and would adhere to any additional requirements the City may require.

CITY OF PITTSBURG 2040 GENERAL PLAN	
GOALS AND POLICIES	CONSISTENCY
- the land use designation of the affected receptor sites; - public reactions or controversy as demonstrated at workshops or hearings, or by correspondence; and prior CEQA determinations by other agencies specific to the project.	

This section of the Program Environmental Impact Report (PEIR) provides a discussion of the fundamentals of sound, examines federal, state and local noise guidelines, policies, and standards, and provides a general description of existing noise sources in the Pittsburg Technology Park Specific Plan (Specific Plan; project) Area (Plan Area). This section also evaluates potential noise and vibration impacts associated with the Special Plan. The evaluation uses procedures and methodologies as specified by the Federal Transit Administration (FTA) and California Department of Transportation (Caltrans) and evaluates the potential for the proposed project to result in noise and vibration impacts at nearby sensitive receptors.

This section and environmental discussion use information from the following documents:

- City of Pittsburg. *Pittsburg 2040 General Plan*. Adopted May 2024.
- City of Pittsburg. *Pittsburg 2040 General Plan Draft Environmental Impact Report*. December 2023.
- Ramboll. April 2024. *Pittsburg Technology Park Specific Plan Noise and Vibration Technical Report*.

3.10.1 ENVIRONMENTAL SETTING

FUNDAMENTALS OF SOUND

Sound is the transmission of energy in the form of fluctuating pressure waves from a vibrating source through an elastic medium, such as air, that is detectable by the human ear. The pressure fluctuates above and below atmospheric pressure. The amplitude of the pressure fluctuation is typically described in terms of decibels (dB), while the rate of fluctuation per unit time (frequency) is described in hertz (Hz).

Sound pressure levels below the human threshold of hearing are less than 0 dB, while levels above the human threshold of hearing are greater than 0 dB. Differences in sound level are also described in decibels. A 3-dB difference is considered “just noticeable”, a 5-dB difference is considered “clearly noticeable”, while a 10-dB difference is perceived as a doubling (or halving) in loudness. Table 3.10-1 provides a list of common noise sources, their sound level, and their subjective loudness.

Noise is sound that is considered undesirable or unpleasant. The effects of noise on people depends on a variety of factors, including the type of noise source, the context of the noise, and the sensitivity of the person.

TABLE 3.10-1: TYPICAL NOISE LEVELS

NOISE LEVEL (DBA)	SUBJECTIVE EVALUATION	ENVIRONMENT	
		OUTDOOR ACTIVITIES	INDOOR ACTIVITIES
140	Deafening	Jet aircraft at 75 ft	-
130	Threshold of pain	Jet aircraft during takeoff at a distance of 300 ft	-
120	Threshold of feeling	-	Hard rock band
--110--	Extremely loud	Jet Fly-over at 1,000 ft	-
--100--	Very loud	Auto Horn at 10 ft	-
--90--		Jack hammer at 50 ft	Noisy factory
--80--	Loud	Diesel Truck (40 mph) at 50 ft, noisy urban street	Garbage Disposal, cafeteria with sound-reflecting surfaces
--70--	Moderately Loud	Noisy Urban Area, Daytime Gas Lawn Mower, 30 m (100 ft)	Vacuum Cleaner
--60--	Moderate	Commercial Area Heavy Traffic at 90 m (300 ft)	Face-to-face conversation
--50--	Quiet	Quiet Urban Daytime	Large Business Office Dishwasher in Next Room
--40--		Quiet Urban Nighttime	Open office area
--30--	Very Quiet	-	Bedroom, typical residence (without TV or sound system)
--20--		Rustling leaves	Audiometric testing room, whisper
--10--	Just audible	-	Broadcast/Recording Studio
--0--	Threshold of hearing	-	-

SOURCE: PITTSBURG TECHNOLOGY PARK SPECIFIC PLAN, NOISE AND VIBRATION TECHNICAL REPORT, RAMBOLL 2024

Technical Terminology

The following are brief definitions of terminology used in this section:

Ambient Noise The composite of airborne sound from many sources near and far associated with a given environment. No particular sound is singled out for interest. In many cases, the term ambient is used to describe an existing or pre-project condition such as the setting in an environmental noise study.

A-Weighting A frequency-response adjustment of a sound level meter that conditions the output signal to approximate human response.

Decibel or dB Fundamental unit of sound, defined as ten times the logarithm of the ratio of the sound pressure squared over the reference pressure squared. All dB levels used in this section are A-weighted values, unless otherwise stated.

Community Noise Equivalent Level. Defined as the 24-hour average noise level with noise occurring during evening hours (7 - 10 p.m.) weighted by + 5 dB and

	nighttime hours weighted by +10 dB. Typically, 1 dB higher than L_{dn} for transportation noise sources.
Frequency	The measure of the rapidity of alterations of a periodic acoustic signal, expressed in cycles per second or Hertz.
L_{dn}	Day/Night Average Sound Level. Similar to CNEL but with no evening weighting.
L_{eq}	Equivalent or energy-averaged sound level.
L_{max}	The highest root-mean-square (RMS) sound level measured over a given period of time.
L(n)	The sound level exceeded a described percentile over a measurement period. For instance, an hourly L50 is the sound level exceeded 50 percent of the time during the one hour period.
Loudness	A subjective term for the sensation of the magnitude of sound.
Noise	Sound that is loud, unpleasant, unexpected, or otherwise undesirable.

Sound Measurements

Because the decibel is logarithmic, a doubling of sound energy from a noise source produces a 3-dB increase in sound level from that source, not a doubling of the loudness of the sound (which requires a 10-dB increase). For example, if traffic along a road is causing a 60 dB sound level at some nearby location, doubling the amount traffic on this same road would cause the sound level at this same location to increase to 63 dB. Such an increase might not be discernible in a complex acoustical environment.

The range of frequencies a healthy human ear can hear is approximately 20 Hz to 20,000 Hz. The human ear is not equally sensitive to all frequencies across the audible frequency spectrum. The human ear is most sensitive to mid frequencies (the frequency range associated with speech) and is less sensitive at low frequencies and very high frequencies. To account for this, frequency weighting networks have been developed to approximate the human ear's frequency response at different sound pressure levels. The A-weighting network is used to approximate the frequency response of the human ear at normal sound levels. Measurements using the A-weighting network are described in terms of A-weighted decibels, often abbreviated colloquially as dBA or dB(A).

FUNDAMENTALS OF GROUND BORNE VIBRATION

Vibration is the transmission of energy in the form of waves through the ground, man-made structures, or other solid objects. As with sound, the frequencies of vibration are described in hertz (Hz). The amplitude of vibration is typically described either as peak particle velocity (PPV) in units of inches per second (in/sec) or in decibels of vibration velocity, abbreviated as VdB.

Vibration is perceived tactilely whether through feet or hands or through the whole body while sitting or lying down. Like noise, vibration can be a source of annoyance and can cause sleep disturbance.

Most perceptible indoor vibration is caused by sources within buildings, such as equipment operation, movement of people, or slamming doors. Typical outdoor sources are heavy construction equipment and activities (such as blasting and pile driving), steel-wheeled trains, and heavy trucks on rough roads or offroad. It is unusual for vibration from sources such as buses and trucks on smooth roads to be perceptible, even in nearby locations. Table 3.10-2 below presents the human reaction to various levels of peak particle velocity (PPV).

TABLE 3.10-2: HUMAN REACTION TO TYPICAL VIBRATION LEVELS

VIBRATION LEVEL PEAK PARTICLE VELOCITY (IN/SEC)	HUMAN REACTION	EFFECT ON BUILDINGS
0.006-0.019	Threshold of perception, possibility of intrusion	Vibrations unlikely to cause damage of any type
0.08	Vibrations readily perceptible	Recommended upper level of vibration to which ruins and ancient monuments should be subjected
0.10	Level at which continuous vibration begins to annoy people	Virtually no risk of “architectural” (i.e., not structural) damage to normal buildings
0.20	Vibrations annoying to people in buildings	Threshold to which there is a risk to “architectural” damage to normal dwelling (houses with plastered walls and ceilings)
0.4-0.6	Vibrations considered unpleasant by people subjected to continuous vibrations and unacceptable to some people walking on bridges	Vibrations at a greater level than normally expected from traffic, but would cause “architectural” damage and possibly minor structural damage

SOURCE: CALTRANS, TECHNICAL NOISE SUPPLEMENT, TRAFFIC NOISE ANALYSIS PROTOCOL. SEPTEMBER 2013.

NOISE AND ITS EFFECTS ON PEOPLE

The following factors affect how a noise source is perceived:

- **Sound level:** Louder noise tends to be more annoying. In addition, noise sources that change in sound level over time are more noticeable than those that do not vary over time.
- **Sound duration:** Noise that is fairly steady over time tends to be less noticeable, while short, impulsive noises are more noticeable.
- **Frequency spectrum:** Broadband noise – noise that contains sound energy at many frequencies – is not as noticeable than noise that contains discrete tones. For example, the tone from a backup beeper is more noticeable than noise from a fan, even if they are producing the same overall sound level.

- **Masking effects:** Noise from one source can be masked – made less noticeable – by noise from one or more louder sources.

The extent to which a noise affects people can vary from subjective (causing annoyance) to physical (causing hearing loss). Where noise is loud enough to cause hearing loss, regulations such as those developed by OSHA have been adopted to mitigate hearing loss. In most environments, noise is not sufficiently loud to cause hearing loss but may still cause annoyance or impact people's productivity and general well-being. Note that the degree of annoyance caused by a given noise varies from person to person.

SENSITIVE RECEPTORS

Some land uses are considered more sensitive to intrusive noises than others based on the types of activities involved at the receptor location. They include residential land uses, transient lodging, hospitals, convalescent homes, schools, churches, and sensitive wildlife habitat. As indicated, in addition to buildings, exterior use areas may also be considered noise-sensitive receivers. Exterior use areas where frequent human use for prolonged periods (at least an hour) may reasonably occur. Common examples of exterior use areas include residential backyards, multi-family communal areas, patios, picnic areas, recreation areas, playgrounds, active sports areas and parks.

EXISTING CONDITIONS

The Plan Area includes a portion of the former Delta View Golf Course which is currently vacant and designated "ECI" (Employment Center Industrial) by the 2040 General Plan. The Plan Area is proposed to be rezoned to "IL-O" (Limited Industrial with Limited Overlay) in the City's Zoning Ordinance. This use allows specific technology employment uses at the site. The Plan Area is composed of two major project areas as it is bisected by the Contra Costa Canal. The northern portion of the site is 22.05 acres and the area south of the canal is 54.33 acres. The Plan Area is surrounded by a mix of uses, although predominantly low density residential. Single-family residential zones are to the west, north, and east of the Plan Area, with open space to the south. Other uses include a school and park to the north, and government uses east of the Plan Area.

Existing noise is generated from the following sources:

- State Route (SR) 4 located approximately 0.3-miles north of the Plan Area.
- Local roads surrounding the Plan Area, including West Leland Road, which is adjacent and north of the Plan Area.
- Residential neighborhood roads, including Golf Course Road immediately north of the Plan Area.
- Rail lines approximately 0.8 north of the Plan Area.

There are no significant sources of groundborne vibration near the Plan Area.

To quantify the existing ambient noise levels, an ambient noise survey was conducted in November 2023. Continuous 48-hour measurements were taken at two locations near the Plan Area. One sound meter was placed south of residences on Golf Club Road, and the second was placed west of

residences along Orinda Circle (see Figure 3.10-1). Two fifteen-minute measurements were taken south of the Plan Area, near Alta Vista Circle. Monitoring locations were chosen based on future construction, operations, and locations of sensitive noise receptors. The survey utilized two Larson Davis LxT sound level meters and were placed in weather-resistant cases while the microphones were placed on tripods approximately 5 feet above grade.

The measured average sound level (L_{dn}) of the 48-hour continuous measurements resulted in a 56 L_{dn} near Golf Club Road and 54 L_{dn} west of Orinda Circle. The fifteen-minute measurement located west of Alta Vista Circle captured noise levels at 57 L_{dn} . The primary source of noise was local road traffic, with birds, distant trains, and general neighborhood activity also contributing to the ambient sound environment. Table 3.10-3 provides a summary of the sound monitoring locations and results, identified by their tag number, as found in Figure 3.10-1, below.

TABLE 3.10-3: SOUND MONITORING LOCATIONS AND RESULTS

TAG NUMBER	LOCATION	MEASUREMENT PERIOD	MEASURED SOUND LEVEL (L_{DN})
L-1	South of residences on Golf Club Road	9:30 AM 11/1/2023 - 9:45 AM 11/3/23	56
L-2	West of residences along Orinda Circle	9:45 AM 11/1/2023 – 10:00 AM 11/3/23	54
S-1	West of residences along Alta Vista Circle	11:06 AM – 11:21 AM 11/1/2023	57 ¹

¹ESTIMATE BASED ON 1-DB OFFSET BETWEEN L-1 AND S-1 DURING THE SHORT-TERM MEASUREMENT PERIOD.

SOURCE: PITTSBURG TECHNOLOGY PARK SPECIFIC PLAN NOISE AND VIBRATION TECHNICAL REPORT, RAMBOLL 2024

Sensitive Receptors

As previously noted, the Plan Area is currently vacant and designated as ECI in the 2040 General Plan. The Plan Area is proposed to be rezoned to IL-O in the City's Zoning Ordinance. The Plan Area is predominantly surrounded by low density residential uses, with open space to the south of the Plan Area.

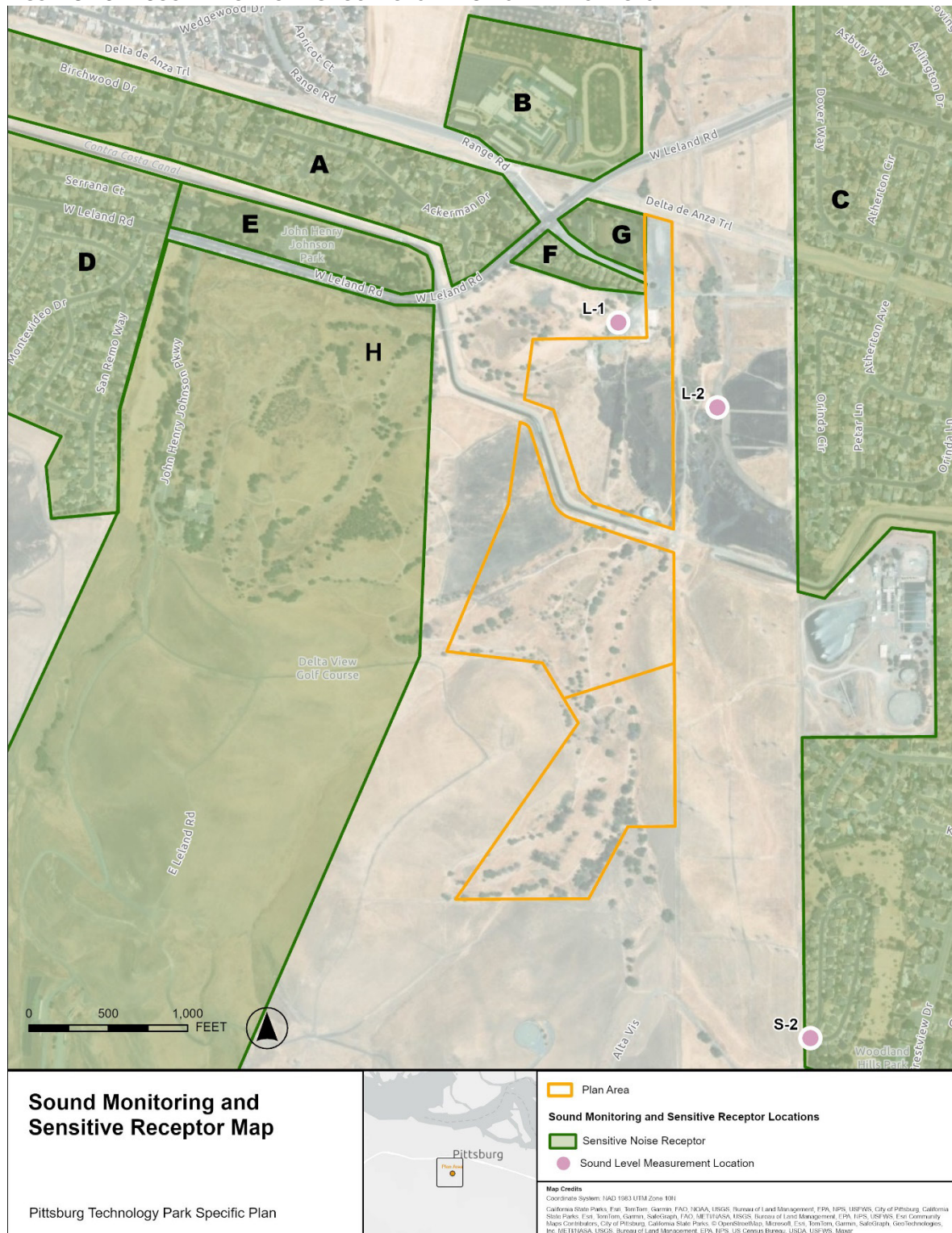
The nearest sensitive receptors are the single-family residences located north of the Plan Area along Golf Club Road, as illustrated in Figure 3.10-1. Each sensitive receptor and proximity to the Plan Area are listed in Table 3.10-4, with reference identification in relation to Figure 3.10-1.

TABLE 3.10-4: SENSITIVE NOISE AND VIBRATION RECEPTORS

	<i>DESCRIPTION</i>	<i>PROXIMITY TO PLAN AREA</i>
RESIDENTIAL		
F	Low Density Residential	Adjacent to Plan Area, on Golf Club Road
A	Low Density Residential	85 feet northwest, on West Leland Road
C	Low Density Residential	800 feet east, and west of Crestview Drive
D	Low Density Residential	800+ feet west of Plan Area
SCHOOLS		
B	Ranch Medanos Junior High School	640 feet north on Range Road
CHURCHES		
G	Church of Jesus Christ of Latter-day Saints	200 feet north of the site, on Golf Club Road
PARKS		
E	John Henry Johnson Park	250 feet to the west, across West Leland Road
H	Proposed Park	Adjacent to Plan Area, 80 feet from westernmost corner of Phase II

SOURCE: PITTSBURG TECHNOLOGY PARK SPECIFIC PLAN, NOISE AND VIBRATION TECHNICAL REPORT, RAMBOLL 2024

FIGURE 3.10-1. SOUND MONITORING LOCATIONS AND SENSITIVE RECEPTORS



3.10.2 REGULATORY SETTING

FEDERAL

Environmental Protection Agency (USEPA)

While there are no federal regulations directly applicable to implementation of the proposed project under CEQA, the federal government regulates occupational noise exposure common in the workplace through the Occupational Health and Safety Administration (OSHA) under the Environmental Protection Agency (EPA). Noise exposure of this type is dependent on work conditions and is addressed through a facility's or construction contractor's health and safety plan. With the exception of construction workers involved in facility construction, occupational noise is irrelevant to this study and is not addressed further in this document.

Federal Transit Administration

The FTA provides technical guidance for conducting noise and vibration analyses for transit projects and incorporation into environmental review documents. The manual presents procedures for predicting and assessing noise and vibration impacts.

STATE

California Department of Transportation

The California Department of Transportation (Caltrans) provides guidelines for construction vibration in its Transportation and Construction Vibration Guidance Manual. Included in the manual are recommended thresholds for both building damage potential and human annoyance from construction-related vibration, though the thresholds can also be applied to operational activities.

California State Code

California Government Code section 65302 encourages each local government entity to implement a noise element as part of its general plan. In addition, the California Governor's Office of Planning and Research has developed guidelines for preparing noise elements, which include recommendations for evaluating the compatibility of various land uses as a function of community noise exposure.

California Building Code

The California Building Code (CBC), Title 24, Part 2, Volume 1, Chapter 12, Interior Environment, §1207.11.2, *Allowable Interior Noise Levels*, requires that interior noise levels attributable to exterior sources shall not exceed 45 dB in any habitable room. The noise metric is evaluated as either the day-night average sound level (Ldn) or the community noise equivalent level (CNEL), consistent with the noise element of the local general plan.

The State of California's noise insulation standards for nonresidential uses are codified in the California Code of Regulations, Title 24, Building Standards Administrative Code, Part 11, California Green Building Standards Code (CALGreen). CALGreen noise standards are applied to new or renovation construction projects in California to control interior noise levels resulting from exterior

3.10 NOISE

noise sources. Proposed projects may use either the prescriptive method (§5.507.4.1) or the performance method (§5.507.4.2) to show compliance. Under the prescriptive method, a project must demonstrate transmission loss ratings for the wall and roof-ceiling assemblies and exterior windows when located within a noise environment of 65 dBA CNEL or higher. Under the performance method, a project must demonstrate that interior noise levels do not exceed 50 dBA Leq(1hr).

LOCAL

Pittsburg 2040 General Plan

The City of Pittsburg 2040 General Plan (2040 General Plan) contains the following goals, policies, and action items relevant to Project noise and vibration.

Policy 13-P-1.1: Areas within Pittsburg exposed to existing or projected exterior noise levels from mobile noise sources exceeding the performance standards in Table 13-1 shall be designated as noise-impacted areas. Figure 13-1 identifies noise contours anticipated at General Plan buildout.

TABLE 13-1: MAXIMUM ALLOWABLE NOISE EXPOSURE FROM MOBILE NOISE SOURCES

LAND USE OR PROJECT TYPE ¹	OUTDOOR ACTIVITY AREAS ^{2,3}	INTERIOR SPACES	
		LDN/CNEL, dBA	LEQ, dBA ⁴
Residential	60	45	-
Motels/Hotels	65	45	-
Mixed-Use	65	45	
Hospitals, Nursing Homes	60	45	-
Theaters, Auditoriums	-	-	35
Churches	60	-	40
Office Buildings	65	-	45
Schools, Libraries, Museums	70	-	45
Playgrounds, Neighborhood Parks	70	-	-
Industrial	75	-	45
Golf Courses, Water Recreation	70	-	-

¹Where a proposed use is not specifically listed, the use shall comply with the standards for the most similar use as determined by the City.

²Outdoor activity areas for residential development are considered to be the back yard patios or decks of single family units and the common areas where people generally congregate for multi-family developments. Where common outdoor activity areas for multi-family developments comply with the outdoor noise level standard, the standard will not be applied at patios or decks of individual units provided noise-reducing measures are incorporated (e.g., orientation of patio/deck, screening of patio with masonry or other noise-attenuating material). Outdoor activity areas for non-residential developments are the common areas where people generally congregate, including pedestrian plazas, seating areas, and outside lunch facilities; not all residential developments include outdoor activity areas.

³In areas where it is not possible to reduce exterior noise levels to achieve the outdoor activity area standard using a practical application of the best noise-reduction technology, an increase of up to 10 Ldn over the standard will be allowed provided that available exterior noise reduction measures have been implemented and interior noise levels are in compliance with this table.

⁴Determined for a typical worst-case hour during periods of use.

Policy 13-P-1.2: Require development projects, including new uses, to meet the noise standards established in Table 13-1.

Policy 13-P-1.7: Limit generation of loud noises on construction sites adjacent to existing development to normal business hours between 8:00 AM and 5:00 PM.

Policy 13-P-1.8: Reduce the impact of truck traffic noise on residential areas by limiting such traffic to appropriate truck routes. Consider methods to restrict truck travel times in sensitive areas.

Policy 13-P-1.9: Evaluate projects for stationary noise source impacts based on the standards in Table 13-2:

TABLE 13-2: PERFORMANCE STANDARDS FOR STATIONARY NOISE SOURCES, INCLUDING AFFECTED PROJECTS^{1, 2, 3, 4}

NOISE LEVEL DESCRIPTOR	DAYTIME (7 AM TO 10 PM)	NIGHTTIME (10 PM TO 7 AM)
Hourly Leq, dBA	55	45

¹Each of the noise levels specified above should be lowered by 5 dB for simple noise tones, noises consisting primarily of speech or music, or recurring impulsive noises. Such noises are generally considered to be particularly annoying and are a primary source of noise complaints.

²No standards have been included for interior noise levels. Standard construction practices should, with the exterior noise levels identified, result in acceptable interior noise levels.

³Stationary noise sources which are typically of concern include, but are not limited to, the following:

HVAC Systems Cooling Towers/Evaporative	Air Compressors Heavy Equipment
Condensers	Conveyor Systems Transformers
Pump Stations Lift Stations	Pile Drivers Grinders
Emergency Generators Boilers	Drill Rigs Gas or Diesel Motors
Steam Valves Steam Turbines	Welders Cutting Equipment
Generators Fans	Outdoor Speakers Blowers

⁴The types of uses which may typically produce the noise sources described above include but are not limited to: industrial facilities, pump stations, trucking operations, tire shops, auto maintenance shops, metal fabricating shops, shopping centers, drive-up windows, car washes, loading docks, public works projects, batch plants, bottling and canning plants, recycling centers, electric generating stations, race tracks, landfills, sand and gravel operations, and athletic fields.

Policy 13-P-1.11: Require the preparation of ground-borne vibration studies by qualified professionals when construction activities include vibration-sensitive uses and significant site grading, foundation work, or underground work would occur within less than 100 feet of existing structures.

Policy 13-P-1.12: Require development projects to reduce adverse construction vibration impacts to sensitive receptors, as feasible, when vibration-related construction activities are to occur within 100 feet from existing sensitive receptors. Measures to reduce noise and vibration effect may include, but are not limited to:

- Phase demolition, earth-moving and ground-impacting operations so as not to occur in the same time period.

- The pre-existing condition of all buildings within a 100-foot radius will be recorded in order to evaluate damage from construction activities. Fixtures and finishes within a 100-foot radius of construction activities susceptible to damage will be documented (photographically and in writing) prior to construction. All damage will be repaired back to its pre-existing condition.
- Substituting vibration-generating equipment with equipment or procedures that would generate lower levels of vibration. For instance, in comparison to impact piles, drilled piles or the use of a sonic or vibratory pile driver are preferred alternatives where geological conditions would permit their use.
- Other specific measures as they are deemed appropriate by the implementing agency to maintain consistency with adopted policies and regulations regarding vibration.

Action 13-A-1.a: As part of development review, require projects to submit to meet the City's noise standards identified in Policies 13-P-1.1 through 13-P-4 and 13-P-9. Where projects would cause and/or be subject to noise levels in excess of the City's standards, require an acoustical analysis prepared by a qualified acoustical engineer that includes measures to reduce exposure to noise levels in excess of City standards and encourage use of noise-attenuating measures that avoid sound walls, except where uses are affected by State Route 4.

Action 13-A-1.b: Develop noise attenuation programs for mitigation of noise adjacent to existing residential areas, including such measures as wider setbacks, intense landscaping, double-paned windows, and building orientation muffling the noise source, and avoid sound walls where feasible.

Action 13-A-1.e: In making a determination of impact significance under the California Environmental Quality Act (CEQA), a substantial increase will occur if ambient noise levels experience a substantial permanent increase. Generally, a 3 dB increase in noise levels is barely perceptible, and a 5 dB increase in noise levels is clearly perceptible. Therefore, increases in noise levels shall be considered to be substantial when the following occurs:

- When existing noise levels are less than 60 dB, a 5 dB increase in noise will be considered substantial;
- When existing noise levels are between 60 dB and 65 dB, a 3 dB increase in noise will be considered substantial;
- When existing noise levels exceed 65 dB, a 1.5 dB increase in noise will be considered substantial.

Additional or alternative criteria can be used for determining a substantial increase in noise levels. For instance, if the overall increase in noise levels occurs where no noise-sensitive uses are located, then the City may use its discretion in determining if there is any impact at all. In such a case, the following alternative factors may be used for determining a substantial increase in noise levels:

- the resulting noise levels;
- the duration and frequency of the noise;
- the number of people affected;
- conforming or non-conforming land uses;
- the land use designation of the affected receptor sites;
- public reactions or controversy as demonstrated at workshops or hearings, or by correspondence; and
- prior CEQA determinations by other agencies specific to the project.

City of Pittsburgh Municipal Code

Chapter 9.44 of the City of Pittsburgh Municipal Code (PMC) does not contain any quantitative sound level limits. Rather, it includes a list of prohibitions, including the following:

- The discharge of exhaust of stationary internal combustion engines (e.g., generators) except through a muffler or other noise control device
- The operation of pile drivers, steam shovels, pneumatic hammers, derricks, and steam or electric hoists between the hours of 10:00 p.m. and 7:00 a.m. except in the case of emergency
- The operation of any noise-producing blower, power fan, or engine unless noise from the source is sufficiently controlled.

Title 18 Zoning, Chapter 18.82 Performance Standards, Section 18.82.040 PMC requires compliance with Chapter 9.44 and prohibits construction noise on sites adjoining residential properties that exceed 65 dBA measured at the property line, except between the hours of 8:00 a.m. and 5:00 p.m. The municipal code does not have any other quantitative sound level limits.

SUMMARY OF STATE AND LOCAL THRESHOLDS

TABLE 3.10-5: THRESHOLDS OF SIGNIFICANCE SUMMARY

<i>SETTING</i>	<i>SIGNIFICANCE THRESHOLD</i>	<i>REGULATORY SOURCE</i>
<i>CONSTRUCTION</i>		
Nighttime	Maximum sound level of 65 dBA measured at property line for properties adjacent to residential receptors 5:00 p.m. to 8:00 a.m.	Pittsburg Municipal Code
Daytime	Maximum 8-hour L_{Aeq} of 80 dBA or less 8:00 a.m. to 5:00 p.m.	2040 General Plan Policy 13-P-1.7 and Federal Transit Administration
<i>OPERATION</i>		
<i>Mobile Source (transportation noise)</i>		
Ambient sound level of <60 dBA without project	+5.0 dB or more	2040 General Plan Action 13-A-1.e
Ambient sound level of 60-65 dBA without project	+3.0 dB or more	
>60 dBA	+1.5 dB or more	
<i>Stationary (uses)</i>		
Daytime (7 a.m. to 10 p.m.)	55 Hourly Leq, dBA	2040 General Plan Policy 13-P-1.9
Nighttime (10 p.m. to 7 a.m.)	45 Hourly Leq, dBA	
	+3.0 dB or more	2040 General Plan Draft EIR
<i>VIBRATION</i>		
Damage to structures	0.12 in/sec PPV	Caltrans Guidelines
Annoyance to people	0.04 in/sec PPV	Caltrans Guidelines

3.10.3 THRESHOLDS OF SIGNIFICANCE

Consistent with Appendix G of the CEQA Guidelines, the proposed project will have a significant impact related to noise if it will:

- Generate a substantial temporary or permanent increase in ambient noise levels in the vicinity of the project in excess of standards established in the local general plan or noise ordinance, or applicable standards of other agencies;
- Generate excessive groundborne vibration or groundborne noise levels; or
- For a project located within the vicinity of a private airstrip or an airport land use plan or, where such a plan has not been adopted, within two miles of a public airport or public use airport, expose people residing or working in the project area to excessive noise levels.

3.10.4 IMPACTS AND MITIGATION MEASURES

Impact 3.10-1: Generate a substantial temporary or permanent increase in ambient noise levels in excess of local general plan standards or noise ordinance (Less Significant with Mitigation)

CONSTRUCTION

Construction activities typically involve the use of heavy machinery that can be a significant source of noise, and while often temporary, can result in significant impacts. As previously described, the City municipal code prohibits construction noise in excess of 65 dBA at sites adjacent to residential properties outside of the hours of 8:00 a.m. and 5:00 p.m. The 2040 General Plan also includes a policy to limit loud construction noise to the hours of 8:00 a.m. and 5:00 p.m. This analysis adopts these thresholds, consistent with the Draft Environmental Impact Report for the Pittsburg 2040 General Plan Update (2040 GP DEIR).

Neither the City municipal code nor the 2040 General Plan include any quantitative sound level limits for construction noise between the hours of 8:00 a.m. and 5:00 p.m. FTA guidelines recommend a daytime criterion of an 8-hour L_{Aeq} of 80 dBA, which this analysis adopts as a threshold for daytime construction noise.

FTA's guidelines were used to prepare performance standards for evaluating the acceptable dBA from the distance between construction to sensitive noise receptors to stay within the 2040 General Plan noise levels. The standards have been established by the Pittsburg Technology Park Specific Plan Noise and Vibration Technical Report, (Appendix J), prepared by Ramboll.

Table 3.10-6 outlines the construction noise performance standards for the Plan Area. The first column in the table identifies a distance to the nearest sensitive noise receptor. The second column provides the noise threshold at 50 ft from the source of noise. For example, construction activities within 80 ft of the noise receptor, cannot generate noise that exceeds 81 dBA when measured at 50 ft from the noise source. Furthermore, construction noise 800 feet from the sensitive receptor cannot exceed 101 dBA measured at 50 feet from the source of the noise.

Table 3.10-7 provides a general assessment of common construction equipment noise levels measured at 50 ft and 800 ft for reference. This table should be used to assess potential construction sound levels depending on the distance to the nearest sensitive noise receptor. Although it is not anticipated for future construction activities to exceed the thresholds identified in Table 3.10-6, a general assessment for future development within the Plan Area should be undertaken to determine if a detailed analysis of construction noise is required.

TABLE 3.10-6: CONSTRUCTION PERFORMANCE STANDARDS FOR COMPLIANCE

DISTANCE TO NEAREST SENSITIVE RECEPTOR (IN FT.)¹	DBA THRESHOLD MEASURED AT 50 FEET¹
80	81
100	83
150	86
200	89
400	95
800	101

¹ SOURCE: PITTSBURG TECHNOLOGY PARK SPECIFIC PLAN, NOISE AND VIBRATION TECHNICAL REPORT, RAMBOLL 2024

TABLE 3.10-7: COMMON CONSTRUCTION EQUIPMENT NOISE LEVELS

COMMON CONSTRUCTION EQUIPMENT²	LASMAX AT 50 FEET	LASMAX AT 800 FEET
Air Compressor	80	56
Backhoe	80	56
Compactor	82	58
Concrete Mixer	85	61
Crane, Derrick	88	64
Crane, Mobile	83	59
Dozer	85	61
Generator	82	58
Grader	85	61
Jack Hammer	88	64
Loader	80	56
Paver	85	61
Pile-driver (impact)	101	77
Rock Drill	95	71
Roller	85	61
Scraper	61	61
Truck	60	60

SOURCE: FEDERAL TRANSIT ADMINISTRATION, TRANSIT NOISE AND VIBRATION IMPACT ASSESSMENT, SEPTEMBER 2018

If there is a potential for future construction activities to be in exceedance of any performance standards identified in Table 3.10-6, then a detailed construction noise analysis is required (see **MM 3.10-1**). If the detailed construction noise analysis concludes that potentially significant impacts may occur, measures to reduce construction noise impacts should be incorporated to reduce noise levels. Examples of construction noise mitigation for future development includes limiting hours of construction, locating stationary noise sources (e.g., generators, compressors) away from sensitive receptors, using shrouds or temporary barriers for louder equipment (e.g., pile drivers), using newer machinery or using fewer concurrent pieces of equipment.

OPERATIONS

The proposed Specific Plan provides the policy and implementation actions for future development of a technology park employment area on a portion of the former Delta View Golf Course and does not directly propose development. Permanent increases in noise levels from on-site operational noise, or stationary sources, typically involve the use of heavy machinery that can be a significant

source of noise. The Specific Plan would permit uses that would generate parking lot noise, dock noise, rooftop air handling units, and backup generators. Other significant noise sources that would be permitted within the Plan Area include cooling towers, chillers, turbines, and large generators, as energy, manufacturing, and data centers.

Typical sound generation from operations in the Plan Area would comply with 2040 General Plan noise performance standards for daytime and nighttime noise levels by Leq, dBA, per the Pittsburgh Technology Park Specific Plan Noise and Vibration Technical Report, (Appendix J). As illustrated in Table 3.10-8, performance standards indicate that sound generated by operational activity within the Plan Area that travels to the nearest receptor at 80 feet during the daytime, cannot exceed 38 dBA measured at 100 feet during nighttime and 43 dBA during daytime. The scale of dBA thresholds between 80 and 800 feet are provided in the table below, assuming measurement at 100 feet from the source of sound. In addition, common uses and their associated typical dBA at 100 feet are provided in Table 3.10-9, per the 2040 General Plan.

TABLE 3.10-8: OPERATIONAL PERFORMANCE STANDARDS FOR COMPLIANCE

DISTANCE TO NEAREST SENSITIVE RECEPTOR (IN FT.)	DBA THRESHOLD MEASURED AT 100 FEET (DAYTIME)	DBA THRESHOLD MEASURED AT 100 FEET (NIGHTTIME)
80	43	38
100	45	40
150	48	43
200	51	46
400	57	52
800	63	58

SOURCE: PITTSBURG TECHNOLOGY PARK SPECIFIC PLAN, NOISE AND VIBRATION TECHNICAL REPORT, RAMBOLL 2024

TABLE 3.10-9: TYPICAL STATIONARY SOURCE NOISE LEVELS

COMMON STATIONARY SOURCES	LEQ AT 100 FEET
Busy parking lot	54 dBA
Cooling tower	69 dBA
Loading dock	66 dBA
Truck Circulation	48 dBA
Vendor deliveries	58 dBA
Maintenance Yard	68 dBA

SOURCE: CITY OF PITTSBURG 2040 GENERAL PLAN DRAFT ENVIRONMENTAL IMPACT REPORT.

The 2040 General Plan also indicates that when existing noise levels are below 60 dB, such as the case as the Plan Area, an increase of 5 dB in noise would be considered significant. However, the proposed Specific Plan does not include the proposal of project level development, rather, is a policy framework to guide development. Performance standards illustrated above are intended to provide thresholds for future development within the Plan Area.

Based on the distance to the nearest residential noise-sensitive receptors, most of the permitted uses should be able to limit sound emissions from the site(s) to not exceed the thresholds of significance at the residences, either by means of careful site arrangement or with “off-the-shelf”

noise control techniques, such as low-sound fans, acoustical louvers, and sound barriers, or a combination thereof.

For most land uses, proper site layout and incorporation of noise control techniques to the design should result in a less-than-significant impact at the nearby sensitive receptors. Regardless, a general assessment of potential operational noise should be conducted for future development projects. If there is a potential for a proposed project to not comply with any of the performance standards identified in Table 3.10-8, then a detailed operational noise analysis (see **MM 3.10-2**) would be required. For operational noise to result in a less-than-significant impact, mitigation techniques should be incorporated to reduce noise emissions to comply with the thresholds in Table 3.10-8 above. Examples of operational noise mitigation include changes to a site layout to place noise sources further from sensitive receptors, using manufacturer-supplied or third-party noise mitigation (e.g., low-sound fan options, silencers, acoustical louvers), and installing sound barriers.

MOBILE SOURCE

The 2040 General Plan considers an increase in 5 dBA in ambient noise as significant for the Plan Area, as the existing ambient noise is less than 60 dBA. As stated in Section 3.10.2 *Environmental Setting*, the most active road in proximity to the Plan Area is West Leland Road, which is a major contributor to noise in the area.

Given the various potential uses for the Plan Area, the traffic noise analysis assumes a split of 80 percent trips related to manufacturing, and 20 percent for commercial traffic. It is anticipated that the Plan Area would result in a total of 3,582 trips per day. As a conservative estimate, the analysis assumes 15 trips are made by vendor delivery trucks. The sound level of traffic along W Leland Road from Phases I through III was predicted using the Cadna-A (Computer Aided Noise Abatement) computer program noise model. The results of the model and a comparison to the 2040 General Plan existing sound levels are provided in table 3.10-10 below.

TABLE 3.10-10: CONSTRUCTION PERFORMANCE STANDARDS FOR COMPLIANCE

<i>SOURCE</i>	<i>SOUND LEVEL AT NEAREST SENSITIVE RECEPTOR (APPROXIMATELY 65 FEET), DNL</i>	<i>INCREASE FROM EXISTING (2022) SOUND LEVEL</i>	<i>THRESHOLD</i>	<i>THRESHOLD EXCEEDANCE</i>
Phase I through Phase III	56.5 dBA	-	-	-
Existing (2022)	65.7 dBA	-	-	-
2040 General Plan	66.6 dBA	0.9 dB	+1.5 dB	No
2040 General Plan + Specific Plan Phases I through III	67.0 dBA	1.3 dB	+1.5 dB	No

SOURCE: PITTSBURG TECHNOLOGY PARK SPECIFIC PLAN, NOISE AND VIBRATION TECHNICAL REPORT, RAMBOLL 2024

As shown in the table above, it is assumed that future buildout of the Plan Area as assumed by the noise analysis would not exceed the significance threshold, and impacts would be less than significant.

Due to the number and variety of permitted land uses within both the 2040 General Plan’s ECI land use designation and the proposed Specific Plan, there are a multitude of various land use buildout scenarios that could occur within the Plan Area. The noise analysis prepared for this PEIR made conservative assumptions for buildout and traffic generation (mobile sources). However, not every potential buildout scenario falls within these assumptions. Should future development include a vehicle mix that includes a greater amount of truck traffic than analyzed in this PEIR (15 trips per day), for example, warehousing and logistics uses, then subsequent noise analysis would be required, as detail in **MM 3.10-3**.

Mitigation Measures

MM 3.10-1: Construction Mitigation Plan

If at the time of development review, an Applicant cannot provide evidence of project level conformance with Table 3-1, the Applicant shall submit a detailed construction mitigation plan accompanied by a construction noise analysis that incorporates specific mitigation techniques for site-specific noise reduction and attenuation. Examples include limiting hours of construction, locating stationary noise sources (e.g., generators, compressors) away from sensitive receptors, using shrouds or temporary barriers for louder equipment (e.g., pile drivers), and using newer machinery.

MM 3.10-2: Operational Noise Mitigation Plan

If at the time of development review, an Applicant cannot provide evidence of project level conformance with Table 3.10-8, the Applicant shall submit a detailed operational mitigation plan accompanied by an operational noise analysis that incorporates specific mitigation techniques for site-specific noise reduction and attenuation. Examples of operational noise mitigation include changes to a site layout to place noise sources further from sensitive receptors, using manufacturer-supplied or third-party noise mitigation (e.g., low-sound fan options, silencers, acoustical louvers), and installing sound barriers.

MM 3.10-3: Subsequent Noise Analysis

If future development anticipates greater use of truck trips beyond what was analyzed in this PEIR (15 trips per day), then the Applicant shall prepare a subsequent noise analysis to provide evidence that they conform to the noise level thresholds identified in Table 3.10-8. If the Applicant cannot demonstrate conformance with Table 3.10-8, then the Applicant shall submit a detailed operational mitigation plan accompanied by an operational noise analysis that incorporates specific mitigation techniques for site-specific noise reduction and attenuation.

Significance determination

While noise generated from construction and operational uses are anticipated to remain below significance levels, implementation of **MM 3.10-1** and **MM 3.10-2** would ensure steps would be taken to reduce noise impacts on sensitive noise receptors; thereby reducing construction and/or operational noise to allowable thresholds. Any exceedance from proposed development would be required to provide a detailed mitigation plan with site-specific noise reduction and attenuation measures to meet performance standards. Furthermore, should future development propose a greater amount of truck traffic than 15 trips per day, then a subsequent noise analysis would be required, as detail in **MM 3.10-3**. Thereby, at the program-level of analysis, noise generated within the Plan Area would be **less than significant**.

Impact 3.10-2: Generate excessive groundborne vibration or groundborne noise levels (Less than Significant)

Levels of ground vibration reduces rapidly as it gets further from the origin. For example, at distances of 500 feet or more, even a significant source of vibration (e.g., impact pile driving), would not exceed Caltrans' vibration thresholds. Future development in Phase I of the Plan Area is located near the Contra Costa Canal, and approximately 400 feet from the nearest sensitive receptor. Given that Phase II and Phase III are approximately 800 feet from the nearest residence, it is unlikely that any future activities on the Phase II and III would exceed vibration thresholds. Therefore, it is anticipated that a **less than significant** impact would occur, and no mitigation is required.

Impact 3.10-3: For a project located within the vicinity of a private airstrip or an airport land use plan or, where such a plan has not been adopted, within two miles of a public airport or public use airport, expose people residing or working in the project area to excessive noise levels. (No Impact)

The Plan Area is not located within an airport land use plan, and there are no public airports or public use airports within two miles of the Plan Area. Furthermore, there are no private airstrips within the Plan Area vicinity and the nearest public airport is the nearest airport facility to the Plan Area is Buchanan Field Airport (located approximately 10 miles or further southwest of the Plan Area). Therefore, there would be **no impact**, and no mitigation is required.

This section of the Program Environmental Impact Report (PEIR) addresses population and housing impacts associated with the buildout of the Pittsburg Technology Park Specific Plan (Specific Plan; project). This section is organized by the environmental setting, regulatory setting, and impact analysis. The information provided in this section is based on the following documents:

- City of Pittsburg. *Pittsburg 2040 General Plan*. Adopted May 2024.
- City of Pittsburg. *Draft Pittsburg 6th Cycle Housing Element Update 2023-2031*.
- City of Pittsburg. *Pittsburg 2040 General Plan Draft Environmental Impact Report*. December 2023.

3.11.1 ENVIRONMENTAL SETTING

POPULATION AND HOUSING TRENDS

The Association of Bay Area Governments (ABAG) is the metropolitan planning organization responsible for allocating the number of new housing units that jurisdictions are required to meet to support growing populations within the region. The California Department of Finance uses population and employment projections to determine the housing needs and anticipated population growth at the local and regional level.

As seen below in Table 3.11-1, the current (2019) estimated population in Contra Costa County is 1,155,879 people, a 22 percent increase from 2000. This equates to a 1.9 percent annual change for the region in population size. Within the same time frame, the City of Pittsburg experienced a 26 percent population increase from 2000 to 2019, where the population size increased from 56,820 to 71,422. This equates to three percent annual change in population size for the City. Based on the Draft City of Pittsburg 6th Cycle Housing Element Update, Pittsburg had the third highest percentage change in population when compared to the region.

In the City of Pittsburg, the number of households have increased at a slower rate than the population. Between 1980 and 2000, the number of households increased by 60 percent compared to 72 percent increase in population. Between 2000 and 2019, the number of households increased by 19 percent compared to 28 percent increase in population. The average household size has slightly increased from 2.97 in 1980 to 3.33 in 2019. When compared to the region, the City of Pittsburg averages a greater number of persons per household.

The City of Pittsburg experienced the greatest growth in households between 1980 and 2000, with a 60 percent change in households and has since slowed. During this time period, the City grew by 72% in population. Compared to the region, Contra Costa County experienced a 43 percent increase in households, with a growth in population by 45 percent during the same time period. The following decade (2000 to 2019) the growth in households slowed for both the City and region, where the City of Pittsburg experienced a 20 percent increase in number of households between 2000 and 2019, and the region a 15 percent increase in households during this time.

3.11 POPULATION AND HOUSING

Table 3.11-1 summarizes the population and household data for Pittsburg and Contra Costa County from 1980 through 2019.

TABLE 3.11-1: POPULATION AND HOUSEHOLD GROWTH

	1980	1990	2000	2010	2019	1980- 2000 CHANGE	2000- 2019 CHANGE	AVG. ANNUAL CHANGE (1980- 2019)
PITTSBURG								
Population	33,034	48,276	56,820	61,723	71,422	72%	26%	3.0%
Households	11,087	15,852	17,741	19,785	21,357	60%	20%	2.4%
Persons per household	2.97	3.02	3.17	3.20	3.33	7%	5%	0.3%
CONTRA COSTA COUNTY								
Population	656,380	803,732	948,816	1,049,025	1,155,879	45%	22%	1.9%
Households	241,418	300,288	344,129	375,364	394,769	43%	15%	1.6%
Persons per household	2.69	2.64	2.72	2.77	2.87	1.1%	5.5%	0.2%

SOURCE: BAY AREA CENSUS; U.S. CENSUS QUICKFACTS; CALIFORNIA DOF, REPORT E-5, 2019; PITTSBURG GENERAL PLAN EIR.

Housing Units

As shown in Table 3.11-2, the number of housing units in Pittsburg has increased at rates lower than the growth in population. In 2019, there were 23,126 housing units in the City, equating to a 20 percent increase in housing units between 2000 to 2019, where the population grew by 26 percent in that timeframe. Comparatively, the region experienced a slightly smaller growth in housing units during the same period, totaling a 17 percent growth in housing units.

TABLE 3.11-2: HOUSING UNITS

	1990	2000	2010	2019	1990- 2000 CHANGE	2000- 2019 CHANGE	AVERAGE ANNUAL CHANGE (1990- 2019)
Pittsburg	16,857	18,300	21,060	23,126	9%	26%	1.2%
Contra Costa County	316,170	354,577	400,263	416,062	12%	17%	1.0%

SOURCE: BAY AREA CENSUS; U.S. DOF, REPORT E-5; PITTSBURG GENERAL PLAN EIR.

Housing Type

The majority of housing units in the City are single-family detached buildings, which accounts for 70 percent of the housing units. The remaining housing types include single-family attached (6 percent), multi-family (5 percent), multi-family apartments with five or more units (16 percent), and mobile homes (3 percent).

In Contra Costa County, the majority of housing units are single-family detached, which accounts for 81 percent of housing units. The remaining housing types include single-family attached (9 percent), multi-family (2 percent), multi-family apartments with five or more units (5 percent), and mobile homes (2 percent).

The housing types in Contra Costa County are similar to those found in the City, although the amount of single-family housing makes up a greater share of the housing stock in the County than in the City. Additionally, the City has a larger share of multi-family housing compared to the County.

3.11.2 REGULATORY SETTING

FEDERAL

There are no federal regulations for the population and housing topics applicable to the proposed Pittsburg Technology Park Specific Plan.

STATE

California Environmental Quality Act

CEQA was developed to protect the quality of the environment and the health and safety of persons from adverse environmental effects. Discretionary projects are required to be reviewed consistent with the requirements of CEQA to determine if there is potential for the project to cause a significant adverse effect on the environment. Depending on the type of project and its potential effects, technical traffic, noise, air quality, biological resources, and geotechnical reports may be needed. If potential adverse effects can be mitigated to less than significant levels, a mitigated negative declaration may be adopted. If potentially adverse effects cannot be mitigated to less than significant levels, an environmental impact report is required. These documents have mandated

content requirements and public review times. Preparation of CEQA documents can be costly and time-consuming, potentially extending the processing time of a project by a year or longer.

LOCAL

City of Pittsburg 2040 General Plan

The City of Pittsburg 2040 General Plan (2040 General Plan) is a comprehensive and long-term blueprint for the development and growth within the city. The 2040 General Plan governs all land use regulations, including zoning, and identifies the community's vision for the future and provides a framework that will guide decisions on growth, development, and conservation of open space and resources. It is organized into a set of goals, policies, and implementing actions for each element (i.e. chapter) of the plan. The 2040 General Plan contains elements that guide housing and development, and an economy to support the growth, specifically the Growth Management, Housing, and Economic Development Elements.

Growth Management Element

The Growth Management Element provides a policy framework to ensure unwanted impacts from growth and development are mitigated to the greatest extent, intended to comply with Contra Costa County growth control measures (Measure J and Measure C). In 2004, voters extended the Contra Costa Transportation Improvement and Growth Management Program (Measure C) to include a Contra Costa County Transportation Sales Tax Expenditure Plan (Measure J). Measure J required that future development pay for facilities required to meet the demand. To plan for future development, Measure J required that the City adopt a development mitigation program, address housing options, adopt an Urban Limit Line (ULL), and develop a five-year capital improvement program, among other public and private cooperation agreements. For consistency with these regional requirements, the Growth and Management Element establishes goals, policies and actions to protect the City's resources and prohibit urban development beyond the Voter Approved ULL. This ULL encourages thoughtful development to ensure that new residential, commercial, industrial, and other non-public growth contributes to its fair share of costs associated with future development. This Element also contains action items that support State mandated housing processes, such as submitting the required Housing and Community Development Annual Progress Report to maintain housing inventory for a variety of housing types, densities, and prices to balance the City's housing stock.

Policy 3-P-1.5: Allow urban and suburban development only in areas where public facilities and infrastructure (police, fire, parks, water, sewer, storm drainage, and community facilities) are available or can be provided.

Policy 3-P-1.6: Ensure that the existing and planned transportation system will have adequate capacity to accommodate new urban development prior to project approval.

Policy 3-P-2.1: Require new development to demonstrate that all necessary infrastructure will be fully funded and constructed prior to certificates of occupancy through payment of development impact fees, funding fair-share of necessary improvements, or construction of

improvements and coordinate with public service agencies and/or districts as necessary to confirm adequacy of existing and planned infrastructure.

Housing Element

The Housing Element provides a comprehensive plan for the City to meet their share fair of housing per the Regional Housing Needs Allocation number. This plan works to ensure that every resident at every income segment has access to adequate housing. By identifying specific housing needs for the growing population, and recognizing constraints both in government and market factors, the element works to establish programs and policies to encourage residential development that is affordable to the residents of the City of Pittsburg. The Element considers adequate sites for increased residential development that will ensure the City can meet their fair share of housing in Contra Costa County. Examples of programs that work to preserve existing housing and encourage a mix of housing types and densities are listed below:

Policy H-1.1: Encourage diversity in the type, density, size, affordability, and tenure of residential development to meet Pittsburg's housing needs, while maintaining quality of life goals for the community.

Policy H-1.2: Provide an adequate supply of mixed use and residentially zoned land of appropriate densities to accommodate existing and anticipated housing needs throughout the 6th Cycle.

Policy H-2.1: Maintain sustainable neighborhoods with quality housing, infrastructure, and open space that fosters neighborhood character and the health of residents and encourage property owners to maintain rental and ownership units in sound condition through promoting housing rehabilitation and maintenance.

Policy H-2.3: Utilize public funds to preserve rent-restricted units at risk of conversion to market rate, and conserve and rehabilitate the existing supply of housing affordable and made available to low-, very low-, low-, and/or moderate-income households when and where appropriate.

Economic Development Element

The Economic Development Element provides a policy framework to position Pittsburg for economic competitiveness in the region for long-term fiscal sustainability. The element contains goals, policies, and actions that work to identify adequate sites that will support existing businesses and promote diverse economic growth for a broad range of employment opportunities. In order to attract and retain employers and residents, the element ensures that infrastructure is in place or planned to support successful commercial and industrial base, including emerging technologies. Economic policies to support a growing population and remain competitive in the region are provided below:

3.11 POPULATION AND HOUSING

Policy 6-P-1.1: Ensure that the City's Economic Development Strategic Plan economic development goals, and vision and implementation program are aligned and coordinated with General Plan goals, policies, and programs and land use map.

Policy 6-P-1.2: Pursue strategies that support the attraction and retention of diverse industries, a diverse workforce, and a diversity of municipal revenue sources.

Policy 6-P-1.3: Achieve and maintain a balance of land uses within the City that assures residential development is complemented by expanded local employment opportunities, retail and commercial services, and recreation and entertainment venues; and that the City-wide mix of land uses provides a balanced variety of housing and business types and balances uses that produce revenues and those that require public expenditures.

Policy: 6-P-1.4: Ensure that the City's revenue and fiscal base is not overly dependent on any one type of land use, development, or revenue source.

3.11.3 THRESHOLDS OF SIGNIFICANCE

Consistent with Appendix G of the CEQA Guidelines, the proposed Specific Plan will have a significant impact on population and housing if it will:

- Induce substantial unplanned population growth in an area, either directly (for example, by proposing new homes and businesses) or indirectly (for example, through extension of roads or other infrastructure); or
- Displace substantial numbers of existing people or housing, necessitating the construction of replacement housing elsewhere.

3.11.4 IMPACTS AND MITIGATION MEASURES

Impact 3.11-1: Induce substantial unplanned population growth in an area, either directly (for example, by proposing new homes and businesses) or indirectly (for example, through extension of roads or other infrastructure) (Less than Significant)

According to Appendix G of the CEQA Guidelines, impacts related to population and housing would be significant if implementation of the proposed Specific Plan would induce substantial unplanned population growth either directly or indirectly. Direct growth would include the construction of new housing and businesses. The intent of the proposed Specific Plan is to guide development in the Plan Area to generate economic opportunity, but it does not propose any development projects, in and of itself. Implementation of the proposed Specific Plan would not result in direct population growth as it does not permit the construction of new housing units or businesses.

According to CEQA, a project can indirectly induce growth by stimulating a need for additional housing and services or removing obstacles to growth such as expanding water facilities to accommodate a growing population. As provided in Chapter 1, *Project Description* of this PEIR, the

proposed Specific Plan is intended to establish a direct connection between the 2040 General Plan and opportunities for economic development. During the development of the City of Pittsburg 2040 General Plan, the City identified strategic locations to accommodate and encourage employment growth, and the Plan Area was identified as an appropriate location to help implement this goal. The proposed Specific Plan would facilitate these uses, as allowed by the ECI land use designation, to foster vibrant, diverse, and dynamic employment hubs that accommodate technology, advanced manufacturing, logistics, and other sectors that generate substantial employment opportunities. As such, uses permitted by the proposed Specific Plan would have the potential for attracting new residents to the area, resulting in an increased economic activity, potentially inducing growth.

Fostering economic growth may attract residents to the area and drive the housing market; however, the ABAG Housing Needs Report identifies Pittsburg as a net exporter of workers, as the City has more residents than jobs in all income ranges. Job projections within the San Francisco-Oakland-Berkeley region is expected to increase by 8.1 percent between 2018 and 2028. The 2040 General Plan projects that by the year 2040, the percent change in population in the City of Pittsburg totals an increase of 28 percent in population size and 212 percent increase in jobs.

According to CEQA Guidelines 151262(e), it is not assumed that growth in any area is “necessarily beneficial, detrimental, or of little significance to the environment”. Employment growth may increase economic activity in the area; however, adverse impacts would arise from growth that is unplanned. The proposed Specific Plan is consistent with the intent of the 2040 General Plan to foster economic opportunity. Employment-generating uses allowed by the proposed Specific Plan are designed to accommodate these population and job projections, and the growth is guided by elements in the 2040 General Plan described above.

The Plan Area is accessible by existing local roads and is serviced by bus stops at the intersection of Leland Road and Golf Club Road. Golf Club Road would be extended within the Plan Area and some infrastructure and service extensions would be needed to accommodate future development projects allowed by the proposed Specific Plan. These include a main water line extension, a main sewer extension, electrical service lines connecting to proposed development, gas infrastructure, and telecommunication infrastructure, as described in the proposed Specific Plan (Appendix B). These expected extensions are intended to serve employment generating uses within the Plan Area, as prescribed through the 2040 General Plan. The extension of utilities would be sized to serve future development within the Plan Area and would not provide capacity for development beyond what would be permitted by the proposed Specific Plan.

The Plan Area would accommodate the planned growth within the City as identified in the 2040 General Plan by fostering economic opportunities for a growing population, rather than inducing unplanned growth. Future development within the Plan Area would continue to be controlled by the City as guided by the 2040 General Plan, Specific Plan and City Zoning Ordinance. Therefore,

population and housing growth associated with the proposed Specific Plan would result in a **less than significant** impact, and no mitigation is required.

Impact 3.11-2: Displace substantial numbers of existing people or housing, necessitating the construction of replacement housing elsewhere (Less than Significant)

The 2040 General Plan designates the Plan Area as ECI. Currently, the site is vacant. There are no existing or planned housing units within the Plan Area. Future development and infrastructure projects facilitated by the proposed Specific Plan would not involve the removal of housing units, and thereby will not physically displace people or housing units. Economic growth and potential for rapid change may lead to the gentrification of an area, which may be an indicator of future displacement; however, the 6th Cycle Housing Element Update provides housing policies that discourage displacement by encouraging home improvement programs and other programs that work to preserve affordable housing in the City. The City's Community and Economic Development Department also oversees Program 24: Replacement Housing, as identified in the adopted Housing Element, that is required by Government Code Section 65583.2(g)(3) to replace affordable homes to the same or lower economic income group as a condition of any development on a nonvacant site to ensure housing affordability within the City. These housing policies would further ensure that a range of housing types are provided in the City for all economic segments of the population, and that housing conditions are evaluated as the housing supply ages.

Implementation of the proposed Specific Plan would not involve the removal or demolition of housing units and thereby people, as the site is vacant and undeveloped. Therefore, impacts of the proposed Specific Plan on the displacement of people or housing are considered **less than significant**, and no mitigation is required.

Public services such as fire and police protection are vital to maintaining a safe and healthy community. Educational services serve as a foundation for providing citizens with the skills and resources to excel today and in the future. There are many other public services that are important to a community, such as parks and recreational opportunities, libraries, museums, hospitals, and other healthcare facilities.

This section provides a background discussion and analysis of fire protection services, police services, schools, parks and recreational facilities, libraries, and other community facilities and services. This section is organized with an existing setting, regulatory setting, and impact analysis. Additional analysis related to utilities services, including water, sewer, and solid waste disposal are addressed in Section 3.14 of this Program Environmental Impact Report (PEIR).

3.12.1 EXISTING CONDITIONS

FIRE PROTECTION SERVICES

The Contra Costa County Fire Protection District (CCCFPD) provides fire protection services to the Plan Area. The CCCFPD boundaries encompass the central and northern portions of Contra Costa County (CCC), extending from the City of Antioch in the east to the eastern border of the City of Richmond in the west, and as far south as the northern border of the City of Moraga. The CCCFPD has a boundary area of approximately 257 square miles. The CCCFPD provides fire suppression (structural, vehicle, and vegetation fires) and prevention, Advanced Life Support (ALS) for medical emergencies, rescue, dispatch, initial hazardous materials response, fire inspection, plan review, and education. The CCCFPD has 25 fire stations and employs 288 professional firefighters across its service area.

Fire Stations

The CCCFPD has three fire stations within the City limits (Stations 84, 85, and 87) and one station (Station 86) within the City's Sphere of Influence (SOI) for the Bay Point Area. The CCCFPD maintains a minimum daily staffing of 82 personnel, and the total number of employees within the CCCFPD, including both sworn and non-sworn employees, is currently 333 individuals. In 2018, the CCCFPD received over 60,000 emergency and non-emergency calls for service. The CCCFPD's current response time goal for emergency and non-emergency calls is five minutes for 90 percent of all calls received. According to CCCFPD, the average ambulance response time, as of 2018, was four minutes and 38 seconds.

Fire Station 87 is located within a two-minute drive from the Plan Area. This fire station is generally staffed with three personnel: one captain, one engineer, and one firefighter 24 hours a day.

Fire Concerns

Areas in Pittsburg representing the greatest risk are in the hills south of the City, which consist of dry grasslands for much of the year. Wildland fires in East Contra Costa County are a continuous

threat, with the highest risk occurring during the wildland fire season, from June to October. Much of the threat is due to open grasslands abutting residential developments. Additional information related to local wildfire threats is included in Section 3.15, *Wildfires*.

POLICE PROTECTION SERVICES

The Pittsburg Police Department (PPD) is responsible for providing law enforcement services in the City, including patrol, crime prevention, parking and traffic control, community awareness, investigations, and temporary holding facilities. The Department is responsible for community policing, has a Special Weapons and Tactics Team, and conducts Emergency Preparedness training. The PPD relies on the Sheriff's Office for search and rescue services and long-term holding facilities, County Animal Control for animal services, and the City of Walnut Creek for bomb squad services. Additionally, PPD contracts with the Sheriff's Office for dispatch services.

Organization

The PPD is organized into Operations and Support Services and contains numerous divisions, special teams and programs as described in detail below. The PPD's 85 sworn police officers serve 72,319 Pittsburg residents in 2018, or approximately one sworn officer for every 850 residents.

Patrol Division

PPD is located on 65 Civic Avenue approximately two miles northeast of the Plan Area. Pittsburg is broken up into five designated areas to provide equal police coverage to the entire City. The Patrol Division is supported by the Traffic Division, which encompasses three officers plus a supervisor, five School Resource Officers assigned to Pittsburg High School and the Junior High Schools located throughout the City, a Community Response Team, as well as five Community Service Specialists.

Traffic Division

The PPD Traffic Unit is comprised of one sergeant, four officers, and one community service specialist who patrol 346 miles of roadway within the City. The mission of the Traffic Unit is to ensure the safety of Pittsburg community by enforcing both the California Vehicle Code and the Pittsburg Municipal Code (PMC). Additionally, the Traffic Unit investigates all major collisions that occur in the City.

Investigations Division

The Investigation Division is tasked with thoroughly investigating serious crimes. Detectives evaluate and prepare criminal cases for appropriate clearance and submission to a prosecutor. The division is comprised of one lieutenant, one sergeant, twelve detectives, a crime scene investigator, a records clerk, a community service specialist and a cold case homicide investigator.

PARKS AND RECREATIONAL FACILITIES

Regional Parks

On a regional scale, the City is located near several recreational areas and facilities, which include both water-based, and passive recreational opportunities. The closest regional park is Anuta Park, which is approximately four acres and is located approximately three miles northeast of the Plan Area.

City Parks

The City's Parks and Recreation Department manages the maintenance of the City's 30 park facilities. The Community Development Department is responsible for acquisition and development of park facilities. The primary source of funding for park maintenance comes from the Citywide Landscaping and Lighting Assessment District, developer impact fees, and the General Fund. The City currently maintains a neighborhood and community park standard of five acres per 1,000 residents.

The City's parks consist of approximately 149.1 acres of developed park space. With an approximate population of approximately 72,541 persons, the City's parkland totals approximately 2.1 acres of City parkland per 1,000 residents (excluding trails and Contra Costa County facilities).

The closest City parks to the Plan Area are John Henry Johnson Park, which is located on Leland Road approximately 0.2-miles from the Plan Area and Stoneman Trailhead Park located approximately 0.3-mile west of the Plan Area.

The John Henry Park (formerly named Stoneman North Park) is eight-acres and provides three picnic areas, two large turf areas, a basketball court and a playground. The park has a cement walking trail that follows the perimeter of the park for approximately 0.62-miles. Other amenities include restrooms, drinking fountains and a lighted parking lot.

The Stoneman Trailhead Park consists of a large open space which borders the former Delta View Golf Course and is located at the end of John Henry Johnson Parkway off of West Leland Road. Formerly a military artillery practice range for the U.S. Army, the 190 acre site was renovated by the City for public recreational use. The trailhead park includes five picnic sites, horseshoe pits, restrooms, drinking fountain and a parking lot. The loop trail is approximately two miles and offers scenic views of the City.

SCHOOLS

The City of Pittsburg is served by the following three school districts:

- Pittsburg Unified School District (PUSD)
- Antioch Unified School District (AUSD)
- Mt. Diablo Unified School District (MDUSD)

3.12 PUBLIC SERVICES AND RECREATION

PUSD is a K-12 district that serves the City and has a close relationship with Los Medanos Community College. PUSD serves more than 11,500 students from kindergarten through twelfth grade. PUSD also provides the community with an outstanding public preschool program and award-winning adult education school. This school district is comprised of eight elementary schools, three junior high schools, one comprehensive high school, and one alternative education high school. PUSD also includes programs for adult education, independent study programs, alternative learning experiences, and early childhood education.

AUSD serves approximately 17,000 students in the City of Antioch, small portions of the City of Oakley, and the eastern-most portions of the City of Pittsburg. Specifically, the eastern-most portions of the City are located within the attendance boundaries of Fremont Elementary School and Turner Elementary School. AUSD is comprised of 15 elementary schools, one virtual academy, four junior high schools, five high schools, one medical high school, and one alternative education high school.

MDUSD is a public school district in Contra Costa County that currently operates 29 elementary schools, nine middle schools, five high schools, seven alternative school programs and an adult education program. MDUSD is one of the largest school districts in the state. MDUSD covers 150 square miles, including the Cities of Concord and Clayton, as well as most of Pleasant Hill and portions of Walnut Creek, Pittsburg, Lafayette, and Martinez. It also services unincorporated areas, including Pacheco, Clyde, and Bay Point.

Public schools serving the City and the Plan Area include the following:

- Rancho Medanos Junior Highschool, located on 2301 Range Road, approximately 0.1 miles north of the Plan Area, serving grades 6-8 with 2021-2022 enrollment of 799 students.
- Heights Elementary School, located on 40 Seeno Street, approximately, 0.5 miles east of Plan Area, serving grades TK-5 with 2021-2022 enrollment of 517 students.
- Los Medanos Elementary School, located on 610 Crowley Avenue, approximately 0.5 miles northeast of Plan Area, serving grades K-5, with 2021-2022 enrollment of 632 students.

OTHER PUBLIC FACILITIES

Pittsburg Civic Center

The Pittsburg Civic Center includes the City Hall, government offices, the Pittsburg Superior Court Courthouse, PPD, the Pittsburg Library, and PUSD offices. The Pittsburg Civic Center is located on 65 Civic Avenue, approximately one mile northeast of the Plan Area.

Library System

The 10,000-square-foot Vincent A. Davi Memorial Library is the Pittsburg Branch Library of the Contra Costa County Library system. Known as the Pittsburg Library, it is located at 80 Power Avenue, adjacent to the Civic Center. While Pittsburg Library is owned by the City, it is operated by

Contra Costa County Library, with supplemental funding from the City. Pittsburg Library offers a variety of programming for all ages particularly children and teens. In order to meet the needs of City's large Spanish speaking community, Pittsburg Library houses adult and children's Spanish language materials, and bilingual staff are on hand. Besides providing a variety of materials in a variety of formats, the Pittsburg Library is home to a large cookbook collection due to an endowment from the Vincent A. Davi family. Access to the internet is also available. The Pittsburg Library Community Meeting Room managed and maintained by the City is also available for rent.

Pittsburg Community Center

The Pittsburg Community Center (Senior Center) is located on the southwest corner of E. Leland and Harbor Street, directly across from Small World Park and next to Stoneman Village, approximately one mile east of Plan Area. This 10,500square-foot facility houses many activities for seniors, such as wellness services, arts and crafts, and local and regional excursions. The Senior Center has rental spaces available for daily and hourly rentals with a capacity up to 506 people.

Marina Community Center

The Marina Community Center gymnasium hosts a variety of open gym and drop-in sports. The Marina Community Center includes areas for indoor pickleball, basketball, volleyball, fun fitness, and other events. All open gym and drop-in sports are held at the Marina Community Center gymnasium, located at 340 Marina Boulevard, approximately two miles northeast of Plan Area.

3.12.2 REGULATORY SETTING

FEDERAL

There are no Federal regulations applicable to the environmental topics of public services and recreation.

STATE

California Fire Protection Code

The California Fire Code contains regulations relating to construction and maintenance of buildings and the use of premises. Topics addressed in the California Fire Code include fire department access, fire hydrants, automatic sprinkler systems, fire alarm systems, fire and explosion hazards safety, hazardous materials storage and use, provisions to protect and assist first responders, industrial processes, and many other general and specialized fire safety requirements for new existing buildings and premises.

The California Fire Code contains regulations consistent with nationally recognized and accepted practices for safeguarding life and property from the hazards of:

- Fire and explosion.
- Dangerous conditions arising from the storage, handling, and use of hazardous materials and devices.

- Hazardous conditions in the use or occupancy of buildings or premises.

The California Fire Code also contains provisions to assist emergency response personnel. These fire-safety-related building standards are referenced in other parts of Title 24. The California Fire Code is a fully integrated code based on the 2021 International Fire Code. Topics addressed in the California Fire Code include fire department access, fire hydrants, automatic sprinkler systems, fire alarm systems, fire and explosion hazards safety, hazardous materials storage and use, provisions intended to protect and assist fire responders, industrial processes, and many other general and specialized fire-safety requirements for new and existing buildings and the surrounding premises. The California Fire Code contains specialized technical regulations related to fire and life safety.

California Health and Safety Code

State fire regulations are set forth in Sections 13000 et seq. of the California Health and Safety Code. This includes regulations for building standards (as also set forth in the California Building Code), fire protection and notification systems, fire protection devices such as extinguishers and smoke alarms, high-rise building and childcare facility standards, and fire suppression training.

California Code of Regulations

The California Code of Regulations (CCR) Chapter 4.9, Payment of Fees, Charges, Dedications, or Other Requirements Against a Development Project, *Section 65995-65998 (h)* provides that the payment or satisfaction of a fee, charge, or other requirement levied or imposed pursuant to Section 17620 of the Education Code in the amount specified in Section 65995 and, if applicable, any amounts specified in Section 65995.5 or 65995.7 are hereby deemed to be full and complete mitigation of the impacts of any legislative or adjudicative act, or both, involving, but not limited to, the planning, use, or development of real property, or any change in governmental organization or reorganization as defined in Section 56021 or 56073, on the provision of adequate school facilities.

Leroy F. Greene School Facilities Act of 1998 (SB 50/Proposition 1A)

The “Leroy F. Greene School Facilities Act of 1998,” also known as Senate Bill (SB) 50 (Chapter 407, Statutes of 1998), governs a school district’s authority to levy school impact fees. This comprehensive legislation, together with the \$9.2 billion education bond act approved by the voters in November 1998 known as “Proposition 1A,” reformed methods of school construction financing in California. SB 50 instituted a new school facility program by which school districts can apply for State construction and modernization funds. It imposed limitations on the power of cities and counties to require mitigation of school facilities impacts as a condition of approving new development and provided the authority for school districts to levy fees at three different levels:

- Level I fees are the current statutory fees allowed under Education Code 17620. This code section provides the basic authority for school districts to levy a fee against residential and commercial construction for the purpose of funding school construction or reconstruction of facilities. These fees vary by district for residential construction and commercial construction and are increased biannually.

- Level II fees are outlined in Government Code Section 65995.5, allowing school districts to impose a higher fee on residential construction if certain conditions are met. These conditions include having a substantial percentage of students on multi-track year-round scheduling, having an assumed debt equal to 15 to 30 percent of the district's bonding capacity (percentage is based on revenue sources for repayment), having at least 20 percent of the district's teaching stations housed in relocatable classrooms, and having placed a local bond on the ballot in the past four years which received at least 50 percent plus one of the votes cast. A Facility Needs Assessment must demonstrate the need for new school facilities for unhoused pupils is attributable to projected enrollment growth from the construction of new residential units over the next five years.
- Level III fees are outlined in Government Code Section 65995.7. If state funding becomes unavailable, this code section authorizes a school district that has been approved to collect Level II fees to collect a higher fee on residential construction. This fee is equal to twice the amount of Level II fees. However, if a district eventually receives state funding, this excess fee may be reimbursed to the developers or subtracted from the amount of state funding.

LOCAL

Contra Costa County Hazard Mitigation Plan

The Contra Costa County Hazard Mitigation Plan (2018) serves as its local hazard mitigation plan and fully addresses the requirements of Government Code section 65302(g)(4). The Contra Costa County Hazard Mitigation Plan incorporates a process where hazards are identified and profiled, the people and facilities at risk are analyzed, and mitigation actions are developed to reduce or eliminate hazard risk. The implementation of these mitigation actions, which include both short- and long-term strategies, involves planning, policy changes, programs, projects, and other activities. The plan covers the unincorporated county, 25 special purpose districts, and 10 municipalities, including the City of Pittsburg.

City of Pittsburg Hazard Mitigation Plan

The City of Pittsburg Hazard Mitigation Plan (HMP) was prepared in order to assess the natural, technological, and human-caused risks to Pittsburg so as to reduce the potential impact of the hazards by creating mitigation strategies. The HMP was updated in 2022. The 2022 HMP represents the City of Pittsburg's commitment to create a safer, more resilient, community by taking actions to reduce risk and by committing resources to lessen the effects of hazards on the people and property of Pittsburg. The HMP complies with the Federal Disaster Mitigation Act (2000), Federal Register 44 CFR Parts 201 and 206. The Pittsburg City Manager's Office and Police Department has coordinated preparation of the HMP in cooperation with other Pittsburg departments, community stakeholders, partner agencies, and members of the public. The HMP addresses hazards and risks associated with releases of hazardous materials, including incidents associated with refineries and chemical plants and establishes a Mitigation Action Plan to reduce risks and inform the City's response to disasters.

The HMP complies with the Federal Disaster Mitigation Act (2000), Federal Register 44 CFR Parts 201 and 206, which modified the Robert T. Stafford Disaster Relief and Emergency Assistance Act by adding a new section, 322 - Mitigation Planning. This law, as of November 1, 2004, requires local governments to develop and submit hazard mitigation plans as a condition of receiving Hazard Mitigation Grant Program (HMGP) and other mitigation project grants. The Pittsburg City Manager's Office and Police Department has coordinated preparation of the HMP in cooperation with other Pittsburg departments, community stakeholders, partner agencies, and members of the public.

City of Pittsburg 2040 General Plan

The City's current General Plan was last comprehensively updated in 2024. The General Plan contains several policies and actions applicable to the proposed Specific Plan, including:

Safety & Resiliency

Policy 11-P-1.8: Ensure that all areas of the city are accessible to emergency response providers. Keep emergency access routes free of traffic impediments.

Policy 11-P-1.10: Require development to provide additional access roads when necessary to provide for safe access of emergency equipment and civilian evacuation concurrently.

Action 11-A-1.c: Improve local evacuation capacity through maintaining City roadways, emergency access, and evacuation routes, and provide signage to clearly identify emergency access and evacuation routes.

Community Facilities

Policy 12-P-5.5: Through the development review process, use physical site planning as an effective means of preventing or reducing crime, ensuring that open spaces, landscaping, parking lots, parks, play areas, and other public spaces be designed with maximum feasible visual and aural exposure to community residents.

Policy 12-P-6.2: Require adequate road widths, turnarounds, and emergency access development projects for fire response trucks.

Policy 12-P-6.3: Require development in areas of high fire hazard to be designed and constructed to minimize potential losses and maximize the ability of fire personnel to suppress fire incidents.

Policy 12-P-6.4: Require existing and new development in or adjacent to high and very high fire hazard severity zones, wildland urban interface zones, and State Responsibility Areas to maintain defensible space zones, landscape using native, fire-resistant plants and fire-resistant materials, abate weeds, and, where feasible, harden structures and infrastructure against fires.

Action 12-A-6.b: Continue to enforce the California Building Code and the California Fire Code, with amendments to address local conditions, to ensure that all construction and

development implements fire-safe techniques, including fire resistant materials, where required.

Recreation & Youth

Policy 9-P-1.4: Consider park accessibility, use and character as more valuable than size in the acquisition and development of new parks.

Policy 9-P-1.5: Maintain park and recreation facility standards for new development to serve both residents and employees, attainable through, in order of priority: 1) provision of fully developed parks, 2) dedication of parkland, or 3) payment of in-lieu fees dedicated to the provision of new park sites or enhancing existing facilities.

Policy 9-P-2.2: Development projects adjacent open space, shoreline, hillside, and other recreational areas shall provide public connections and linkages.

Policy 10-P-1.7: Provide, and encourage access to, public and private open space within urbanized parts of Pittsburgh, in order to provide for the recreational and public health needs of residents and provide visual contrast with the built environment.

Policy 10-P-1.8: Require development projects to maximize the potential for open space, visual experiences, and passive and active recreation.

Action 10-A-1.c: Require all new development to provide linkages to existing and planned open space that would logically be connected through the project.

City of Pittsburgh Municipal Code

Chapter 15.92 of the Pittsburgh Municipal Code (PMC) Community Facility Fees – Fire Protection Facilities. The PMC provides a method for financing fire protection facilities. PMC Section 15.92.050 states that a fire protection facilities fee shall be paid as a condition precedent to the issuance of a building permit for new construction. The fee shall be in the amount established by the Pittsburgh City Council at the time of permit issuance.

Chapter 17.32 PMC - Other Public Facilities. As a condition of approval of a tentative map, the subdivider may be required to dedicate land, pay fees, or both, for fire stations, library sites, child day care, public art, or any other public facilities pursuant to, and in order to implement, the provisions of the 2040 General Plan regarding such facilities.

3.12.3 THRESHOLDS OF SIGNIFICANCE

Consistent with Appendix G of the CEQA Guidelines, the proposed project will have a significant impact on public services and recreation if it would result in:

- Substantial adverse physical impacts associated with the provision of new or physically altered governmental facilities, need for new or physically altered governmental facilities, the construction of which could cause significant environmental impacts, in order to

maintain acceptable service ratios, response times or other performance objectives for any of the public services:

- Fire Protection;
- Police Protection;
- Schools;
- Parks or other public facilities.
- An increase in the use of existing neighborhood and regional parks or other recreational facilities such that substantial physical deterioration of the facility would occur or require the construction or expansion of recreational facilities which might have an adverse physical effect on the environment.

3.12.4 IMPACTS AND MITIGATION MEASURES

Impact 3.12-1: Result in adverse physical impacts on the environment associated with the need for new fire protection facilities or the need for new or physically altered fire protection facilities, the construction of which could cause significant environmental impacts and the provision of public services (Less than Significant)

The Plan Area is located within the jurisdiction of the CCCFPD with three fire stations, one of which (Station 87) is located within two minutes of the Plan Area. Buildout of the proposed Plan Area would result in an increase of approximately 1,582 new employees and 1,108,858 square feet of development. Based on additional employees and development within the City, buildout of the Plan Area would increase the demand for existing fire and emergency services.

An increase in demand for fire and emergency services would be addressed through payment of the CCCFPD impact fees per Chapter 15.92 PMC. The fire facility impact fee for the CCCFPD is specifically designated to proportionally cover any costs associated with additional equipment and/or personnel needed to serve new development projects within the CCCFPD service area. In addition to the fire facility impact fee, the proposed Specific Plan includes requirements regarding fire resistant landscaping and emergency access, which would reduce the potential for future development to increase fire service demands.

Furthermore, the proposed Specific Plan does not directly propose the construction of or necessitate the construction of new fire protection facilities, which could result in significant impacts to the environment. As population growth occurs in the City and the need for new facilities are identified, any future construction of fire protection facilities would be subject to a separate environmental review at the time design plans are available.

Thus, while buildout of the Plan Area would increase the demand on existing fire and emergency services, payment of the fire facility impact fee and compliance with applicable regulations and policies in the proposed Specific Plan would ensure that buildout of Plan Area would not result in significant impact on fire and emergency services. Additionally, the proposed project does not

propose constructing nor necessitate the construction of new fire protection facilities. Therefore, impacts would be **less than significant**, and no mitigation is required. For information regarding wildfire threats refer to Section 3.15, *Wildfires*.

Impact 3.12-2: Result in adverse physical impacts on the environment associated with the need for new police protection facilities or the need for new or physically altered police protection facilities, the construction of which could cause significant environmental impacts and the provision of public services (Less than Significant)

The increase in development and employees within the Plan Area would increase call volumes and needs for police department staffing and equipment. The proposed Specific Plan includes policies to ensure police service response times can be met and that there will be an ongoing collaboration across appropriate local, state, and federal law enforcement agencies and private security providers to help reduce crime and promote public safety. The proposed Specific Plan also provides guidelines for safety and crime prevention elements such as security fencing, guard houses, and security fencing along the perimeter of each development project. Future development would be required to comply with the City's development review process, which allows the City's Police Department to review and provide potential redesign to incorporate crime prevent design elements.

The proposed Specific Plan does not directly propose or necessitate the construction of new police protection facilities, which could result in significant impacts to the environment. As population growth occurs in the City and the need for new facilities is identified, any future construction of police facilities would be subject to a separate environmental review at the time design plans are available. Thus, while buildout of the Plan Area would increase the demand for police services, new development would require annexation into the City-wide Police Community Facilities District and future development projects would be required to pay their fair share of the cost for additional police protection staffing and equipment. Therefore, implementation of the proposed Specific Plan would result in a **less than significant** impact, and no mitigation is required.

Impact 3.12-3: Result in adverse physical impacts on the environment associated with the need for new school facilities or the need for new or physically altered school facilities, the construction of which could cause significant environmental impacts and the provision of public services (Less than Significant)

The City is served by three school districts and three public schools serve the Plan Area, including Rancho Medanos Junior Highschool, Heights Elementary, and Los Medanos Elementary. Buildout of the Plan Area would result in an increase of approximately 1,582 new employees within the Plan Area. This increase in employment could cause a number of new families to relocate, potentially increasing enrollment within the City's school districts. However, it is anticipated that most employees would be existing residents in local or neighboring communities and would not require relocating to the City's school districts. For more information on population and housing, please refer to Section 3.11 of this PEIR.

School funding comes predominantly from federal, state, and local sources such as businesses and personal income taxes, sales tax, and property taxes. Pursuant to Proposition 1A/Senate Bill 50 and California Education Code Section 17620 et seq., school districts can impose development fees to fund new school facilities necessary to accommodate growth associated with new development. School development fees are applicable to new commercial and industrial construction and require project applicants to pay the necessary impact fees at the time of building permit issuance. Payment of required school impact fees is considered full and complete mitigation for potential increases in demand for school services and facilities resulting from development.

Furthermore, the proposed Specific Plan does not directly propose or necessitate the construction of new school facilities, which could result in significant impacts to the environment. As population growth occurs in the City and the need for new facilities are identified, any future construction of such facilities would be subject to a separate environmental review. Therefore, while buildout of the Plan Area could increase enrollment in the City's school district, payment of school impact fees would be sufficient to reduce potential impacts to a **less than significant** impact, and no mitigation is required.

Impact 3.12-4: Result in adverse physical impacts on the environment associated with the need for new park facilities or the need for new or physically altered park facilities, the construction of which could cause significant environmental impacts and the provision of public services (Less than Significant)

The City manages and maintains 30 public park facilities totaling approximately 150 acres. The closest park facilities to the Plan Area are the John Henry Johnson Park and Stoneman Trailhead Park, which are both within a mile of the Plan Area. As previously stated, it is anticipated that the majority of project employees would be existing residents living in local and neighboring communities and regions (refer to Section 3.11, *Population and Housing*). Therefore, the introduction of new employees to the Plan Area is not anticipated to substantially increase the population in the City. Furthermore, while it is anticipated that use of parks, trails, and recreation facilities located in close proximity to the Plan Area could increase, this increase is not anticipated to be measurable or significant.

An increase in demand for park facilities would be addressed through payment of public facility impact fees per Chapter 17.32 PMC. These fees are specifically designed pursuant to, and in order to implement the provisions of the 2040 General Plan regarding such facilities.

To further minimize potential impacts on existing facilities, the proposed Specific Plan identifies landscape design guidelines for future development that will serve as an initiative to cultivate a vibrant and inviting environment for its future employees. Landscape design would not only enhance the overall appeal of the Plan Area, but it would also encourage future employees of the Plan Area to rely on green spaces within the Plan Area for passive use.

For the reasons stated above, buildout of the Plan Area would not require the need for new or physically altered parks, trails, and/or recreational facilities. Therefore, the proposed project would result in a **less than significant** impact, and no mitigation is required.

Impact 3.12-5: Increase the use of existing parks and recreation facilities such that substantial physical deterioration of the facility would occur or require the construction or expansion of recreational facilities which might have an adverse physical effect on the environment (Less than Significant)

As previously stated, future buildout of the Plan Area is not anticipated to substantially increase the population of the City (refer to Section 3.11, *Population and Housing*). Additionally, it is not anticipated that the increase in employees within Plan Area would deteriorate existing parks or recreation facilities, such that construction of new parks and recreational facilities would be required. Any increase in use as a result of buildout of the Plan Area is not anticipated to be significant or measurable.

Additionally, the proposed Specific Plan does not directly propose or necessitate the construction of new park facilities, which could result in significant impacts to the environment. As population growth occurs in the City and the need for new facilities are identified, any future construction of such facilities would be subject to a separate environmental review. Therefore, impacts are anticipated to be **less than significant**, and no mitigation is required.

This section of the Program Environmental Impact Report (PEIR) describes the potential impacts on the multi-modal circulation system associated within the Pittsburg Technology Park Specific Plan (proposed Specific Plan; project) Plan Area (Plan Area). The impact analysis examines the vehicular, transit, bicycle, and pedestrian components of the Plan Area's circulation system. To provide context for the impact analysis, an overview of the circulation network's setting, with descriptions of each transportation mode, is presented first. Following the existing setting, an overview of the regulatory framework influencing the transportation system, is presented. The section concludes with the impact analysis findings and recommended mitigation measures.

With the implementation of Senate Bill (SB) 743, local agencies may no longer rely on vehicular delay or capacity-based analyses for California Environmental Quality Act (CEQA) impact determination. Instead, agencies must analyze transportation impacts utilizing vehicle miles traveled (VMT), a measure of the total distance traveled by vehicles for trips beginning or ending in the Plan Area on a typical weekday. VMT impacts are calculated and assessed using an efficiency metric (for example, VMT per household for residential projects or per employee for commercial projects). This is a change from the prior method of analyzing transportation impacts, which measured level of service (LOS) at intersections and roadway segments, using grades from LOS A to LOS F. While SB 743 does not allow LOS to be used to measure transportation impacts under CEQA, it may still be included in goals and policies in a local agency's general plan.

3.13.1 EXISTING SETTING

The City of Pittsburg (City) is located in the San Francisco Bay Area in the eastern half of Contra Costa County. The circulation system serving Pittsburg is comprised of the roadway system, public transportation, and alternative modes of transportation, including bicycling and walking. Several routes of regional significance provide access to the City: State Route (SR) 4, Pittsburg-Antioch Highway, Kirker Pass Road, Bailey Road, Leland Road, and Willow Pass Road. SR 4, which runs east-west and bisects the City, connects Highway 160 in East Antioch, Highway 242 and Interstate 680 (I-680) in Concord, and Interstate 80 (I-80) in Hercules. A system of surface streets collects and distributes traffic to and from the highway and regional routes, and between the commercial, industrial, and residential areas of the City.

The Plan Area is located south of SR 4 and is bisected by the Contra Costa Canal. The northern portion of the site is 22.05 acres and the area south of the canal is 54.33 acres. As shown in Figure 3.13-1, existing regional roadways near in the Plan Area include SR 4 (north of Plan Area), Bailey Road (west of Plan Area), and Railroad Avenue (east of Plan Area). Local roads in the vicinity include West Leland Road and Range Road/Golf Club Road. Transit services provided by the Eastern Contra Costa Transit Authority (Tri Delta Transit) operates routes in the vicinity of the Plan Area, including bus routes that serve the regional Bay Area Rapid Transit (BART) light rail system. Bicycle and pedestrian facilities in the vicinity of the Plan Area include Class II bicycle facilities, sidewalks, crosswalks, pedestrian signals, and multi-use trails.

ROADWAY SYSTEM

Existing Roadways

This section describes the physical characteristics of City's existing roadway network and the transportation connections to the Plan Area. The circulation system in the vicinity of the Plan Area is made up of a combination of state, county, and private jurisdictional facilities. Major components of the system are discussed below.

STATE HIGHWAYS

One highway that is operated and maintained by California Department of Transportation (Caltrans) passes through the City: SR 4. SR 4 is an eight-lane freeway running east-west through the City and is located approximately 0.37 miles north of the Plan Area. SR 4 has interchanges near the Plan Area at Bailey Road and Railroad Avenue.

ARTERIALS

Arterial streets are designed to serve through traffic and major local traffic generators such as residential, commercial, industrial, and institutional uses. The closest north-south arterial to the Plan Area is Railroad Avenue at approximately 1 mile east of the Plan Area, which bisects the City of Pittsburg from East 3rd Street in the downtown area to its intersection with Buchanan Road and Kirker Pass Road. Railroad Avenue is two lanes wide from East 3rd Street to East 10th Street and four lanes wide from East 10th Street to its intersection with Buchanan Road and Kirker Pass Road. The road serves a variety of land uses, including single-family and multi-family residential land uses, downtown commercial and strip mall developments, and government facilities such as the Pittsburg Police Department, the Pittsburg Unified School District, and the Pittsburg Superior Court. Railroad Avenue has an interchange with SR 4. BART's Pittsburg Center Station is accessible via Railroad Avenue.

West Leland Road is the closest east-west arterial to the Plan Area; located approximately 300-feet north of the Plan Area. West Leland Road is a four-lane road that extends from its intersection with Santa Teresa Drive to its intersection with Railroad Avenue. The road is a major east-west thoroughfare for the City south of SR 4 and serves many residential and commercial developments. West Leland Road is designated as a Route of Regional Significance in CCTA's *East County Action Plan for Routes of Regional Significance*. It is an east-west major arterial with two travel lanes in each direction and a center left turn lane. Sidewalks with no buffers and Class II bicycle lanes are provided on both sides of West Leland Road. The posted speed limit is generally 40 mph. However, Rancho Medanos Junior High School is located just north of the project site and the posted speed limit on West Leland Road east of the Golf Club Road/West Leland Road intersection is 25 mph when children are present. West Leland Road serves residential communities and commercial and industrial businesses located in the area. West Leland Road is a designated truck route and approximately two percent of daily traffic is trucks. The roadway carries roughly 1,800 vehicles in the peak hour of travel and 18,000 vehicles per day.

Bailey Road is designated as a Route of Regional Significance in CCTA's *East County Action Plan for Routes of Regional Significance*. It is designated as a major arterial with two travel lanes in each direction and left turning median lanes north of West Leland Road. South of West Leland Road the facility narrows to one lane in each direction. The posted speed limit is 30 miles per hour in the study area. Bailey Road is a

designated truck route and approximately three percent of daily traffic is trucks. The roadway carries roughly 2,100 vehicles in the peak hour of travel and 21,000 vehicles per day.

Golf Club/Range Road directly serves the Plan Area and primarily serves the surrounding residential communities. It is a north-south local road with two travel lanes in each direction north of West Leland Road and one lane in each direction to the south. Golf Club Road transitions into Range Road north of West Leland. The posted speed limit is 25 miles per hour on Golf Club Road and transitions to a greater speed of 35 miles per hour on Range Road. Range Road north of West Leland Road carries approximately 4,000 vehicles per day and 400 vehicles during peak hours of travel.

Planned Roadways

There are five planned roadway extensions highlighted in the 2040 General Plan that could affect travel within the Plan Area. While they are planned, the funding has not been identified for any of the potential roadway extensions. The preliminary design phase nor the environmental review has been initiated, and the feasibility of implementation is currently unknown. The roadway improvements include:

- **Buchanan Bypass** – This facility would be a four-lane extension of James Donlon Boulevard from its current terminus west of Somersville Road to Kirker Pass Road.
- **Range Road Extension** – This improvement would link the currently discontinuous portions of Range Road by building a grade-separated connection of State Route 4.
- **New North/South Arterial Roadway** – The General Plan's Circulation Element includes a new four-lane major arterial linking North Parkside Drive and West Leland Road just east of Golf Club Road.
- **Avila Road Extension** – This improvement would link West Leland Road with Willow Pass Road via an improvement and connection to Avila Road, just south of State Route 4.
- **San Marco Boulevard Extension** – This improvement would extend San Marco Boulevard from its current southern terminus southerly to connect with Bailey Road.

3.13 TRANSPORTATION AND CIRCULATION

FIGURE 3.13-1. PLAN AREA EXISTING CIRCULATION SYSTEM



EXISTING PUBLIC TRANSPORTATION SYSTEM

Pittsburg is well connected to the Bay Area with the regional and local public transportation system. Following the opening of the Pittsburg Center BART Station as part of the Antioch extension (formerly known as “eBART”), there has been an increase in the number of transit riders. Tri-Delta Transit, County Connection, and BART provide local and regional connectivity from the City. In addition, Altamont Corridor Express (ACE), Greyhound, and Amtrak are operated in and around Pittsburg.

Bay Area Rapid Transit (BART) Rail Service

The Pittsburg/Bay Point BART station initially opened in 1996 and includes a surface parking lot with 2,000 parking spaces and a five-acre area set aside for bus, passenger loading/unloading, and short-term parking. The station is served by standard BART trains operating on 15-minute weekday frequencies between San Francisco International Airport and Pittsburgh/Bay Point. The station is located approximately 1.3 miles west of the Plan Area, with paratransit available via Bailey Road (see Figure 3.13-2).

In May 2018, service was extended 10 miles to the east of the Pittsburg/Bay Point station to Antioch via the SR-4 median using state-of-the-art Diesel Multiple Unit (DMU) vehicles. The eBART extension includes service to the Pittsburg Center station adjacent to Railroad Avenue. The centrally located Pittsburg Center station is more readily accessible via non-automobile modes and provides a smaller supply of 262 motor vehicle spaces nearby.

Following the opening of the Antioch station, the Pittsburg/Bay Point station now serves an average of approximately 100,000 monthly entries and 100,000 monthly exits, which correlates to approximately 8,000 average weekday riders (4,000 entries and 4,000 exits). The Pittsburg Center station serves an additional 2,400 average weekday riders. The 109-mile BART system currently serves an average of over 10 million monthly riders, averaging 410,000 weekday riders.

As shown in Figure 3.13-2, two bus routes operate in the vicinity of the Plan Area and provide linkage to the Pittsburg/Bay Point and Antioch BART stations. These include:

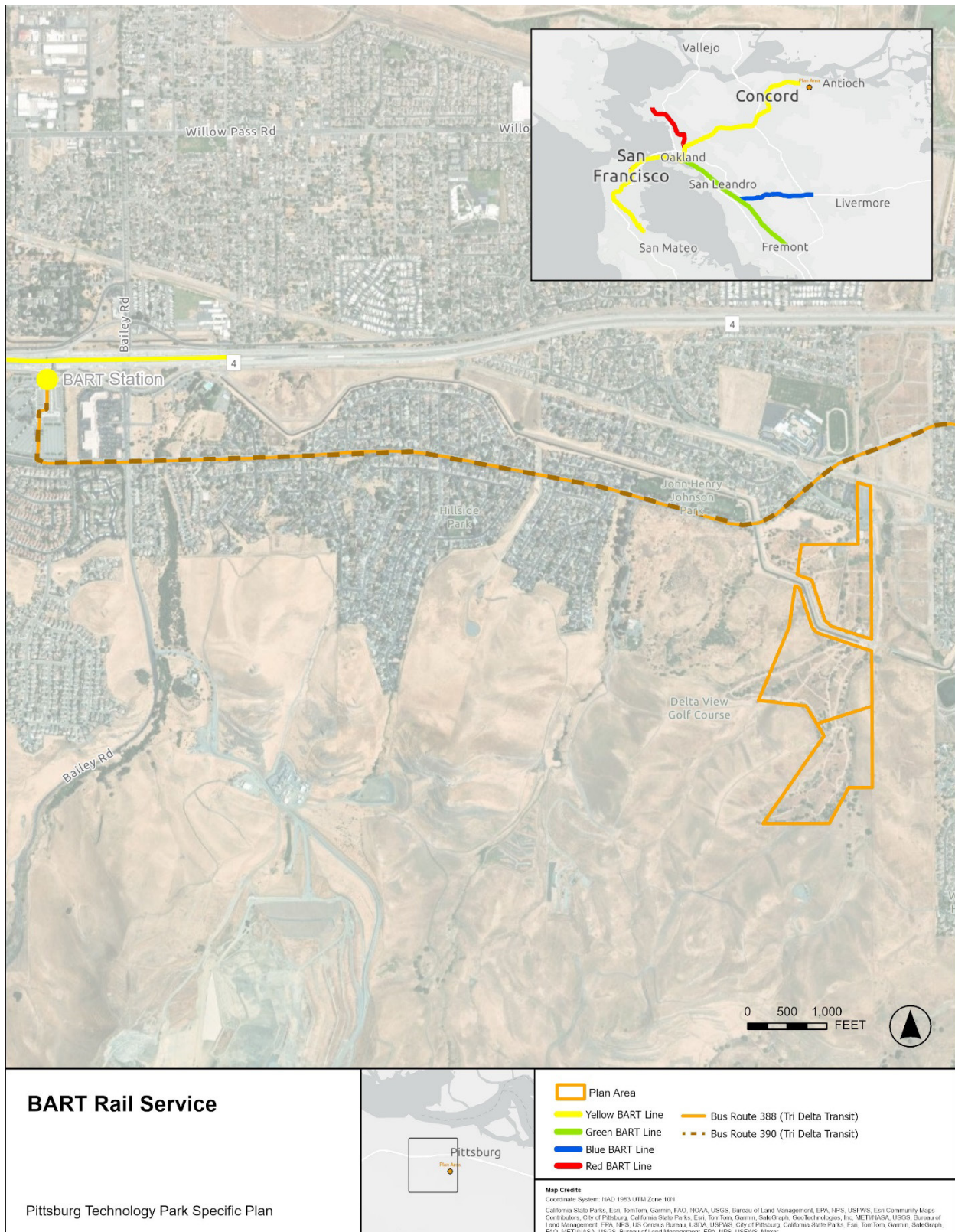
- Route 388 – Pittsburg-Bay Point BART/Kaiser Antioch Medical Center (Weekdays only)
- Route 390- Antioch BART/Pittsburg-Bay point BART (Weekdays only/commute hours)

Both Routes 388 and 390 operate along West Leland Road and serve the existing bus stops at Golf Club Road. The routes provide connections to other Tri Delta routes at the Pittsburg Transit Center, Pittsburg/Bay Point BART Station, and Antioch BART station. The bus stops are located at the crossroads of West Leland Road and Golf Club Road, and West Leland Road and Range Road, both approximately 400 feet and 700 feet west of the Plan Area, respectively. The Pittsburg-Bay Point BART Transfer Substation is the closest rail station to the Plan Area at approximately 1.3 miles west.

In addition to the regular transit service in the study area, dial-a-ride door-to-door service within Eastern Contra Costa County is provided by Tri Delta Transit for disabled people of all ages and senior citizens.

3.13 TRANSPORTATION AND CIRCULATION

FIGURE 3.13-2. BAY AREA RAPID TRANSIT RAIL SERVICE



EXISTING BICYCLE AND PEDESTRIAN SYSTEM

The bicycle and pedestrian system surrounding the Plan Area includes bike paths, bike lanes, bike routes, and sidewalks with crosswalks. Below is a description of nearby bicycle and pedestrian facilities near the Plan Area.

Class I Bikeways (Bike Paths) are paved facilities that are physically separated from roadways used by motor vehicles by space or a barrier and are designated for bicycle use (Caltrans Class I facility). The nearest Class I Bike Path in the Plan Area vicinity runs along the Via Delta de Anza Trail that runs east-west through the length of the City and connects at Bailey Road (see Figure 3.13-3). There are disjointed Class I Bikeways north of the Plan Area near SR-4 with proposed Class I bike paths through the Plan Area from east-west.

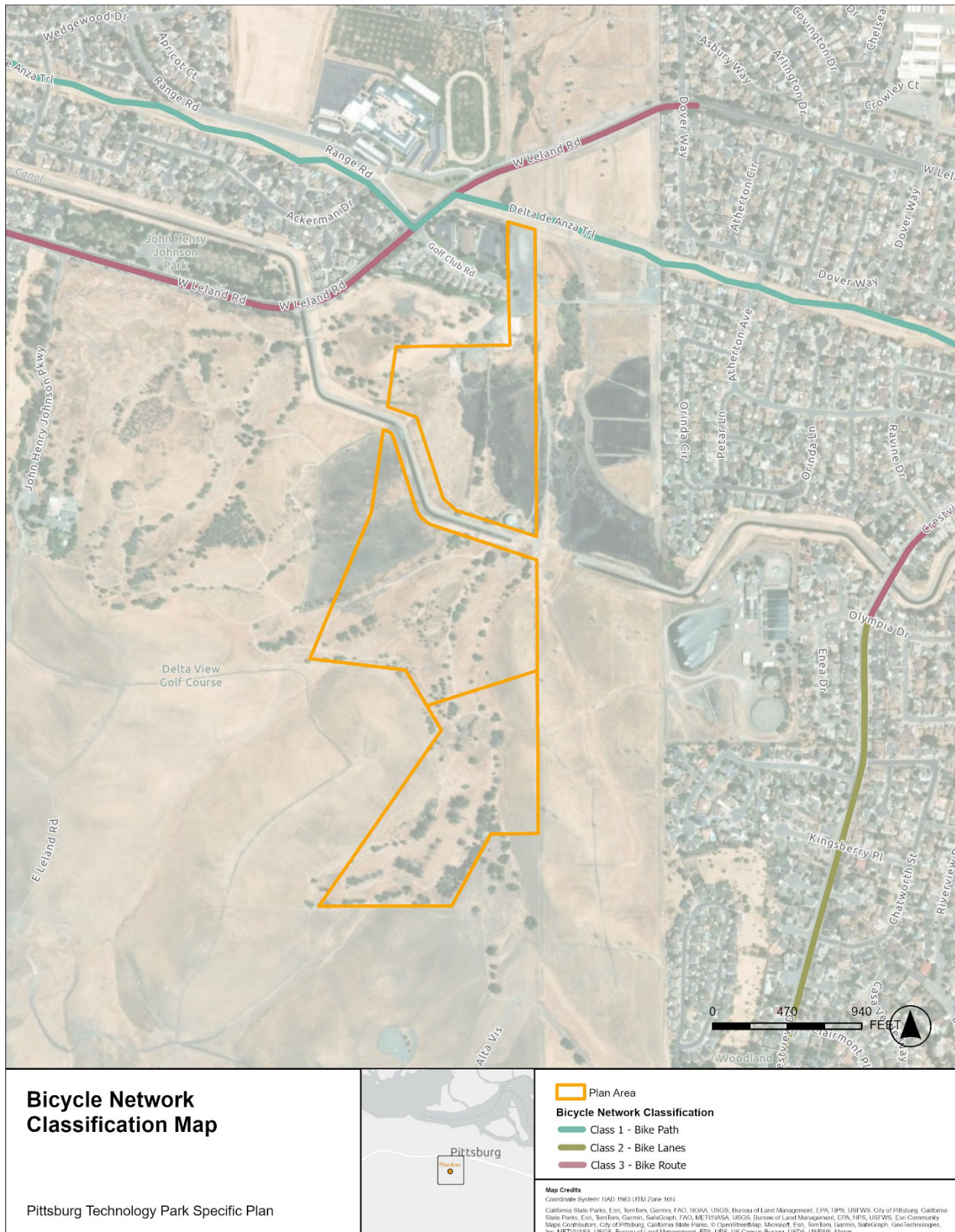
Class II Bikeways (Bike Lanes) are lanes on the outside edge of roadways reserved for the exclusive use of bicycles. Bike lanes are designated with special signage and pavement markings (Caltrans Class II facility). The nearest Class II Bikeways are located along both sides of West Leland Road and Range Road for east-west connection and along Crestview Drive that runs north and south in the residential area to the east of the Plan Area (see Figure 3.13-3).

Class III Bikeways (Bike Routes) are roadways recommended for use by bicycles and often connect roadways with bike lanes and bike paths. Bike routes are designated with signs only (Caltrans Class III facility). The nearest Bike Route is located at West Leland Road at Crestview Drive to Railroad Avenue (see Figure 3.13-3).

Pedestrian facilities near the Plan Area include sidewalks, crosswalks, pedestrian signals, and multi-use trails. Five- to eight-foot sidewalks are provided along both sides of West Leland Road and Golf Club Road. Crosswalks and pedestrian push-button actuated signals are located at signalized intersections within the Plan Area.

3.13 TRANSPORTATION AND CIRCULATION

FIGURE 3.13-3. BICYCLE NETWORK CLASSIFICATIONS



GOODS MOVEMENT

Goods movement in the City of Pittsburg and the Plan Area is accomplished by truck and rail.

Truck Routes

In the study area, West Leland Road, Bailey Road, and Railroad Avenue are all designated as truck routes by the City of Pittsburg and have been designed to accommodate heavy vehicles. Trucks traveling to and from the project site can use these roadways to access State Route 4 via either the Bailey Road or Railroad Avenue interchanges. Trucks may also use Bailey Road or Kirker Pass Road to the south for trip origins or destinations in that direction. According to the City of Pittsburg Truck Route Map, shown on Figure 3.13-4, the following streets are designated as a Route of Regional Significance the Plan Area vicinity:

Bailey Road

Bailey Road is designated by the City as a truck route and a Route of Regional Significance in Contra Costa County Transportation Authority's *East County Action Plan for Routes of Regional Significance*. Approximately three percent of daily traffic is generated from trucks. The roadway carries roughly 2,100 vehicles in the peak hour of travel and 21,000 vehicles per day.

Railroad Avenue

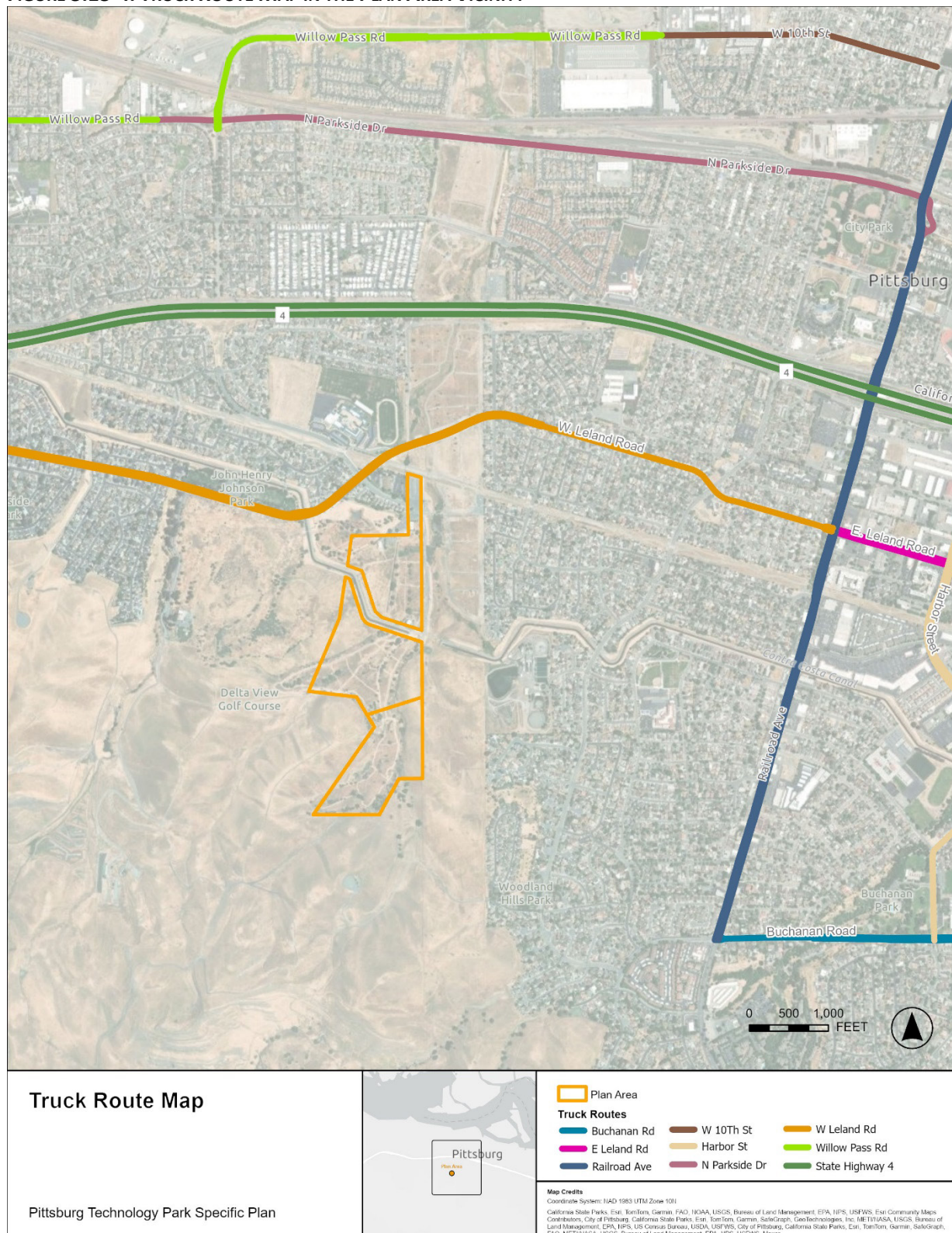
Railroad Avenue is designated by the City as a truck route and a Route of Regional Significance in Contra Costa County Transportation Authority's *East County Action Plan for Routes of Regional Significance*. Approximately four percent of daily traffic is generated from trucks. The roadway carries roughly 2,300 vehicles in the peak hour of travel and 23,000 vehicles per day.

West Leland Road

West Leland Road is designated by the City as a truck route and a Route of Regional Significance in Contra Costa County Transportation Authority's *East County Action Plan for Routes of Regional Significance*. Approximately two percent of daily traffic is generated from trucks. The roadway carries roughly 1,800 vehicles in the peak hour of travel and 18,000 vehicles per day.

3.13 TRANSPORTATION AND CIRCULATION

FIGURE 3.13-4. TRUCK ROUTE MAP IN THE PLAN AREA VICINITY



Railroad Network

Goods movement in Pittsburg and the region is supported by the Union Pacific (UP) Railroad and the Burlington Northern Santa Fe (BNSF) Railroad. Within the City limits, at-grade railroad crossings exist on Loveridge Road.

3.13.2 REGULATORY SETTING

While the City of Pittsburg has primary responsibility for the maintenance and operation of transportation facilities within the City, Pittsburg staff work continually with responsible regional, state, and federal agencies, including the County of Contra Costa, the Metropolitan Transportation Commission (MTC), Association of Bay Area Governments (ABAG), Contra Costa Transportation Authority (CCTA), the California Department of Transportation (Caltrans), the Federal Highway Administration (FHWA), and others, to maintain, improve, and balance the multi-modal transportation needs of the community and the region.

FEDERAL

Americans with Disabilities Act

The Americans with Disabilities Act (ADA) of 1990 provides comprehensive rights and protections to individuals with disabilities. The goal of the ADA is to assure equality of opportunity, full participation, independent living, and economic self-sufficiency. To implement this goal, the United States Access Board has created accessibility guidelines for public rights-of-way. The guidelines address various issues, including roadway design practices, slope and terrain issues, pedestrian access to streets, sidewalks, curb ramps, street furnishings, pedestrian signals, parking, and other components of public rights-of-way.

STATE

Senate Bill (SB) 743

SB 743, passed in 2013, resulted in several statewide CEQA changes. It required the Governor's Office of Planning and Research (OPR) to establish new metrics for determining the significance of transportation impacts of projects within transit priority areas (TPAs) and allows OPR to extend the use of those metrics beyond TPAs. OPR selected vehicle miles traveled (VMT) as the preferred transportation impact metric and applied their discretion to require its use statewide.

In December 2018, the California Natural Resources Agency certified and adopted the CEQA Guidelines update package along with an updated Technical Advisory related to Evaluating Transportation Impacts in CEQA (December 2018). Full compliance with the guidelines is now required, and vehicle-delay based level of service calculations cannot be used to evaluate the environmental impacts of projects on the transportation system.

To help lead agencies with SB 743 implementation, the OPR produced the Technical Advisory on Evaluating Transportation Impacts in CEQA (Technical Advisory) that provides guidance about the variety of implementation questions they face with respect to shifting to a VMT metric. Although the absolute amount of VMT is typically reported, impact analysis is typically based on VMT expressed as an efficiency

metric. VMT efficiency metrics, such as VMT per resident, VMT per employee, or VMT per dwelling unit, allow the VMT performance of different-sized projects to be compared. Such metrics provide a measure of travel efficiency and help depict whether people are traveling by vehicle more or less over time, across different areas, or across different planning scenarios.

The OPR “Technical Advisory on Evaluating Transportation Impacts in CEQA” (December 2018) includes specifications for VMT methodology and recommendations for significance thresholds, screening of projects that may be presumed to have less than significant impacts, and mitigation.

The City currently follows the guidance and recommendations of OPR pertaining to the implementation of SB 743, as described below:

- Residential Projects should use the home-based VMT per capita metric to evaluate project generated VMT. The project generated home-based VMT per resident constitutes a significant impact if it is higher than 85 percent of the home-based VMT per resident of the existing countywide average.
- Employment-Generating Projects should use the home-work VMT per worker metric for project generated VMT estimates. The project generated home-work VMT per worker constitutes a significant impact if it is higher than 85% of the home-work VMT per worker of the existing countywide average.

LOCAL

MTC Regional Transportation Plan and Sustainable Community Strategy

The current Regional Transportation Plan and Sustainable Community Strategy (RTP/SCS) produced by MTC was adopted in 2021. The RTP/SCS sets forth regional transportation policy and provides capital program planning for all regional, state, and federally funded projects. The RTP/SCS demonstrates how land use development and transportation can work together to meet greenhouse gas emission reduction targets for cars and light trucks. The RTP can be considered the Bay Area’s “statement of priorities” for the future transportation system. The RTP/SCS “pinpoints policies and investments necessary to advance the goal of a more affordable, connected, diverse, healthy and vibrant Bay Area.” The RTP/SCS “neither funds specific infrastructure projects nor changes local policies” and allows “[c]ities and counties [to] retain all local land use authority.”

Contra Costa Transportation Authority

The Contra Costa Transportation Authority (CCTA) is tasked with planning, funding, and implementing transit programs within the Contra Costa region. On July 15, 2020, the CCTA adopted criteria, standards, and thresholds for the assessment of VMT (CCTA 2020). The methods and thresholds adopted by CCTA follow the guidance and recommendations of OPR pertaining to the implementation of SB 743.

As the designated Congestion Management Agency (CMA) representing the jurisdictions of Contra Costa County, the CCTA is responsible for preparing and adopting a Congestion Management Program (CMP) and updating it every other year. The 2021 proposed CMP network includes the following corridors in the City:

- SR 4,
- Railroad Avenue, and
- Kirker Pass Road.

CCTA East County Action Plan

The CCTA establishes Multimodal Transportation Service Objectives (MTSOs) and actions for achieving those objectives to roads designated as Routes of Regional Significance. The East County Action Plan designates roads with the following characteristics as Routes of Regional Significance:

- All portions of the Interstate and State highway systems, and
- Arterial roadways that serve one or more of the following functions:
 - Connects two or more “regions” of the County,
 - Crosses County boundaries,
 - Carries a significant amount of through traffic, or
 - Provides access to a regional highway or transit facility (e.g., a BART Station or freeway interchange)

The following roads in the City of Pittsburg are designated as Routes of Regional Significance:

- Bailey Road,
- Buchanan Road,
- East 10th Street/Harbor Street,
- Leland Road,
- Railroad Avenue/Kirker Pass Road,
- Somersville Road,
- SR 4, and
- Willow Pass Road.

The following MTSOs apply to the Routes of Regional Significance in the City of Pittsburg listed above with the exception of SR 4:

- Maintain LOS D or better at all signalized intersections, except:
 - On Bailey Road, where LOS E will be acceptable; or,
 - At Traffic Management Program (TMP) sites that use performance measures other than average intersection delay.
- Within Priority Development Areas, any physical improvement identified as a result of applying the above standard shall be evaluated for its effects on all intersection users, including pedestrians, cyclists, and transit users.

City of Pittsburgh Transportation Impact Analysis Guidelines (2024)

The City of Pittsburgh has drafted 2024 Transportation Impact Analysis Guidelines (TIA Guidelines). The TIA Guidelines establish general procedures and requirements for the preparation of transportation impact studies for development projects within the City of Pittsburgh. The guidelines are intended as a checklist for study preparers to be sure that all required study items are included. They establish a uniform approach, methodology, and tool set to evaluate the effects of land use decisions and related transportation projects on the city transportation system. The need for and final scope of a TIA shall be determined by the City of Pittsburgh. This is intended to be a “living document” and will be updated periodically to reflect newly acquired data and relevant policies. The primary objectives of these guidelines are to provide:

- Guidance in determining if and when a Transportation Impact Analysis is needed;
- Consistency and uniformity in the identification of transportation impacts of proposed land uses;
- An early guidance to establish assumptions, data requirements, study scenarios and analysis methodologies prior to beginning the TIA; and
- Early coordination during the planning phases of a project to facilitate the preparation of a TIA.

The guidelines are intended to ensure that a TIA will address the potential effects of a proposed development on the transportation system of the city, giving equal attention to all modes of travel, in accordance with the goals of the City of Pittsburgh’s General Plan. The TIA Guidelines provide guidance for both CEQA (VMT-based) and Non-CEQA (level of service or LOS-based) analyses. Each is described in more detail below.

CEQA ANALYSIS

The City’s TIA Guidelines provide guidelines for CEQA assessment of projects. The draft 2024 TIA Guidelines establish the following applicable VMT thresholds of significance, consistent with OPR guidance:

- **Office projects:** A project would cause substantial additional VMT if it exceeds the existing countywide VMT per employee minus 15 percent.

In addition to VMT thresholds, the Guidelines provide VMT screening criteria; VMT analysis and forecasting guidance for projects requiring a complete analysis; and a variety of potential VMT mitigation measures including trip reduction programs, parking or road pricing, and neighborhood design recommendations.

NON-CEQA ANALYSIS

SB 743 does not prevent a city from continuing to analyze delay or LOS outside of CEQA review for other transportation planning or analysis purposes (i.e., general plans, impact fee programs, corridor studies, congestion mitigation, or ongoing network monitoring); but these metrics may no longer constitute the sole basis for CEQA impacts. The City of Pittsburgh’s General Plan 2040 provides for the following policies relating to the calculation and assessment of intersection LOS:

- Levels of Service shall be calculated using the latest version of the Transportation Research Board’s Highway Capacity Manual available at the time the analysis is prepared.

- The City shall strive to maintain LOS D for motor vehicle traffic as the minimum acceptable service standard for all signalized and stop controlled intersections during peak periods. In the designated Downtown core, LOS E would be considered as an acceptable service standard to account for the more urban, pedestrian-oriented character of the area.

LOS can continue to be assessed relative to this standard during development review, to promote the City's interest in maintaining and operating a functional roadway network. However, assessment of a development project's effect on intersection level of service must be conducted outside the CEQA process. The assessment can be performed as part of a General Plan consistency assessment. City planning and traffic engineering staff will define the scope and methodology for project-level of service analysis as part of the development review process.

Pittsburg Moves Active Transportation Plan

The City adopted an active transportation plan, *Pittsburg Moves*, in 2021 that establishes the City's goals and objectives for a safe and comprehensive active transportation network to improve health, mobility, livability, economy, and environment. The plan envisions a safe walking and bicycling network that enhances safety, access, comfort, and convenience for everyone. Plan development was supported through public engagement and other activities including a walking and biking audit, Downtown Walking Tour, and Group Bike Ride. Goals and policies identify areas to improve the walking and bicycling network. Corridors within the network are organized into priority areas based on the corridors ability to reduce fatal and severe injuries, safety, and continuous and convenient access, and access to disadvantaged communities. A list of 290 improvement projects are identified to create a comprehensive active transportation network throughout the established priority corridors. The plan includes the following goals, actions, and policies related to transportation facilities:

Policy 5 (Goal 1): As part of design review, require bicycle amenities such as short- and long-term bicycle parking, bicycle repair stations, showers, and changing rooms with personal effects lockers when appropriate.

Policy 6 (Goal 1): Ensure that parking areas are designed to facilitate safe bicycle and pedestrian access between parking spaces, sidewalks, and building entrances.

Policy 8 (Goal 3): Ensure that maintenance and construction projects provide temporary traffic controls to accommodate the flow of bicyclists and pedestrians.

The plan also identifies bicycle and pedestrian improvements in the Plan Area vicinity. Bike improvements include a Class I Bike Path along Contra Costa Canal, and pedestrian improvements at West Leland Road and Golf Club Road to include crosswalk enhancements. The plan identifies the West Leland Road – East Leland Road Project as Priority Corridor number ten, of ten corridors.

City of Pittsburg 2040 General Plan

The City of Pittsburg recently released its 2040 General Plan along with the *Draft Environmental Impact Report* for the Pittsburg 2040 General Plan (2040 General Plan). The 2040 General Plan, along with regional, state, and federal plans, legislation, and policy directives, provide guidelines for the safe operation of streets and transportation facilities in Pittsburg. The Circulation Element of the 2040 General

3.13 TRANSPORTATION AND CIRCULATION

Plan provides the framework for decisions concerning the City's multimodal transportation system, which includes roadway, transit, bicycle, pedestrian, and rail modes of travel. The 2040 General Plan includes the following applicable policies as they relate to transportation facilities at or near the Plan Area:

Policy 7-P-1.1: Ensure that the City's circulation network is a well-connected system of streets, roads, highways, sidewalks, trails, and paths that effectively and safely accommodate all users in a manner that considers the context of surrounding land uses, the needs of all roadway users, and is maintained and improved over time to support buildout of the General Plan.

Policy 7-P-1.5: Implement and continue to increase efforts to reduce regional vehicle miles traveled (VMT) by supporting land use patterns and site designs that promote active modes of transportation, and public transit.

Policy 7-P-1.6: Design streets to operate with vehicle speeds that are safer for all users, especially pedestrians and bicyclists, while providing adequate access for emergency vehicles. Speed reductions strategies should include reduced lane widths and application of traffic calming measures on local and collector streets and especially near parks, schools, trails, and in the Downtown core.

Policy 7-P-1.7: Strive to maintain delay-based level of service (LOS) D for motor vehicle traffic as the minimum acceptable service standard for all signalized and stop-controlled intersections at all times (including during peak periods) unless maintenance of LOS D would, in the City's judgement, be infeasible and/or conflict with the achievement of other City goals identified in this General Plan. Congestion in excess of LOS D may be acceptable in these cases, provided that provisions are made to improve traffic flow and/or promote multimodal or non-vehicular transportation as part of a development project or City-initiated project. In the designated Downtown core, as defined by the City's General Plan and illustrated by the City's Subdivision map, LOS E would be considered as an acceptable service standard to account for the more urban, pedestrian-oriented character of the area.

Policy 7-P-1.9: Implement transportation improvements to maintain and enhance roadway operations and safety while striving to improve accessibility and comfort for all users.

Action 7-A-1.a: Evaluate projects traffic and Vehicle Miles Traveled (VMT) impacts of development projects based on the City's Transportation Impact Analysis Guidelines to determine transportation impacts to all users, including pedestrians, bicyclists, transit riders, and motorists, and to require projects to address impacts consistent with the requirements of CEQA.

Action 7-A-1.b: Require proposed development projects with VMT levels above the City's threshold to consider reasonable and feasible project modifications and other measures during the project design and review stage and the environmental review stage that would reduce VMT effects in a manner consistent with the City's sustainability goals, the City's Transportation Impact Analysis Guidelines, and with State guidance on VMT reduction.

Action 7-A-1.d: Require new development to pay its fair share of the costs of street and other transportation improvements in conformance with the goals and policies established in this Circulation Element and the Transportation Impact Mitigation Fee (TIMF) program.

Action 7-A-1.e: Use traffic calming tools and speed reduction strategies in new development and the design of roadway improvements to assist in implementing complete street principles and encouraging active transportation. Possible tools include roundabouts, raised intersections, curb extensions, reduced roadway width, high visibility crosswalks, and rapid flashing beacons.

Goal – 7-2: Coordinate with regional transportation agencies and developers to promote connectivity, manage commuter traffic, and promote the use of alternatives to single-occupant vehicle trips.

Policy 7-P-2.2: Encourage employers to provide programs for carpooling/transit/biking/walking subsidies, bicycle facilities, alternative work schedules, ridesharing, telecommuting, working at home, employee education, and preferential parking for carpools/vanpools.

Policy 7-P-2.4: Ensure that safe and continuous routes for pedestrians and bicyclists are provided within new development projects and on any roadways that are impacted as a result of new development.

Action 7-A-2.e: Preserve options for future transit use when designing improvements for roadways. Ensure that developers provide bus turnouts and/or shelters, where appropriate, as part of projects.

Action 7-A-2.f: Require new developments to provide public access and infrastructure, as appropriate, that support internal connectivity, multimodal transportation, and integration into the surrounding transportation networks.

Action 7-A-2.h: Require mitigation for development projects that increase transit demand above the service levels provided by public transit operators and agencies, or, create conflicts with existing transit operations.

Action 7-A-2.i: As part of development approval, ensure that safe and contiguous routes for pedestrians and bicyclists are provided within the development projects and on any roadways that are impacted as a result of new development.

Action 7-A-2.k: Encourage developers to provide enhanced TDM programs and alternative transportation infrastructure that exceeds minimum requirements, as per 7-A-2.j, in exchange for reduced parking requirements, with a focus on priority development areas and locations in proximity to high capacity transit.

Action 7-A-2.m: Encourage major employers to establish designated parking areas for carpools, electric vehicles, and clean air vehicles and secure on-site bicycle facilities. Encourage the provision of charging stations/outlets for electric vehicles.

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Action 7-A-2.o: Require development projects to provide or fund their fair-share of bicycle and pedestrian facilities improvements in order that sufficient facilities for pedestrians and bicyclists may be constructed throughout the City.

Goal – 7-3: Proactively support and encourage travel by non-automobile modes by maintaining and expanding safe and efficient pedestrian, bicycle, and transit networks.

Policy 7-P-3.4: Ensure continued compliance with Title 24 of the California Building Code, requiring the removal of all barriers to disabled persons on City streets, and compliance with the Americans with Disabilities Act (ADA) to allow mobility-impaired users such as the disabled and elderly to safely and effectively use the City’s circulation network..

Policy 7-P-3.5: Encourage secure bicycle facilities and other alternative transportation facilities to be provided as part of new developments, especially future employment sites, public facilities, and multi-family residential complexes.

Policy 7-P-4.2: Use the adopted regional and local Transportation Impact Mitigation Fee (TIMF) ordinances to ensure that all new developments pay a fair share of the cost of transportation improvements, or require mitigation for development proposals that are not part of the TIMF program which contribute more than one percent of the volume to an existing roadway or intersections.

Action 7-A-4.c: Continue to collect fees, plan, and design for the future construction of the improvements shown in Figure 7-1, including new roadways and roadway extensions, and improvements identified in Table 7-2 (Bailey Road and West Leland Road and Railroad Avenue and SR-4 On/Ramp).

City of Pittsburg Truck Route Map

The City of Pittsburg Truck Route Map identifies existing truck routes within the City. The map includes several local Surface Transportation Assistance Act (STAA) truck routes and other City truck routes, as shown on Figure 3.13-3.

MTC is exploring potential funding sources for the following projects within the Plan Area Vicinity:

- A truck facility parallel to SR 4/Loveridge Rd, and
- Truck-climbing lanes on Kirker Pass Road between Clearbrook Road and Buchanan Road.

City of Pittsburg Design and Construction Standards

The City’s Standard Details and Specifications provide for the coordinated and standardized development of City facilities, including roadways. The standards apply to, regulate, and guide the design and preparation of plans, and the construction of streets, highways, alleys, drainage, traffic signals, site access, and related public improvements. All public roadway infrastructure improvements must be designed and constructed in accordance with the city standards and Caltrans’ Standard Specifications (Caltrans 2018).

City of Pittsburg Municipal Code

The details of the Pittsburg Transportation Impact Mitigation Fee are outlined in Chapter 15.90 of the City of Pittsburg Municipal Code (PMC). That chapter states the following – *“In order to implement the goals of the circulation element of the city’s general plan and, more specifically, the transportation improvements contained in the capital improvement program, and to mitigate the transportation impacts caused by new development in the city, certain public road improvements must be or had to be constructed. The city council has determined that a transportation mitigation fee is needed to finance these public improvements and to pay for new development’s fair share of the construction costs of these improvements.”* The specific transportation improvements to be financed by the fee (and the current fees) are described in the most recent “Pittsburg Local Transportation Mitigation Fee (LTMF) Program Update,” adopted by council resolution and on file with the city clerk. Impact fees are due upon issuance of building permits for a specific development. The amount of the fee due is based on the size of the development proposed and the amount of peak hour traffic expected to be generated.

Details regarding the Pittsburg regional transportation development impact mitigation fee (PRTDIM) are described in PMC Section 15.103. That chapter states the following – *“Projected new development in the city of Pittsburg will further congest the freeways and arterial roadways in the cities of Pittsburg, Antioch, Brentwood, Oakley and the unincorporated eastern portion of Contra Costa County (the “regional area”) and place additional demands on the regional transportation system. The city of Pittsburg previously participated in the East Contra Costa Regional Fee and Financing Authority (“ECCRFFA”), a joint powers agency, for the funding and implementation of transportation improvement projects in the regional area. The Pittsburg city council finds that the creation of a Pittsburg regional transportation development impact mitigation fee (“PRTDIM”) program is necessary to ensure that new development pays its fair share of the construction costs of the regional transportation improvements identified in the 2010 East Contra Costa Regional Fee Program Update, and any subsequently adopted fee program updates.”* The regional impact fees are due prior to the issuance of building permits for a specific development. The amount of the fee due is based on the size of the development proposed and the amount of peak hour traffic expected to be generated.

3.13.3 METHODOLOGY AND THRESHOLDS OF SIGNIFICANCE

METHODS OF ANALYSIS

The transportation impact analysis assesses how the Plan Area’s transportation system would operate with the implementation of the proposed Specific Plan, relative to VMT using the guidelines, thresholds, and criteria described in Section 3.13.2, *Regulatory Setting*. The transportation impact analysis methodology includes a combination of quantitative and qualitative evaluations of the roadway, bicycle, pedestrian, and transit components of the transportation system. All analysis presumes that future background travel options and behaviors remain similar to current conditions and do not explicitly account for potential changes associated with disruptive trends, emerging technologies, and changes in travel choices, which were discussed in the Environmental Setting section. The proposed project was not found to satisfy any of the VMT screening criteria outlined in the City of Pittsburg or CCTA guidelines. Thus, a detailed assessment of proposed project VMT is required and described below.

Analysis Scenarios

Project generated VMT (daily home based VMT per worker) was calculated using the CCTA's regional travel demand model and compared to the relevant threshold. The version of the CCTA's regional travel demand model used for this analysis was updated to include buildout of the 2040 General Plan. Using the CCTA travel demand model, VMT calculations were prepared for the following scenarios:

- Baseline No Project: VMT was calculated using the year 2023.
- Cumulative No Project: VMT was calculated using the CCTA Model updated to include buildout of the 2040 General Plan. The 2040 General Plan assumes the addition of 3,300 employees with an Employment Center Industrial (ECI) designation in the proposed project's traffic analysis zone (TAZ) 30038.2.
- Cumulative Plus Project: VMT was calculated using the updated CCTA Model with the Project land use added into transportation analysis zone (TAZ) 30038. Within this analysis, the land uses proposed as part the 2040 General Plan are removed and replaced by the proposed Specific Plan.

Cumulative (2040) No Project and Cumulative (2040) with Project scenarios were evaluated. The CCTA model was used to assess weekday daily home-based work VMT per employee for each of the analysis scenarios. The CCTA model assigns all predicted trips within, across, or to/from the nine-county San Francisco Bay Area region onto the roadway network and the transit system by mode (single-driver and carpool vehicle, biking, walking, or transit) and transit carrier (bus, rail) for a particular scenario.

The VMT analysis uses the latest CCTA Model land use and network input files. Table 3.13-1 summarizes the land use changes made within the proposed project's traffic analysis zone (TAZ) in the CCTA travel demand model as part of the project assessment. The weekday daily average home-based work VMT per employee for the proposed project as compared to countywide average are presented in Table 3.13-2. Model land use files for the Cumulative (2040) scenario were updated based on the land uses allowed in the proposed Specific Plan.

TABLE 3.13-1: TAZ EMPLOYMENT LAND USE ASSUMPTIONS – CCTA MODEL

SCENARIO	TAZ	MANUFACTURING EMPLOYEES	OFFICE EMPLOYEES	TOTAL EMPLOYEES
Baseline (2023)	30038	0	15	15
Cumulative no Project (2040)		3,294	16	3,310
Cumulative with Project (2040)		1,266	316	1,582

SOURCE: PITTSBURG TECHNOLOGY PARK SPECIFIC PLAN TRANSPORTATION ASSESSMENT, FEHR AND PEERS, 2024

TABLE 3.13-2: CUMULATIVE VMT ANALYSIS SUMMARY: HOME-WORK VMT

SCENARIO	85% OF COUNTYWIDE AVERAGE	PROJECT TAZ HOME-WORK VMT PER EMPLOYEE	PERCENT CHANGE FROM THRESHOLD
Baseline (2023)	12.8	15.1	+2.3 (18%)
Cumulative no Project (2040)	12.9	12.3	-0.6 (-4.7%)
Cumulative with Project (2040)	12.9	13.1 ¹	=0.2 (+1.6%)

¹WITH PROJECT VMT PER EMPLOYEE IS HIGHER THAN NO PROJECT (2040 GENERAL PLAN) VMT PER EMPLOYEE BECAUSE THE BUILD SCENARIO INCLUDED 20% OFFICE LAND USE, WHICH HAS A GREATER VMT PER EMPLOYEE THAN MANUFACTURING AS REFLECTED IN THE NO PROJECT SCENARIO.

SOURCE: PITTSBURG TECHNOLOGY PARK SPECIFIC PLAN TRANSPORTATION ASSESSMENT, FEHR AND PEERS, 2024

THRESHOLDS OF SIGNIFICANCE

For the purposes of this PEIR, adoption and/or implementation of the proposed Specific Plan would result in significant impacts under CEQA, if any of the following would occur:

- Conflict or be inconsistent with CEQA Guidelines § 15064.3, subdivision (b),
- Conflict with a program, plan, ordinance, or policy addressing the circulation system, including transit, roadway, bicycle, and pedestrian facilities,
- Substantially increase hazards due to a geometric design feature (e.g., sharp curves or dangerous intersections) or incompatible uses (e.g., farm equipment), or
- Result in inadequate emergency access.

Vehicle Miles Traveled

Based on Appendix G of the CEQA Guidelines, the proposed Specific Plan would result in a significant transportation impact if it would conflict or be inconsistent with CEQA Guidelines § 15064.3, subdivision (b)(1), which states for land use projects, “Vehicle miles traveled exceeding an applicable threshold of significance may indicate a significant impact.” CEQA Guidelines § 15064.3, subdivision (b)(4) states, “A lead agency has the discretion to choose the most appropriate methodology to evaluate a project's vehicle miles traveled, including whether to express the change in absolute terms, per capita, per household or in any other measure. A lead agency may use models to estimate a project's vehicle miles traveled and may revise those estimates to reflect professional judgment based on substantial evidence.”

The City of Pittsburg follows the CCTA VMT guidelines. Because the proposed Specific Plan facilitates employment generating uses, the threshold of significance uses the home-work VMT per worker metric for project generated VMT estimates. Per CCTA guidelines, the proposed project generated home-work VMT per worker constitutes a significant impact if it is higher than 85% of the home-work VMT per worker of the existing countywide average.

Transit, Bicycles, and Pedestrians

Appendix G of the CEQA Guidelines indicates that impacts may be significant if a project conflicts with a program, plan, ordinance, or policy addressing the circulation system, including transit, roadway, bicycle, and pedestrian facilities. The proposed General Plan would have a significant impact on transit, bicycles, or pedestrians if it would conflict with adopted policies, plans, or programs regarding these systems, or create or exacerbate disruptions to the performance or safety of these systems.

Hazards and Emergency Access

Appendix G of the CEQA Guidelines indicates that impacts may be significant if a project would substantially increase hazards due to a geometric design feature (e.g., sharp curves or dangerous intersections) or incompatible uses (e.g., farm equipment). Impacts may also be significant if a project results in inadequate emergency access. The proposed General Plan would have a significant impact on the transportation system if it would increase hazards due to a design feature, incompatible uses, or inadequate emergency access.

3.13.4 IMPACTS AND MITIGATION MEASURES

Impact 3.13-1: Specific Plan implementation would result in VMT per employee that is greater than 85 percent of Baseline conditions (Less than Significant with Mitigation Incorporated)

Table 3.13-3 shows the home-work VMT per employee and total VMT for Plan Area buildout conditions using the CCTA travel demand model and assumptions described in Table 3.13-1. As shown in the table, the proposed project would result in an increased VMT (13.1) when compared to countywide total (12.9). When comparing the proposed Specific Plan to the VMT threshold, the proposed Specific Plan would exceed the VMT threshold, which would result in a potentially significant impact.

TABLE 3.13-3: VMT DATA COMPARISON BETWEEN EXISTING CONDITION AND VMT THRESHOLD

<i>LAND USE</i>	<i>UNITS</i>	<i>PROPOSED SPECIFIC PLAN VMT</i>	<i>VMT THRESHOLD</i>	<i>DOES SPECIFIC PLAN EXCEED VMT THRESHOLD?</i>
Employment generating	Home-work VMT per employee	13.1	>85% countywide average (12.9)	Yes

SOURCE: PITTSBURG TECHNOLOGY PARK SPECIFIC PLAN TRANSPORTATION ASSESSMENT, FEHR AND PEERS, 2024

To mitigate the identified impact, operational Travel Demand Management (TDM) plans, as identified in Mitigation Measure **(MM) 3.13-1**, below, shall be prepared and implemented for future development. The TDM strategies provide ongoing incentives and support for the use of non-auto transportation modes. TDM strategies are most effective for people that commute to and from a site on a regular basis, especially during weekday peak commute periods when transit service peaks and runs most frequently. Thus, the recommended strategies are generally targeted at site employees to reduce single-occupancy vehicular travel. The implementation of a robust TDM program with enforcement and monitoring is expected to result in a decrease in daily home-work VMT per employee of 1.6 percent or greater. This level of reduction is necessary to lower the expected daily home-work VMT per employee to a degree sufficient to bring it below the threshold (less than 85% than the countywide average). With implementation of **MM 3.13-1**, impacts would be **less than significant**.

Mitigation Measure**MM 3.13-1: Transportation Demand Management Plan(s)**

Travel Demand Management Plan(s) shall be prepared and implemented for future phases of proposed Specific Plan implementation. The TDM Plan shall comply with the City's TIA Guidelines in effect at the time of application and should identify trip reduction strategies as well as mechanisms for funding and overseeing the delivery of trip reduction programs and strategies. Trip reduction strategies applicable to the proposed project may include, but are not limited to, the following:

- Implement Alternative Work Schedules
- Provide New Hire Packets on Transportation Options
- Implement Subsidized or Discounted Transit Program

- d. Provide Carpooling Programs
- e. Implement Car-Sharing Program
- f. Provide a Transit Riders Guide
- g. Provide an Online TDM Information Center
- h. Implement Commute Trip Reduction Marketing
- i. Increase Bicycle and Pedestrian Facilities/Amenities
- j. Free Trial Rides on Transit Services

Significance Determination: Less than significant with mitigation incorporated.

Impact 3.13-2: Specific Plan implementation would conflict with a program, plan, policy, or ordinance addressing the circulation system, including transit, bicycle, and pedestrian facilities (Less than Significant with Mitigation Incorporated)

The City of Pittsburg has adopted local plans that guide future development to maintain and enhance the circulation system. These include the *Pittsburg Moves* Active Transportation Plan and the 2040 General Plan.

PITTSBURG MOVES

The City adopted an active transportation plan, *Pittsburg Moves*, in 2021 that establishes the City's goals and objectives for a safe and comprehensive active transportation network to improve health, mobility, livability, economy, and environment. The plan identifies over 290 bicycle and pedestrian improvement projects organized by priority for a total of ten corridors based on the ability of the corridor to enhance safety and contribute to connecting the bicycle and pedestrian network. Within these corridors are bicycle and pedestrian improvement projects for network connectivity. The Plan Area falls within the West Leland Road – East Leland Road Project, which is listed as the tenth priority corridor.

Pedestrian improvements within the Plan Area identified by *Pittsburg Moves* include crosswalk enhancements at West Leland Road and Golf Club Road. At the time of the development of the proposed Specific Plan, these improvement projects were not fully conceptualized by the City and not listed in the capital improvement plan. While the improvement projects are intended to be implemented in the distant future, the proposed Specific Plan would not make future improvement projects impracticable. The proposed Specific Plan does not physically impede the implementation of future crosswalk enhancements at West Leland Road and Golf Club Road or contain policy that would prohibit crosswalk enhancements along this corridor.

Bicycle facility improvements within the Plan Area identified by *Pittsburg Moves* include a Class I bike path along the Contra Costa Canal. The Contra Costa Canal bisects the Plan Area between phase I, which is north of the canal, and phase II and III which are south of the canal. Policy within the plan encourages multi-jurisdictional coordination to incorporate the bike path along the canal which would include the East Bay Regional Park District, the State Protection Commissions, the Contra Costa Water District, and the East Bay Regional park District who would allow trail access along the canal. During the development of the proposed Specific Plan, coordination between the agencies indicated that incorporating the bike path along the canal would require the undergrounding of the canal, which would not be feasible in the near-term future (City of Pittsburg 2024). In addition, the Contra Costa Canal bike path is not listed within

3.13 TRANSPORTATION AND CIRCULATION

the City's capital improvement plan, as the improvement is not identified within a high priority corridor. The proposed project would not interfere with the future undergrounding or incorporation of a class I bike path along Contra Costa Canal, and development would not interfere with required future groundwork.

2040 GENERAL PLAN

The 2040 General Plan contains the Circulation Element, which provides the framework for decisions concerning the City's multimodal transportation system. The proposed Specific Plan would be consistent with the 2040 General Plan goals and policies, as illustrated in Table 3.13-4, below.

TABLE 3.13-4: SPECIFIC PLAN CONSISTENCY WITH GENERAL PLAN

GOALS AND POLICIES	CONSISTENCY
Policy 7-P-1.1: Ensure that the City's circulation network is a well-connected system of streets, roads, highways, sidewalks, trails, and paths that effectively and safely accommodate all users in a manner that considers the context of surrounding land uses, the needs of all roadway users, and is maintained and improved over time to support buildout of the General Plan.	CONSISTENT The proposed Specific Plan would provide connections from the Plan Area to the City's existing circulation network via Golf Club Drive. Future development would be required to pay Transportation Impact Mitigation Fees (TIMF) to pay its fair share for a well-connected system, per MM 3.13-3 .
Policy 7-P-1.5: Implement and continue to increase efforts to reduce regional vehicle miles traveled (VMT) by supporting land use patterns and site designs that promote active modes of transportation, and public transit.	CONSISTENT The proposed Specific Plan includes standards that encourage pedestrian circulation through an integrated sidewalk network with access points at Golf Club Road. Future development would adhere to CalGreen code which includes standards for bike and pedestrian facilities. Furthermore, MM 3.13-1 would require future development to create and implement a TDM Plan to encourage a reduction in regional VMT.
Policy 7-P-1.6: Design streets to operate with vehicle speeds that are safer for all users, especially pedestrians and bicyclists, while providing adequate access for emergency vehicles. Speed reductions strategies should include reduced lane widths and application of traffic calming measures on local and collector streets and especially near parks, schools, trails, and in the Downtown core.	CONSISTENT The proposed Specific Plan would allow for an extension of Golf Club Road to serve the Plan Area. Additionally, the three emergency vehicle access roadways would be private and only used when necessary by emergency responders. Therefore, constructing these roadways to City standards to include traffic calming and speed-reduction features would not be required.
Policy 7-P-1.7: Strive to maintain delay-based level of service (LOS) D for motor vehicle traffic as the minimum acceptable service standard for all signalized and stop-controlled intersections at all times (including during peak periods) unless maintenance of LOS D would, in the City's judgement, be infeasible and/or conflict with the achievement if other City goals identified in this General Plan. Congestion in excess of LOS D may be acceptable in these cases, provided that provisions are made to improve traffic flow and/or promote multimodal or non-vehicular transportation as part of a development project or City-initiated project. In the designated Downtown core, as defined by the City's General Plan and illustrated by the City's Subdivision map, LOS E would be considered as an acceptable service standard to account for the more urban, pedestrian-oriented character of the area.	CONSISTENT Future development would be required to perform a level of service (LOS) analysis in accordance with the City's Traffic Impact Analysis Guidelines. Any violations of the guidance shall result in improvement measures developed to eliminate those violations, per MM 3.13-2 .
Policy 7-P-1.9: Implement transportation improvements to maintain and enhance roadway operations and safety while striving to improve accessibility and comfort for all users.	CONSISTENT As previously described, future development accommodated by the proposed Specific Plan would be required to pay all applicable TIMFs to support future transportation improvements within the City, per MM 3.13-3 .

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<i>GOALS AND POLICIES</i>	<i>CONSISTENCY</i>
Action 7-A-1.a: Evaluate projects traffic and Vehicle Miles Traveled (VMT) impacts of development projects based on the City's Transportation Impact Analysis Guidelines to determine transportation impacts to all users, including pedestrians, bicyclists, transit riders, and motorists, and to require projects to address impacts consistent with the requirements of CEQA.	CONSISTENT As previously described, a VMT analysis was prepared for buildout of the Plan Area and concluded that future development would result in VMT levels above the City's threshold. Therefore, future development shall prepare TDM Plans to minimize impacts from increased VMT, per MM 3.13-1 . TDM plans shall comply with the City's TIA Guidelines in effect at the time of application and identify trip reduction strategies and the mechanisms for funding and monitoring of such programs and strategies.
Action 7-A-1.b: Require proposed development projects with VMT levels above the City's threshold to consider reasonable and feasible project modifications and other measures during the project design and review stage and the environmental review stage that would reduce VMT effects in a manner consistent with the City's sustainability goals, the City's Transportation Impact Analysis Guidelines, and with State guidance on VMT reduction.	CONSISTENT See response to Action 7-A-1.a above.
Action 7-A-1.d: Require new development to pay its fair share of the costs of street and other transportation improvements in conformance with the goals and policies established in this Circulation Element and the Transportation Impact Mitigation Fee (TIMF) program.	CONSISTENT Future development accommodated by the proposed Specific Plan would be required to pay TIMFs, per MM 3.13-3 .
Action 7-A-1.e: Use traffic calming tools and speed reduction strategies in new development and the design of roadway improvements to assist in implementing complete street principles and encouraging active transportation. Possible tools include roundabouts, raised intersections, curb extensions, reduced roadway width, high visibility crosswalks, and rapid flashing beacons.	CONSISTENT The proposed Specific Plan would extend Golf Club Road, which is intended to provide private access to the Plan Area. Additionally, three emergency vehicle access roadways would provide access to the Plan Area. These roadways are private and only used when necessary by emergency responders. Therefore, constructing these roadways to City standards to include traffic calming and speed-reduction features would not be required.
Policy 7-P-2.2: Encourage employers to provide programs for carpooling/transit/biking/walking subsidies, bicycle facilities, alternative work schedules, ridesharing, telecommuting, working at home, employee education, and preferential parking for carpools/vanpools.	CONSISTENT TDM Plans shall be prepared and implemented for future development, per MM 3.13-1 . TDM plans shall comply with the City's TIA Guidelines in effect at the time of application and identify trip reduction strategies and the mechanisms for funding and monitoring of such programs and strategies. These strategies may include but are not limited to car-sharing programs and alternate work schedules.
Policy 7-P-2.4: Ensure that safe and continuous routes for pedestrians and bicyclists are provided within new development projects and on any roadways that are impacted as a result of new development.	CONSISTENT The proposed Specific Plan would extend Golf Club Road, which is intended to provide private access to the Plan Area. Therefore, constructing these roadways to City standards to

<i>GOALS AND POLICIES</i>	<i>CONSISTENCY</i>
	include safe and continuous routes for pedestrians and bicyclists would not be required.
Action 7-A-2.e: Preserve options for future transit use when designing improvements for roadways. Ensure that developers provide bus turnouts and/or shelters, where appropriate, as part of projects.	CONSISTENT Transit stops are already located directly north of the Plan Area near its entrance along west Leland Road. Future development within the Plan Area would be required to preserve and replace or provide options for future transit use should additional stops be needed in the future, as outlined in future TDM Plans (see MM 3.13-1).
Action 7-A-2.f: Require new developments to provide public access and infrastructure, as appropriate, that support internal connectivity, multimodal transportation, and integration into the surrounding transportation networks.	CONSISTENT Future development within the Plan Area would provide connections to the City's existing circulation network to facilitate efficient access to surrounding streets and transportation networks. This includes roadways, bicycle, and pedestrian improvements.
Action 7-A-2.h: Require mitigation for development projects that increase transit demand above the service levels provided by public transit operators and agencies, or, create conflicts with existing transit operations.	CONSISTENT Future development would not conflict with transit, pedestrian, or bicycle facilities. Future development accommodated by the proposed Specific Plan would be required to pay TIMFs, per MM 3.13-3 .
Action 7-A-2.i: As part of development approval, ensure that safe and contiguous routes for pedestrians and bicyclists are provided within the development projects and on any roadways that are impacted as a result of new development.	CONSISTENT The proposed Specific Plan would extend Golf Club Road, which is intended to provide private access to the Plan Area. Therefore, constructing these roadways to City standards to include safe and continuous routes for pedestrians and bicyclists would not be required.
Action 7-A-2.k: Encourage developers to provide enhanced TDM programs and alternative transportation infrastructure that exceeds minimum requirements, as per 7-A-2.j, in exchange for reduced parking requirements, with a focus on priority development areas and locations in proximity to high capacity transit.	CONSISTENT TDM Plans shall be prepared and implemented for future development, per MM 3.13-1 . TDM plans shall comply with the City's TIA Guidelines in effect at the time of application and identify trip reduction strategies and the mechanisms for funding and monitoring of such programs and strategies.
Action 7-A-2.m: Encourage major employers to establish designated parking areas for carpools, electric vehicles, and clean air vehicles and secure on-site bicycle facilities. Encourage the provision of charging stations/outlets for electric vehicles.	CONSISTENT Future development accommodated by the proposed Specific Plan would be required to comply with the current California Building Code at the time of application, including the "CalGreen" code for electric vehicle parking standards. In addition, bike facilities would be required and determined based on a ratio to the number of parking required. Furthermore, per MM 3.13-1 , TDM Plans shall comply with the City's TIA Guidelines in effect at the time of application and identify additional details on bicycle facility improvements for each subsequent phase of development.

3.13 TRANSPORTATION AND CIRCULATION

<i>GOALS AND POLICIES</i>	<i>CONSISTENCY</i>
Action 7-A-2.o: Require development projects to provide or fund their fair-share of bicycle and pedestrian facilities improvements in order that sufficient facilities for pedestrians and bicyclists may be constructed throughout the City.	CONSISTENT Future development accommodated by the proposed Specific Plan would be required to pay TIMFs, per MM 3.13-3 .
Policy 7-P-3.4: Ensure continued compliance with Title 24 of the California Building Code, requiring the removal of all barriers to disabled persons on City streets, and compliance with the Americans with Disabilities Act (ADA) to allow mobility-impaired users such as the disabled and elderly to safely and effectively use the City's circulation network.	CONSISTENT All future development accommodated by the proposed Specific Plan would be required to comply with the current California Building Code.
Policy 7-P-3.5: Encourage secure bicycle facilities and other alternative transportation facilities to be provided as part of new developments, especially future employment sites, public facilities, and multi-family residential complexes.	CONSISTENT Future development accommodated by the proposed Specific Plan would be required to comply with the current California Building Code at the time of application, including the "CalGreen" code for electric vehicle parking standards. In addition, bike facilities would be required and determined based on a ratio to the number of parking required. Furthermore, per MM 3.13-1 , TDM Plans shall comply with the City's TIA Guidelines in effect at the time of application and identify additional details on bicycle facility improvements for each subsequent phase of development.
Policy 7-P-4.2: Use the adopted regional and local Transportation Impact Mitigation Fee (TIMF) ordinances to ensure that all new developments pay a fair share of the cost of transportation improvements, or require mitigation for development proposals that are not part of the TIMF program, which contribute more than one percent of the volume to an existing roadway or intersections.	CONSISTENT Future development would be required to pay TIMFs to contribute to the necessary capital for improvement projects for a well-connected system, per MM 3.13-3 .
Action 7-A-4.c: Continue to collect fees, plan, and design for the future construction of the improvements shown in Figure 7-1, including new roadways and roadway extensions, and improvements identified in Table 7-2 (Bailey Road and West Leland Road and Railroad Avenue and SR-4 WB On-Ramp).	CONSISTENT Future development accommodated by the proposed Specific Plan would be required to pay applicable TIMFs, per MM 3.13-3 .

Subsequent development of the technology park accommodated by the proposed Specific Plan would be required to be consistent with all applicable goals, policies, and actions of the 2040 General Plan, as illustrated in Table 3.13-4. In summary, maintenance of the circulation system would be supported through transportation impact development fees at rates set by the City. Any subsequent development that exceeds any LOS threshold per the City's TIA Guidelines would be required to adopt mitigation measures to eliminate those violations, as shown below in **MM 3.13-2**. Furthermore, all future

development would be required to pay its fair share of its costs to the City's circulation network, as described in **MM 3.13-3**. With the incorporation of these mitigation measures, the proposed Specific Plan would have a less than significant impact with conflict to the 2040 General Plan.

Mitigation Measures

MM 3.13-2: Perform LOS Analysis

As future specific land-uses are proposed for development on the site, a level of service analysis shall be performed in accordance with the City of Pittsburg's TIA Guidelines in effect at the time of application. If violations of the City's General Plan LOS policies are identified, improvement measures shall be developed and proposed to eliminate those violations.

MM 3.13-3: Pay Local and Regional Traffic Impact Fees

As future specific land-uses are developed on the site, appropriate local and regional traffic impact fees shall be calculated and paid in accordance with the anticipated level of traffic generation. The two currently applicable traffic impact fees are the Pittsburg Transportation Impact Mitigation Fee (TIMF) and the Pittsburg Regional Transportation Development Impact Fee (PRTDIM), as described in Chapters 15.90 and 15.103 PMC, respectively.

Significance Determination: Less than significant with mitigation incorporated.

Impact 3.13-3: Specific Plan implementation would increase hazards due to a design feature, incompatible uses, or inadequate emergency access (Less than Significant)

The proposed Specific Plan circulation network proposes no features (sharp curves or dangerous intersections) that would substantially increase hazards. The proposed Specific Plan proposes no use that would result in incompatible transportation conditions (e.g., farm equipment, etc.). Primary emergency access would be provided via the southerly extension of Golf Club Road into the Plan Area. Two emergency vehicle-only roadways would be provided, one on the north side of the Contra Costa Canal and one on the south side. Fire access within the Plan Area would be conform with the Contra Costa County Fire Protection Department's Fire Prevention Standards and Fire Apparatus Access Road Requirements. The number of access points and with of access points and internal roadways are adequate in serving emergency access, and as such, the proposed project would have a **less than significant** impact on hazards due to design features, incompatible uses, or inadequate emergency access.

This section of the Program Environmental Impact Report (PEIR) provides a discussion of the potential impacts related to public utilities (water, water supply, storm drainage, wastewater, and solid waste) that could result from implementation of the Pittsburg Technology Park Specific Plan (proposed Specific Plan; proposed project). This section is organized with an existing setting, regulatory setting, and impact analysis.

Public utility information was acquired through consultation with the City of Pittsburg (City) and review of public documents, including:

- City of Pittsburg 2040 General Plan (Adopted May 2024)
- Pittsburg Plain Groundwater Management Plan (October 2022)
- City of Pittsburg Water System Master Plan (December 2015)
- City of Pittsburg Urban Water Management Plan (September 2021)
- Delta Diablo Resource Recovery Facility 2022 Master Plan (December 2022)
- Pittsburg Technology Park Specific Plan Water Supply Assessment (May 2024) (Appendix L)

3.14.1 EXISTING CONDITIONS

WATER DISTRIBUTION SYSTEM

The City's potable water supply is composed of two sources, both of which are treated at the City's Water Treatment Plant (WTP). These sources include surface water from the Contra Costa Canal, supplied by the Contra Costa Water District (CCWD), and groundwater extracted from two groundwater wells in the central part of the City. The City purchases untreated water from CCWD, treats it in a City-owned treatment plant, and delivers it to customers through the City's distribution pipes.

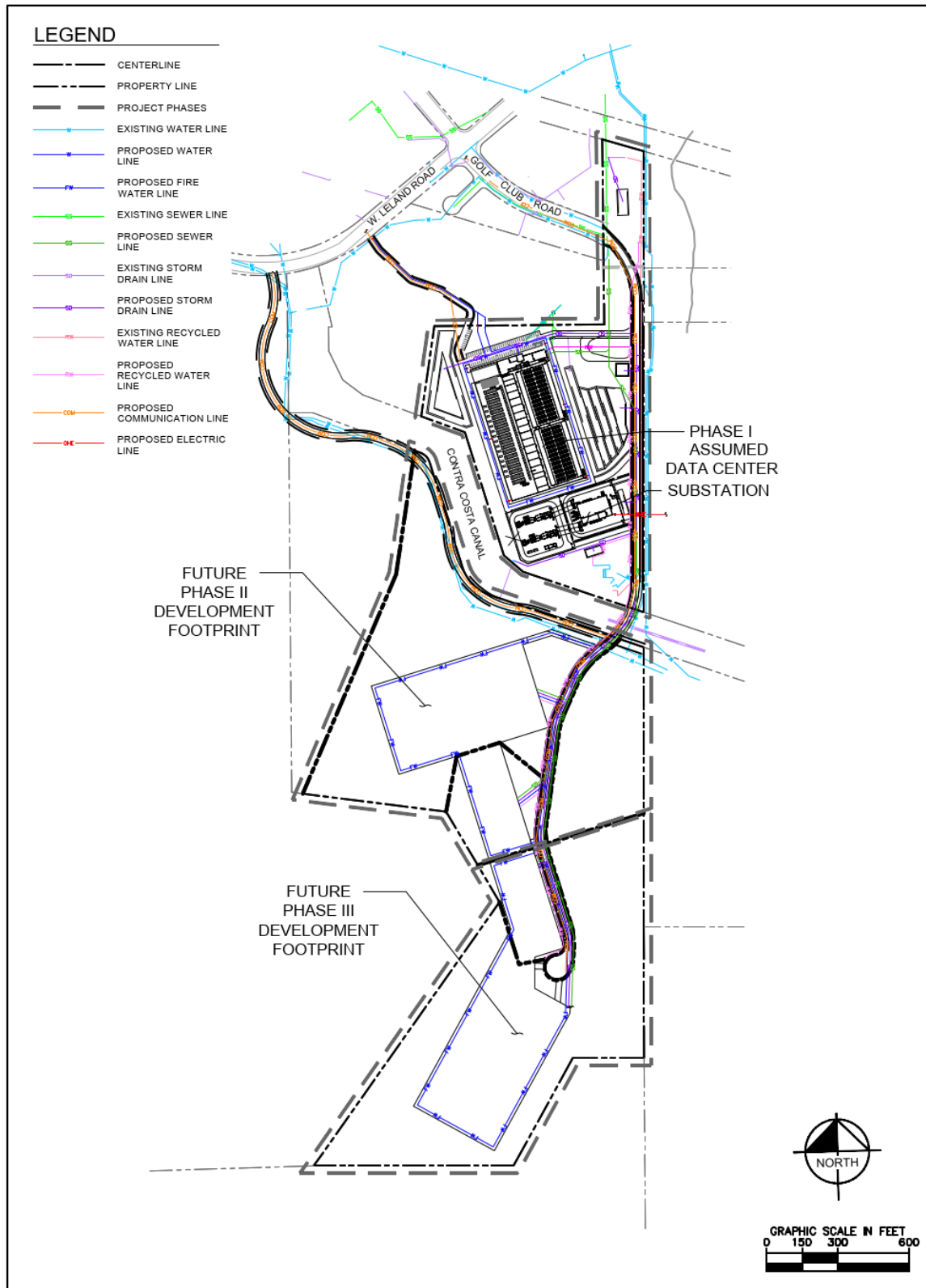
The City operates its own surface water treatment plant, groundwater wells, and associated infrastructural facilities to service customers within the City service area. The City's water treatment plant has a hydraulic design capacity of 32 million gallons per day (MGD) and is currently limited by the California Department of Public Health (CDPH) to 12 MGD when the water temperature is less than 50 degrees Fahrenheit; and 28 MGD when the water temperature is less than 68 degrees Fahrenheit, which usually occurs between the months of November and April. The City's water treatment plant currently operates at 6 to 18 MGD.

The existing domestic water infrastructure for the proposed Specific Plan Area can be summarized as follows and as shown in Figure 3.14-1.

- An existing domestic water service line is located at the Delta View Golf Course.
- Two domestic water pipes at 14" and 20" run along south side of Contra Costa Canal.
- Two domestic water pipes at 30" and 20" run along the eastern portion of the Plan Area. At the north end of the site, the 30" line turns west; however, the final connection point is yet to be determined.
- Water treatment pump stations "PS-2" and "PS-3" exist outside the Plan Area limits, southeast from the Contra Costa Canal.
- Adjacent to pump stations PS-2 and PS-3 are located existing water treatment storage reservoirs "T-1" and "T-2".

3.14 UTILITIES AND SERVICE SYSTEMS

FIGURE 3.14-1. UTILITY CONCEPT MAP



Pressure Zones and Criteria

The City's existing water system serves lands ranging in elevation from less than 5 feet (above sea level) in the Marina area to over 500 feet in the southwest portion of the City. The City is divided into several pressure zones, each of which services a range of elevations. The creation of multiple pressure zones allows operating pressures to be maintained within a reasonable range of 40 to 100 pounds per square inch (psi) for each zone.

The Plan Area is located in Pressure Zone 2, which is bounded by Pressure Zone 1 to the north, and currently services elevations ranging from approximately 80 feet to 250 feet. The water treatment plant booster station pumps water to the transmission system and storage tanks in this zone. The Stoneman Reservoir and New West Leland Reservoir establish the high water level in both the east and the west sections of this pressure zone.

Water is conveyed from the lower pressure zones to the higher pressure zones via a series of booster pump stations. The Water Treatment Plant Zone 2 Pump Stations extract water from the 5.0 MG and 1.0 MG finished water reservoirs to supply Pressure Zone 2 and fill the 3.0 MG New West Leland tank and the 2.5 MG Stoneman tank.

WATER SYSTEM SUPPLIES

Purchased and Imported Water Supply

The City is within the service area of CCWD and purchases Central Valley Project (CVP) water from the Delta by CCWD, who is its wholesale supplier. CCWD has a contract with the U.S. Bureau of Reclamation (USBR) for 195,000 AF per year (AFY) of CVP water. The current contract was renewed in March 2005 through February 2045.

Between 85 percent and 95 percent of the City's current water supply is received from CCWD pursuant to a contractual agreement that allows the City to receive a supply of water as is necessary to meet its needs. However, this supply of water is subject to rationing restrictions in the event of a water shortage or other extraordinary circumstances. CCWD's future water supply projections indicate adequate availability of surface water sources delivered through its contract with the USBR.

Groundwater Supply

The City is located above the Pittsburg Plain Groundwater Basin. The City extracts groundwater from this basin using two wells. The Pittsburg Plain Groundwater Basin is bounded by Suisun Bay to the north, the Tracy Subbasin of the San Joaquin Valley Water Groundwater Basin to the east, and the Clayton Valley Groundwater Basin to the west. The Pittsburg Plain Groundwater Basin extends to the south inland from the Suisun Bay between one and three miles. It is within the two major drainage basins of Kirker Creek and Willow Creek, which both discharge into Suisun Bay. According to DWF Bulletin 118, there is limited data regarding the occurrence and movement of groundwater in the Pittsburg Plain Groundwater Basin.

The City published the Pittsburg Plain Groundwater Management Plan (GWMP) in October 2012. The GWMP was established to manage and protect groundwater resources within the City and the

underlying groundwater basin. The primary objective the GWMP is to provide a long-term strategy to maintain the quality, reliability, and sustainability of groundwater resources within the Pittsburg Plain Groundwater Basin. To accomplish this, the City manages groundwater conjunctively with its surface water resources and supports Basin Management Objectives directed toward the sustainability and optimal use of groundwater supplies.

The Pittsburg Plain Groundwater Basin has not been adjudicated. Hydrographs created from the Department of Water Resources (DWR) well data in the Pittsburg Plain Groundwater Basin indicate that groundwater levels have remained fairly stable over the period of record, with the exception of static water level drops and subsequent recovery associated with the 1976 to 1977 and 1987 to 1992 drought periods. According to DWR, and based on present groundwater conditions, it is not expected that overdraft conditions will occur in the groundwater basin. As such, the Pittsburg Plain Groundwater Basin is not listed as a critically overdrafted groundwater basin by DWR.

Recycled Water

Delta Diablo (formerly Delta Diablo Sanitation District) provides wastewater collection and treatment for the Cities of Pittsburg and Antioch, as well as the unincorporated community of Bay Point. The wastewater treatment plant (WWTP) has an average dry weather flow permitted capacity of 19.5 million gallons per day (MGD) and a recycled water facility (RWF) provides over 9,600 AFY of recycled water for industrial and landscape irrigation uses within the recycled water service area.

The City continues to support developing irrigation and industrial recycled water uses where there is available supply and the use is economically feasible. Delta Diablo began recycled water deliveries within the City's service area in the 1990s and the City has continued to add service connections since that time.

There is an existing recycled water storage tank in the Plan Area. A 10-inch recycled water line services the tank, which extends from a 30-inch recycled water main along the eastern side of the Plan Area.

Current Water Supplies

During prolonged years of drought, City-wide water use patterns are expected to change. Typically, outdoor water use will initially increase as irrigation is used to offset decreased rainfall. These potential water use increases can be offset, in part, by increasing water conservation measures.

The UWMP's water supply assessment considered the following sources of supply:

- **Surface Water:** The City receives surface water deliveries from CCWD in the form of diversions from the Contra Costa Canal. Historically CCWD has been capable of meeting 100 percent of the City's supply needs. CCWD's 2020 UWMP indicates this could reach as low as 85 percent during the final year of a five-year drought.
- **Groundwater:** The City currently operates two groundwater wells, which extract and deliver groundwater to be blended and treated at the WWTP. The available supply for these wells is assumed as equal to the historical average pumping.

- Recycled Water: Water supply for landscape irrigation and industrial use is provided to retail customers in the City by Delta Diablo from their water recycling facility, and the water supply and demand assessment assumes no reduction in supply availability.

The City has developed a Water Shortage Contingency Plan which reflects the DWR-recommended six standard water shortage levels. Identifying the appropriate shortage level will be in accordance with the procedures outlined as part of the Annual Assessment procedures.

As an example, if the Annual Assessment determines a shortage of 22 percent, the City would be considered in a Severe Drought condition. With recommendations from City staff, the City Council has the authority to declare the appropriate conservation level considered necessary to manage the system demands and mitigate the water shortage. The City Council can also downgrade, upgrade, or terminate a shortage response level based on City staff recommendations.

Each water rationing stage includes a water demand reduction percentage, which is to be applied to normal water demands. The plan is dependent on the cause, severity, and anticipated duration of the water shortage, and a combination of voluntary and mandatory water conservation measures, which can be put in place to reduce City-wide water usage. The water shortage stages are summarized in Table 3.14-1.

TABLE 3.14-1: STAGES OF WATER SHORTAGE CONTINGENCY PLANNING

SHORTAGE LEVEL	PERCENT SUPPLY SHORTAGE/ REDUCTION	PITTSBURG SHORTAGE LEVEL	WATER SUPPLY CONDITION
0	None	Normal	At Level 0, no Water Supply Shortage condition exists.
I	Up to 10%	Alert	A Level 1 Water Supply Shortage condition exists when the City of Pittsburgh notifies its water users that due to drought, the supply reductions targets are up to 10%.
II	11-20%	Significant	A Level 2 Water Supply Shortage condition exists when the City of Pittsburgh notifies its water users that due to drought, the supply reductions targets are 11 to 20%.
III	21-30%	Severe	A Level 3 Water Supply Shortage condition exists when the City of Pittsburgh notifies its water users that due to drought, the supply reductions targets are 21 to 30%.
IV	31-40%	Critical	A Level 4 Water Supply Shortage condition exists when the City of Pittsburgh notifies its water users that due to drought, the supply reductions targets are 31 to 40%.
V	41-50%	Crisis	A Level 5 Water Supply Shortage condition exists when the City of Pittsburgh notifies its water users that due to drought, the supply reductions targets are 41 to 50%.
IV	> 50%	Emergency	A Level 6 Water Supply Shortage condition exists when the City of Pittsburgh notifies its water users that due to drought, the supply reductions targets are greater than 50%.

SOURCE: CITY OF PITTSBURG 2020 URBAN WATER MANAGEMENT PLAN (2021)

The City's WSCP includes shortage response actions that may be implemented during a water shortage. Additionally, the City of Pittsburgh Municipal Code (PMC) has multiple permanent water use restrictions in place year-round that minimize water waste. These shortage response actions and permanent water use restrictions are summarized in the WSCP.

Fire Flow

A City-wide fire flow analysis was conducted and consisted of simulating the maximum day demand in the hydraulic model and applying hypothetical fire flows. The magnitude and duration of each fire flow was based on the governing land use type within proximity to the fire location. The hydraulic model indicates that the City's existing distribution system performed reasonably well during the fire flow analysis with few exceptions (City of Pittsburg 2015).

Existing storage requirements were identified for each existing pressure zone and included the operation, fire, and emergency storage components. The total City-wide required storage for existing domestic water demands is calculated at 14.86 MG. Future storage requirements were identified based on the known future developments in each existing and future pressure zone. These known future developments will require an additional 9.84 MG of storage capacity.

WASTEWATER SYSTEM

Sewer services in the Planning Area are provided by the City and Delta Diablo. The City maintains and owns the local sewage collection system that serves the City's municipal users, and the City's wastewater is conveyed to Delta Diablo facilities for treatment. Delta Diablo's service area encompasses Pittsburg, Bay Point, and Antioch.

The City's collection system consists of approximately 174 miles of sewer lines ranging in diameter from 6 to 36 inches, and one sewage lift station. The oldest portions of Pittsburg's sewage collection system were constructed in the early part of this century to serve what is now Downtown.

The Plan Area is currently served by an 8-inch sewer main located at the north end of the Plan Area.

Wastewater Quality Control Facility

The Delta Diablo wastewater treatment plant (WWTP) located north of Pittsburg-Antioch Highway, just east of Pittsburg City limits has a 54 square mile service area with an average wastewater flow of 12.8 million gallons per day (mgd). The Delta Diablo system includes the following components:

- 18.5 miles of sewer force main and 14 miles of interceptors
- 5 pump stations and 5 equalization storage facilities with 4 million gallons (MG) of storage
- 174 miles of sewer lines in the Bay Point collection system (Antioch and Pittsburg own and operate approximately 130 miles and 300 miles, respectively, of their own satellite systems that feed into the Delta Diablo system)
- WWTP with a 2.2 MG flow equalization basin and 12 MG of storage
- Recycled Water Facility
- 16 miles of recycled water pipeline

The water resource recovery services consist of conventional treatment of wastewater, recycled water production and distribution, pollution prevention, energy recovery, beneficial reuse of biosolids, street sweeping, and household hazardous waste collection.

The conventional treatment process consists of screening, grit removal, primary and secondary clarification, biological treatment by trickling towers and/or aeration basins, chlorination, and de-chlorination. Solids are anaerobically digested, centrifuged, and beneficially reused as fertilizer. Treated wastewater is discharged through a deep water outfall to New York Slough.

City-wide Wastewater Flows

The Delta Diablo WWTP has an existing average daily wastewater flow of 12.8 mgd and the capacity to treat approximately 19.5 mgd (Delta Diablo 2022). The WWTP has a 2.2 mgd flow equalization basin, a 12.8 mg emergency retention basin, and a 1.0 mg emergency storage basin.

Table 3.14-2 presents historical average flow data from 2007 to 2009 and flow projections through buildout of the 2040 General Plan. Future loads were developed based on these projected flows, as well as historical concentrations and peaking factors.

TABLE 3.14-2: PAST AND PROJECTED INFLUENT FLOWS FROM TREATMENT PLANT

CONDITION	INFLUENT FLOW (MGD)						
	2007-2009	PEAKING FACTORS	2020	2030	2040	2050	2040 GENERAL PLAN BUILDOUT
Average Dry Weather	13.2	0.97	17.1	19.3	21.5	23.7	25.3
Average Annual	13.6	1.00	17.6	19.9	22.1	24.4	26.0
Maximum Month	147	1.09	19.0	21.5	23.9	26.4	28.1
Maximum Day	18.6	1.53	24.1	27.2	30.3	33.4	35.6
Peak Wet Weather	32.5	2.46	35.6	28.7	41.8	44.9	47.1

SOURCE: DELTA DIABLO RESOURCES RECOVERY FACILITY 2022 MASTER PLAN.

The Delta Diablo has adopted a district Master Plan that includes phased treatment plant expansion to ultimately provide 24.0 mgd (average dry weather flow) capacity in order to accommodate anticipated 2040 General Plan buildout for the communities of Pittsburg, Antioch, and unincorporated Bay Point.

WASTE DISPOSAL FACILITIES

Pittsburg is served by Mt. Diablo Resource Recovery (MDRR - Pittsburg) formally known as Pittsburg Disposal Service, for solid waste pick-up and disposal services.

The Environmental Services Department, in conjunction with MDRR - Pittsburg, coordinates the curbside recycling, and green waste programs. MDRR - Pittsburg provides a container for garbage, recycling and green waste separately. Additionally, SB 1383 requires every jurisdiction to provide organic waste collection services to all residents and businesses.

Keller Canyon Landfill

Keller Canyon Landfill disposes of industrial non-recyclable waste from Pittsburg. The Keller Canyon Landfill has a maximum permitted throughput of 3,500.00 tons per day, and a maximum permitted capacity of 75,018,280 cubic yards with a remaining capacity of 63,408,410 cubic yards.

3.14 UTILITIES AND SERVICE SYSTEMS

Keller Canyon Landfill is a Class II facility designed to accept mixed municipal, construction/demolition, agricultural, sludge (Bio-Solids), and other designated industrial solid waste. Although the total acreage of the site is 1,399 acres, the allotted disposal footprint is 244 acres to allow for a boundary between the facility and surrounding developments. The estimated cease of operation date for this facility is 2050.

Recycling Center & Transfer Station

Located at 1300 Loveridge Road, the Mt. Diablo Resource Recovery Park accepts and recycles a variety of materials, including organic materials, glass, paper, and plastic. The facility also accepts regular household waste, wood, green waste, and construction debris.

The RCTS contains Mt. Diablo Recycling the area's largest state-of-the-art recycling processing center, with a goal of keeping all recyclable items, including paper, metals, cardboard, yard waste, urban wood waste, construction materials and used oil, out of the landfill so as much material as possible can be recycled and reused. The facility also includes the region's largest construction and demolition recycling operation, resulting in thousands of tons of material being kept out of the landfill. The facility serves residential and commercial collection services to the cities of Concord, Pittsburg, Oakley, Rio Vista and unincorporated areas throughout Contra Costa and Solano Counties.

SOLID WASTE GENERATION RATES AND VOLUMES

The California Department of Resources Recycling and Recovery (CalRecycle) tracks and monitors solid waste generation rates on a per capita basis. Per capita solid waste generation rates and total annual solid waste disposal volumes for the City between 2015 and 2017 are shown in Table 3.14-3.

TABLE 3.14-3: SOLID WASTE GENERATION RATES

<i>YEAR</i>	<i>WASTE GENERATION RATE (LBS/PERSON/DAY)</i>	<i>POPULATION</i>	<i>TOTAL DISPOSAL TONNAGE (TONS/YEAR)</i>
2016	5.45	68,133	67,707
2017	5.53	71,342	72,064
2018	7.68	73,138	102,458
2019	6.07	72,541	80,331
2020	6.49	76,242	90,371
2021	6.01	75,633	82,988

SOURCE: CAL RECYCLE (ACCESSED: OCTOBER 2023); CA DOF, TABLES E-5 AND E-4.

As shown in Table 3.14-3, the 2021 per capita disposal rate in Pittsburg, which is the most recently approved disposal rate, was 6.01 pounds per day (ppd) per resident.

The per capita waste generation rate increased from 5.4 to 6.0 lbs/person/day over the six-year (2016-2021) period, and, the total annual disposal tonnage in the city increased by 15,281 tons over the 2016 to 2021 time span. With the passage of SB 1016, per capita disposal rate is used to determine the diversion progress of a city and not the jurisdictional diversion rates. Therefore, a population increase resulting in the generation of more overall city waste does not affect the

jurisdiction's ability to meet its waste goals. The City's waste disposal rate targets are shown in Table 3.14-4.

TABLE 3.14-4: CITY OF PITTSBURG WASTE DISPOSAL RATE TARGETS (POUNDS/DAY)

YEAR	POPULATION		EMPLOYMENT	
	TARGET	ACTUAL	TARGET	ACTUAL
2016	6.7	5.4	40.0	26.50
2017	6.7	5.5	40.0	27.80
2018	6.7	7.8	40.0	38.7
2019	6.7	6.4	40.0	28.9
2020	6.7	6.6	40.0	33.8
2021	6.7	6.0	40.0	32.4

SOURCE: CAL RECYCLE (ACCESSED: OCTOBER 2023)

The City's target rate on the above table represents a 50 percent diversion rate. In accordance with AB 939, which required municipalities to aggressively pursue municipal solid waste source reduction and recycling, the City continues to meet and exceed all AB 939 goals. Additionally, SB 1383 requires cities to provide organic waste collection services for all businesses and residences to divert organic material from going to the landfill in order to meet the statewide goal of reducing the amount of organic waste disposed of in landfills (50% reduction by 2020 and 75% reduction by 2025). The various solid waste management actions adopted by the City include, but are not limited to, recycling and yard waste programs for residents and businesses, public education and public outreach awareness events, and school recycling and composting.

NATURAL GAS/ELECTRICITY

PG&E is the largest publicly-owned utility in California and provides natural gas and electricity for residential, industrial, and agency consumers within the Contra Costa County area and the City. In 2022, the total electricity and natural gas usage in Contra Costa County in 2022 (latest year of data available) was approximately 8,338 GWh, and approximately 895 million therms, respectively (California Energy Commission 2023).

Existing PG&E power lines are located directly adjacent to the east of the Plan Area.

3.14.2 REGULATORY SETTING

FEDERAL

Clean Water Act (CWA) / National Pollutant Discharge Elimination System (NPDES) Permits

The CWA is the cornerstone of water quality protection in the United States. The statute employs a variety of regulatory and non-regulatory tools to sharply reduce direct pollutant discharges into waterways, finance municipal wastewater treatment facilities, and manage polluted runoff. These tools are employed to achieve the broader goal of restoring and maintaining the chemical, physical,

and biological integrity of the nation's waters so that they can support "the protection and propagation of fish, shellfish, and wildlife and recreation in and on the water."

The CWA regulates discharges from "non-point source" and traditional "point source" facilities, such as municipal sewage plants and industrial facilities. Section 402 of the Act creates the NPDES regulatory program which makes it illegal to discharge pollutants from a point source to the waters of the United States without a permit. Point sources must obtain a discharge permit from the proper authority (usually a state, sometimes EPA, a tribe, or a territory). NPDES permits cover industrial and municipal discharges, discharges from storm sewer systems in larger cities, storm water associated with numerous kinds of industrial activity, runoff from construction sites disturbing more than one acre, mining operations, and animal feedlots and aquaculture facilities above certain thresholds.

Permit requirements for treatment are expressed as end-of-pipe conditions. This set of numbers reflects levels of three key parameters: (1) biochemical oxygen demand (BOD), (2) total suspended solids (TSS), and (3) pH acid/base balance. These levels can be achieved by well-operated sewage plants employing "secondary" treatment. Primary treatment involves screening and settling, while secondary treatment uses biological treatment in the form of "activated sludge."

All so-called "indirect" dischargers are not required to obtain NPDES permits. An indirect discharger is one that sends its wastewater into a city sewer system, so it eventually goes to a sewage treatment plant. Although not regulated under NPDES, "indirect" discharges are covered by another CWA program called pretreatment. "Indirect" dischargers send their wastewater into a city sewer system, which carries it to the municipal sewage treatment plant, through which it passes before entering surface water.

STATE

State Water Resources Control Board

The State Water Resources Control Board (SWRCB) and the nine Regional Water Quality Control Boards (RWQCBs), collectively known as the California Water Boards (Water Boards), are dedicated to a single vision: abundant clean water for human uses and environmental protection to sustain California's future. Under the federal Clean Water Act (CWA) and the state's pioneering Porter-Cologne Water Quality Control Act, the State and Regional Water Boards have regulatory responsibility for protecting the water quality of nearly 1.6 million acres of lakes, 1.3 million acres of bays and estuaries, 211,000 miles of rivers and streams, and about 1,100 miles of exquisite California coastline.

The California SWRCB and RWQCBs enforce State of California statutes that are equivalent to or more stringent than the Federal statutes. RWQCBs are responsible for establishing water quality standards and objectives that protect the beneficial uses of various waters. The City of Pittsburg is within the jurisdiction of the San Francisco Bay RWQCB (SFRWQCB).

The RWQCB's regulatory role often involves the formation and implementation of basic water protection policies. These are reflected in the individual RWQCB's Basin Plan, generally in the form of guidelines, criteria and/or prohibitions related to the siting, design, construction, and

maintenance of on-site sewage disposal systems. The SWRCB's role has historically been one of providing overall policy direction, organizational and technical assistance, and a communications link to the State legislature.

Department of Water Resources

The Department of Water Resources' (DWR) major responsibilities include preparing and updating the California Water Plan to guide development and management of the State's water resources, planning, designing, constructing, operating, and maintaining the State Water Resources Development System, protecting and restoring the Sacramento-San Joaquin Delta, regulating dams, providing flood protection, assisting in emergency management to safeguard life and property, educating the public, and serving local water needs by providing technical assistance. In addition, the DWR cooperates with local agencies on water resources investigations; supports watershed and river restoration programs; encourages water conservation; explores conjunctive use of ground and surface water; facilitates voluntary water transfers; and, when needed, operates a State drought water bank.

Water Quality Control Plan for the San Francisco Bay Region

The Water Quality Control Plan for the San Francisco Bay Region (San Francisco Bay Region Basin Plan) includes a summary of beneficial water uses, water quality objectives needed to protect the identified beneficial uses, and implementation measures. The Basin Plan establishes water quality standards for all the ground and surface waters of the region. The term "water quality standards," as used in the CWA, includes both the beneficial uses of specific water bodies and the levels of quality that must be met and maintained to protect those uses. The Basin Plan includes an implementation plan describing the actions by the RWQCB and others that are necessary to achieve and maintain the water quality standards.

The RWQCB regulates waste discharges to minimize and control their effects on the quality of the region's ground and surface water. Permits are issued under a number of programs and authorities. The terms and conditions of these discharge permits are enforced through a variety of technical, administrative, and legal means. Water quality problems in the region are listed in the Basin Plan, along with the causes, where they are known. For water bodies with quality below the levels necessary to allow all the beneficial uses of the water to be met, plans for improving water quality are included. The Basin Plan reflects, incorporates, and implements applicable portions of a number of national and statewide water quality plans and policies, including the California Water Code and the CWA.

Senate Bill (SB) 610

SB 610 was adopted in 2001 and reflects the growing awareness of the need to incorporate water supply and demand analysis at the earliest possible stage in the land use planning process. SB 610 requires that when a city or county determines a project is subject to CEQA, and as defined in Section 10912 of the California Water Code, to identify any public water system that may supply water for the proposed project and to request those public water systems to prepare a specified water supply assessment, except as otherwise specified. The assessment would include, among other

information, an identification of existing water supply entitlements, water rights, or water service contracts relevant to the identified water supply for the proposed project and water received in prior years pursuant to those entitlements, rights, and contracts.

Section 10912(a) of the California Water Code identifies a “project” as meeting any of the following criteria:

- A proposed residential development of more than 500 dwelling units;
- A proposed shopping center or business establishment employing more than 1,000 persons or having more than 500,000 square feet of floor space;
- A commercial building employing more than 1,000 persons or having more than 250,000 square feet of floor space;
- A hotel or motel with more than 500 rooms;
- A proposed industrial, manufacturing, or processing plant, or industrial park, planned to house more than 1,000 persons, occupying more than 40 acres of land, or having more than 650,000 square feet of floor area;
- A mixed-use project that includes one or more of these elements; or
- A project creating the equivalent demand of 500 residential units.

SB 1374 (Construction and Demolition Waste Materials Diversion)

Senate Bill 1374 (SB 1374), Construction and Demolition Waste Materials Diversion Requirements, requires that jurisdictions summarize their progress realized in diverting construction and demolition waste from the waste stream in their annual AB 939 reports. SB 1374 required the CIWMB to adopt a model construction and demolition ordinance for voluntary implementation by local jurisdictions.

California Integrated Waste Management Board Model Ordinance

Subsequent to the Integrated Waste Management Act, additional legislation was passed to assist local jurisdictions in accomplishing the goals of AB 939. The California Solid Waste Re-use and Recycling Access Act of 1991 (§42900-42911 of the Public Resources Code) directs the California Integrated Waste Management Board (CIWMB) to draft a “model ordinance” relating to adequate areas for collecting and loading recyclable materials in development projects. The model ordinance requires that any new development project, for which an application is submitted on or after September 1, 1994, include “adequate, accessible, and convenient areas for collecting and loading recyclable materials.” For subdivisions of single family detached homes, recycling areas are required to serve only the needs of the homes within that subdivision.

California Mandatory Commercial Recycling Law (AB 341)

Assembly Bill (AB) 341 directed CalRecycle to develop and adopt regulations for mandatory commercial recycling. CalRecycle initiated formal rulemaking with a 45-day comment period beginning Oct. 28, 2011. The final regulation was approved by the Office of Administrative Law on May 7, 2012. The purpose of AB 341 is to reduce GHG emissions by diverting commercial solid waste

to recycling efforts and to expand the opportunity for additional recycling services and recycling manufacturing facilities in California.

Beginning on July 1, 2012, businesses have been required to recycle, and each jurisdiction has implemented programs that include education, outreach, and monitoring. Jurisdictions were required to start reporting on their 2012 Electronic Annual Report (due August 1, 2013) on their initial education, outreach, and monitoring efforts, and, if applicable, on any enforcement activities or exemptions implemented by the jurisdiction.

In addition to Mandatory Commercial Recycling, AB 341 sets a statewide goal for 75 percent disposal reduction by the year 2020. This is not written as a 75 percent diversion mandate for each jurisdiction. The 50 percent disposal reduction mandate still stands for cities, counties, and State agencies (including community colleges) under AB 939. CalRecycle continues to evaluate program implementation as it has in the past through the Annual Report review process for entities subject to either AB 939.

California Short-lived Climate Pollutant Reduction Strategy (SB 1383)

Senate Bill 1383 (SB 1383), Short-lived Climate Pollutants (SLCP): Organic Waste Reductions, intends to reduce short-lived, harmful super pollutants with significant warming impacts and is essential to achieving California's climate goals. SB 1383 makes it mandatory for all business to recycle their organics weekly as well as requires businesses to divert their organics material from going to the landfill, which can include donating surplus food. Its statewide goal is to reduce the amount of organic waste disposed of in landfills (50% reduction by 2020 and 75% reduction by 2025). It also aims to rescue for people to eat at least 20% of currently disposed surplus food by 2025.

SB 1383 requires counties to take the lead collaborating with the jurisdictions located within the county in planning for the necessary organic waste recycling and food recovery capacity needed to divert organic waste from landfills into recycling activities and food recovery organizations. It requires organic waste facilities and operations to measure and report organic waste material activity, including composting and anaerobic digestion.

California Building Code: Building Energy Efficiency Standards

The California Code of Regulations (CCR) Title 24, also known as the California Building Standards Code (CBSC), includes regulations for how buildings are designed and constructed, and are intended to ensure the maximum structural integrity and safety of private and public buildings. The CBSC, which applies to all applications for building permits, consists of 12 parts that contain CBSC administrative regulations for all State agencies that implement or enforce building standards. Local agencies must ensure the development complies with the CBSC standards. Cities and counties can adopt additional standards beyond the CBSC including CBSC Part 2, named the California Building Code (CBC).

The California Energy Commission (CEC) updates the Energy Code every three years. On August 11, 2021, the CEC adopted the 2022 Energy Code. In December, it was approved by the California Building Standards Commission for inclusion into the California Building Standards Code. The 2022

Energy Code encourages efficient electric heat pumps, establishes electric-ready requirements for new homes, expands solar photovoltaic and battery storage standards, strengthens ventilation standards, and more. Buildings whose permit applications are applied for on or after January 1, 2023, must comply with the 2022 Energy Code.

California Building Code: Green Building Standards Code (CALGreen Code)

The CALGreen Code was adopted as part of the California Building Standards Code and established planning and design standards for sustainable site development, energy efficiency (in excess of the California Energy Code requirements), as well as water conservation and material conservation, both of which contribute to energy conservation. This code features regulations for energy efficiency, water efficiency and conservation, material conservation and resource efficiency, as well as environmental quality. Also included as part of the CALGreen code are mandatory provisions for commercial, residential, and public school buildings, appendices with voluntary provisions for all of these occupancies, and residential and nonresidential provisions.

LOCAL

Contra Costa Water District Urban Water Management Plan

The Contra Costa Water District Urban Water Management Plan (CCWD UWMP) 2020 Update presents information on the District’s supply and demand forecasts, conservation programs, water shortage contingency planning, water transfers, and recycled water opportunities to the year 2045. The UWMP also includes a description of the CCWD UWMP adoption, public coordination, and planning coordination activities. The CCWD UWMP summarizes the status of CCWD’s water demand management measures (also known as best management practices or BMPs) and includes the new requirements of the Water Conservation Bill of 2009 (SB X7-7), which was passed in 2009 and requires an evaluation of baseline per capita water use and identification of interim and 2020 per capita water use targets to achieve a 20 percent per capita water use reduction by 2020. Completion of a UWMP is required in order for a water supplier to be eligible for DWR administered state grants and loans and drought assistance. It is also a source of information for water supply assessments (SB 610) and Written Verifications of Water Supply (SB 221). The CCWD UWMP meets all requirements of the California Urban Water Management Planning Act.

Contra Costa Clean Water Program Stormwater C.3 Guidebook

The 9th Edition of the Contra Costa Clean Water Program Stormwater C.3 Guidebook (2024) helps to ensure that applicable projects comply with the C.3 requirements in the California Regional Water Quality Control Boards’ Municipal Regional Permit. The Guidebook provides detailed information about how to prepare a Stormwater Control Plan. In addition, there are two Guidebook Addendums, “Contra Costa Clean Water Program Technical Criteria for Non-LID Facilities” and “Preparing a Stormwater Control Plan for a Small Land Development Project”. Provision C.3 compliance must be demonstrated at the time of application for a development project, including rezoning, tentative map, parcel map, conditional use permit, variance, site development review, design review, development agreement, or building permit. All Regulated Projects require a Stormwater Control Plan showing the location and footprint of proposed impervious surfaces and of proposed

stormwater facilities, and a description of how runoff will flow from impervious surfaces to the facilities.

California Stormwater Quality Association (CASQA), BMP Handbook

CASQA publishes BMP Handbooks to provide guidance and support for compliance with several types of stormwater permits. The Construction BMP Handbook provides practical and industry leading resources to support implementation of the Construction General Permit (CGP) issued by the SWRCB. The handbook includes SWPPP templates for traditional projects and linear underground projects (LUP), BMP Fact Sheets for erosion and sediment control, non-stormwater management and material management, and guidance on selection of slope stabilization techniques.

City of Pittsburg Urban Water Management Plan (2020)

The purpose of the 2020 UWMP is to ensure efficient use of urban water supplies in the City and promote conservation. The UWMP discusses the availability of water under normal, single dry year, and multiple dry year conditions, projected water use and reclamation and water conservation activities. The UWMP complies with the Urban Water Management Planning Act (California Water Code Section 10610 et seq.).

City of Pittsburg Water System Master Plan (2015)

The 2015 Water System Master Plan (2015 WSMP) is intended to serve as a tool for planning and phasing the construction of future water transmission and distribution facilities. The 2015 WSMP evaluated the City's domestic water distribution system and recommended capacity improvements necessary to service the needs of existing users and for servicing future developments. Should planning conditions change, and depending on their magnitude, adjustments to the master plan recommendations might be necessary.

City of Pittsburg Plain Groundwater Basin Groundwater Management Plan (2012)

The primary objective of the Pittsburg Plain Groundwater Basin Groundwater Management Plan is to provide a long-term strategy to maintain the quality, reliability, and sustainability of groundwater resources within the Pittsburg Plain Groundwater Basin. To accomplish this, the City intends to manage groundwater conjunctively with its surface water resources and support Basin Management Objectives directed toward the sustainability and optimal use of groundwater supplies.

City of Pittsburg Sewer System Management Plan/Delta Diablo 2022 Master Plan

The City of Pittsburg maintains a Sewer System Management Plan document that guides the design, development, and maintenance of the sewer utilities within the City. Additionally, the Delta Diablo Resources Recovery Facility 2022 Master Plan was commissioned in 2022 to:

- Guide development of a prioritized, long-term capital improvement program (CIP) that meets infrastructure needs, addresses regulatory drivers, and maintains operational effectiveness and reliability.
- Support development of the District’s Asset Management Program by integrating condition assessment data from the WRRF.
- Develop a strategic, technical, and financial approach to meet future nutrient removal regulatory requirements.
- Identify and mitigate potential treatment process vulnerabilities and identify opportunities to improve process monitoring, control, and optimization.
- Develop a framework to support resource recovery, including recycled water, biosolids, biogas, and renewable energy use through identification of applicable innovative approaches, technologies, and best practices in use at peer wastewater and resource recovery agencies. This framework is intended to inform future planning efforts by the District.
- Guide the development of future capital project design assumptions by updating wastewater flow and load projections.
- Ensure that planning outcomes align with the District’s Strategic Plan (2021).

City of Pittsburg Water Conservation Program

In 2015, the City Council adopted Resolution 15-13030 “Water Conservation Program” in response to ongoing drought conditions experienced in the state and a request from CCWD to reduce water use by 15 percent. This resolution defines ‘prohibited non-essential uses’ and outlines the four water shortage stages and their respective customer reduction goals.

In addition, the City Council adopted Resolution 15-13051 “Increase Water Rates and Establish Penalties for High Water Use” in response to the State’s emergency regulations requiring the City to reduce its total water use by 20 percent for the months of June 2015 through February 2016. This resolution defines tiered water rates for residential customers and a flat rate for all other customers, as well as the penalties for excessive use.

City of Pittsburg 2040 General Plan

Pertinent 2040 General Plan goals, policies and actions related to utilities systems, supplies, and facilities are listed below.

Water Supply and Distribution

Policy 12-P-1.4: Ensure that all new development provides for and funds a fair share of the costs for adequate water supply, storage, and distribution, including line extensions, easements, and plant expansions.

Policy 12-P-1.6: Consider the effect of incremental increases in the demands on groundwater supply and water quality when reviewing development applications.

Action 12-A-1.b: Continue to assess a water system development fee on all new commercial, industrial, residential, and other development sufficient to fund system-wide conveyance, treatment, and capacity improvements.

Water Conservation

Policy 12-P-2.1: Continue water district and user conservation efforts to help reduce demand in light of drought patterns, groundwater management, raw water availability, and the potential for unforeseen shortfalls.

Policy 12-P-2.2: Continue water conservation efforts from industrial facilities, including continued enforcement of the City's Water-efficient landscape standards and participation in a wastewater reclamation efforts.

Action 12-A-2.c: Implement the Landscape Ordinance in conjunction with use of reclaimed wastewater for landscape irrigation when feasible to help reduce potable water demand.

Wastewater Collection and Treatment

Action 12-A-3.a: Continue to assess a sanitary system development fee on all new commercial, industrial, residential, and other development sufficient to fund system-wide conveyance, treatment, and capacity improvements.

Action 12-A-3.c: Work with Delta Diablo to promote the use of recycled water for irrigation of large, planted areas, such as business/industrial campus projects, City parks, and street medians.

Solid Waste

Policy 12-P-4.5: Encourage builders to incorporate interior storage areas for recyclables into new or remodeled residential, commercial, and industrial structures.

Public Utilities

Policy 12-P-7.3: Require new and redevelopment projects to install utility lines underground, where feasible.

Policy 12-P-7.1: Require all development projects to demonstrate how storm water runoff will be detained or retained on-site and/or conveyed to the nearest drainage facility as part of the development review process, including consideration of the near-term and cumulative capacity of the system serving the drainage area, and as required by the City's NPDES Municipal Regional Permit. Project applicants shall mitigate any drainage impacts as necessary and shall demonstrate that the project will not result in any increase in off-site runoff during rain and flood events.

Policy 12-P-7.2: Assure through the City standards, including the Master Drainage Plan and development ordinances, that proposed new development (residential, commercial, or

industrial) adequately provides for on-site and downstream mitigation of potential flood hazards, including construction of required drainage improvements.

Policy 12-P-7.3: Ensure adequate minimum setbacks to reduce potential for property damage from storm flooding.

Policy 12-P-7.4: Reduce the risk of localized and downstream flooding and runoff through the use best management practices to minimize runoff from the site to the storm drainage system, including:

- High infiltration measures, including the maximization of permeable landscape,
- Using permeable surfaces for parking lots, sidewalks, and bike paths,
- Where feasible, using roof runoff as irrigation.

Policy 12-P-7.5: During the review of development plans, require all commercial projects to construct on-site retention facilities. Such facilities could be in the form of landscape features or underground swells.

Policy 12-P-7.6: Allow the construction of detention basins as mitigation in new developments. Ensure that detention basins located in residential neighborhoods, schools, or child-care facilities are surrounded by a gated enclosure, or protected by other safety measures.

Action 12-A-7.a: As part of project review and CEQA documentation, require an assessment of downstream drainage (creeks and channels) and City storm-water facilities impacted by potential project runoff and require development to include measures, including on-site improvements, to ensure that off-site runoff is not increased during rain and flood events.

City of Pittsburg Municipal Code

Chapter 13.18 (Water Conservation) of the City of Pittsburg Municipal Code (PMC) finds that the prudent use of water, and water conservation, is important to the city and the San Francisco Bay-Delta estuary system and includes mandatory prohibitions on the waste of water including:

- Permitting water to flow onto a sidewalk, driveway or street, or escape down a gutter, ditch or other service drain.
- Irrigating landscaped areas with water in excess of the minimal amount required to sustain plant life, as determined by a staff water audit.
- Failing to repair a controllable leak of water.

PMC Title 13 (Waters and Sewers), Chapter 13.20 (Industrial Waste Disposal), Chapter 13.24 (Sewer Service Charges), Chapter 13.26 (Sewer Maintenance and Repair), and Chapter 13.28 (Stormwater Management and Discharge Control) contain regulations associated with wastewater and sewer management. For example, Chapter 13.20 PMC discusses the necessity of a permit for those discharging anything except domestic sewage into the sewer system. Chapter 13.24 PMC notes that every user of water in the City whose property is connected to the sanitary sewer system shall pay

a sewer service charge. Additionally, Chapter 13.26 PMC indicates that each property owner is responsible for the installation, repair and maintenance of the sewer lateral within the owner's private property, and the City is responsible for the repair and maintenance of the sewer lateral within the public street or public easement (lower lateral) and the sewer main.

Chapter 13.28 (Stormwater Management and Discharge Control) PMC addresses stormwater and water quality. In compliance with the City's National Pollutant Elimination System (NPDES) permit, and consistent with the Porter-Cologne Water Quality Control Act, and the Federal Clean Water Act, the intent of this chapter is to protect and enhance the water quality in the City of Pittsburgh's watercourses. In addition, this chapter also requires projects to prepare a stormwater control plan and construct and implement stormwater management and discharge control measures and comply with best management practices during project construction and operation. The best management practices and standards address litter, sidewalks, maintenance of facilities and landscaped areas, and parking lots. They also note that all construction projects shall incorporate site-specific BMPs, which can be a combination of BMPs from the California BMP Handbook, Construction, January 2003, the Caltrans Stormwater Quality Handbooks, Construction Site Best Management Practices Manual, March 2003, the San Francisco Bay Regional Water Quality Control Board Erosion and Sediment Control Field Manual 2002, the city's grading and erosion control ordinance and other generally accepted engineering practices for erosion control as required by the director. It is noted that each new development project subject to the development runoff requirements will submit a stormwater control plan and implement conditions of approval that reduce stormwater pollutant discharges through the construction, operation and maintenance of treatment measures and other appropriate source control and site design measures. Projects must develop and implement a stormwater pollution prevention plan, which must include an employee training program.

PMC Title 8 (Health and Sanitation) includes the following chapters related to solid waste topics and standards: Section 8.04 (Refuse Removal and Disposal), Section 8.05 (Solid Waste Facility Regulation), and Section 8.06 (Collection of Recyclable Waste Materials). Section 8.04 sets forth a mandatory collection procedure for the periodic collection and the disposal of all refuse that accumulates within the City. Section 8.06 requires the separation and recycling of all recyclables from the solid waste generated on a premises and sets forth the process for recycling.

Chapter 8.09 (Collection of Organic Refuse) PMC serves to enforce California recycling laws and regulations, including AB 939, AB 1826, and SB 1383. The chapter requires owners or occupants of any business or residence to separate organic refuse from solid waste. The chapter also establishes a curbside organic refuse collection program serving all residences. Additionally, commercial edible food generators are required to arrange to recover the maximum amount of edible food that would otherwise be disposed.

Chapter 8.10 (Construction and Demolition Debris Recycling) PMC serves to recycle or reuse debris commonly referred to as construction and demolition (C&D) debris which consists of materials generated during construction, renovation, and demolition projects in order to meet CalRecycle requirements for recycling utilizing the California Green Building Standards Code. The chapter requires applicants to pay the building demolition permit fee and/or fees applicable to the project set forth in the master fee schedule established by the city council. The chapter also notes that the

3.14 UTILITIES AND SERVICE SYSTEMS

City will apply California Green Building Standards Code (CalGreen) standards that requires a percentage by weight of job site debris generated by most types of building project types be recycled, reused, or otherwise diverted from landfill disposal. Applicants for building, demolition, or site development permits involving any covered project are also required to complete and submit a waste management plan ("WMP").

Chapter 15.88 (Grading, Erosion and Sediment Control) of the PMC addresses grading, cut and fill operations, water runoff and soil erosion. It is the intent of this chapter to promote the conservation of natural resources, including the natural beauties of the land, streams and watersheds, hills and vegetation; to protect public health and safety, including the reduction or elimination of the hazards of earth slides, mud flows, rock falls, undue settlement, erosion, siltation and flooding, or other special conditions as described in Government Code Section 54460(b). This chapter requires that a permit first be obtained before a person may grade, fill, excavate or store or dispose of soil and earth materials or perform any other land-disturbing or land-filling activity. As part of the application, a Grading Plan, Erosion and Sediment Control Plan, and Soils and Engineering Geology Report must also be prepared and submitted.

3.14.3 THRESHOLDS OF SIGNIFICANCE

Consistent with Appendix G of the CEQA Guidelines, the project will have a significant impact on the environment associated with Utilities if it would:

1. Require or result in the relocation or construction of new or expanded water, wastewater treatment or storm water drainage, electric power, natural gas or telecommunication facilities, the construction or relocation of which could cause significant environmental effects;
2. Have insufficient water supplies available to serve the project and reasonably foreseeable future development during normal, dry and multiple dry years;
3. Result in a determination by the wastewater treatment provider which serves or may serve the Project that it has adequate capacity to serve the projects projected demand in addition to the providers existing commitments;
4. Generate solid waste in excess of State or local standards, or in excess of the capacity of local infrastructure, or otherwise impair the attainment of solid waste reduction goals; and/or
5. Comply with federal, state, and local management and reduction statutes and regulations related to solid waste.

3.14.4 IMPACTS AND MITIGATION MEASURES

Impact 3.14-1: Require or result in the relocation or construction of new or expanded water, wastewater treatment or storm water drainage, electric power, natural gas or telecommunication facilities, the construction or relocation of which could cause significant environmental effects?

WATER AND WASTEWATER FACILITIES

The Plan Area relies on an existing water conveyance facility located along the Golf Club Road and is currently served by an existing sewer collection facility that connects the abandoned Delta View Golf Course to a City owned and maintained 8-inch PVC sewer main running along Golf Club Road. Additionally, recycled water lines service the Plan Area.

The proposed Specific Plan does not directly propose the construction of, or necessitate the construction of, new domestic or recycled water facilities or wastewater conveyance facilities, which could result in significant impacts to the environment. Future development within the Plan Area would increase wastewater flows from the Plan Area, resulting in the need for additional wastewater conveyance infrastructure. It is also anticipated that additional water conveyance, including domestic and recycled water infrastructure, would be required as part of future development projects within the Plan Area.

The conceptual locations of the extensions of water and wastewater lines from existing points of connection into the Plan Area are shown in Figure 3.14-1. All of these connections are anticipated to be within the extension of Golf Club Road. Water and wastewater conveyance facilities would be evaluated for exact sizing and placement at the project-level in association with subsequent development projects. All of these facilities are planned within the Plan Area limits of disturbance and no additional impacts beyond those disclosed throughout the body of this PEIR would result.

Subsequent projects within the Plan Area would be required to complete infrastructure studies for all new domestic and recycled water and wastewater lines. Furthermore, all subsequent projects will be reviewed by the City for adequate flows and pressure. Site-specific analyses would confirm the adequacy of water and wastewater system infrastructure, pressure, and flows. Future development projects would be subject to compliance review with the General Plan policies, building code standards of the PMC, and other applicable regulations that pertain to water and wastewater utilities and building standards for plumbing design. Therefore, at the program-level of analysis, impacts associated with water and wastewater conveyance facilities would be **less than significant**.

STORMWATER AND DRAINAGE FACILITIES

Future development within the Plan Area would result in increased areas of impervious surfaces, resulting in the need for additional or expanded stormwater drainage, conveyance, and retention infrastructure. Stormwater drainage and conveyance facilities would be evaluated for exact sizing and placement at the project-level in association with subsequent development projects. As future development projects are considered, each project would be required to complete site-specific

hydrology, drainage, and stormwater studies in conjunction with project grading plan approval in conformance with Chapter 15.88 PMC (Grading, Erosion and Sediment Control). Future development projects within the Plan Area would also be subject to compliance review with the General Plan policies 12-P-7.1 through 12-P-7.6. It is assumed that all future stormwater drainage and retention facilities would be constructed within the envelopes of development established by the Specific Plan and/or within the public right-of-way of Golf Club Road. No offsite drainage and stormwater improvements are anticipated outside the Plan Area. All these facilities are planned within the Plan Area limits of disturbance, and no additional impacts beyond those disclosed throughout the body of this PEIR would result.

Furthermore, future development within the Plan Area would be subject to development impact fees as required by Chapter 13.08 PMC, which would offset the costs for maintaining, expanding and constructing new stormwater and drainage facilities. For the reasons stated above, impacts would be **less than significant**.

ELECTRICITY AND NATURAL GAS

Future development within the Plan Area would increase the demand in electricity within the Plan Area. The 2040 General Plan estimated that the potential buildout of the General Plan could increase electricity use by 755 GWh per year. This increase is only approximately 3 percent of the total electricity of Contra Costa County, which represents a small percentage of the County's overall energy usage. Therefore, based on the long-term buildout horizon of the 2040 General Plan, future capacity would be available to serve anticipated development projected by the General Plan, including the Plan Area.

Extensions of electrical lines would be required to serve future development within the Plan Area. Extensions of these lines would connect to existing PG&E lines located along the eastern Plan Area boundary within the existing PG&E right-of-way. Future electrical line extensions are anticipated to be located within the future right-of-way of Golf Club Road. The exact sizing and placement would be determined at the project-level in association with subsequent development projects. Additionally, a new PG&E substation and switching yard is proposed in conjunction with the Phase I project, assumed to be a data center. All of these facilities are anticipated to be within the Plan Area limits of disturbance, and no additional impacts beyond those disclosed throughout the body of this PEIR would result. No natural gas lines would be extended to the Plan Area.

Should future development require ancillary energy generating facilities, each would undergo site-specific environmental analysis, as applicable. Therefore, buildout of the Plan Area would result in a **less than significant** impact.

TELECOMMUNICATIONS

There is no existing telecommunications infrastructure in the Plan Area. Telecommunication services, including fiber lines, would be extended to serve future development, as applicable. This may involve the extension of services or new services from providers not currently present near the Plan Area; however, the construction of substantial new telecommunication infrastructure is not anticipated to be required outside the Plan Area. All these facilities are anticipated within the Plan

Area limits of disturbance, and no additional impacts beyond those disclosed throughout the body of this PEIR would result. Impacts would be **less than significant**.

CONCLUSION

As described above, buildout of the Plan Area would not result in or require the construction of new utility facilities, which would cause significant environmental impacts. Future development projects within the Plan Area would be subject to development impact fees at the time of building permit issuance. Onsite utilities would be analyzed on a project-level basis and site-specific analyses would be conducted to ensure adequacy of the existing utility system. Therefore, the proposed project would result in a **less than significant impact**, and no mitigation is required.

Impact 3.14-2: Would the project have sufficient water supplies available to serve the project and reasonably foreseeable future development during normal, dry and multiple dry years? (Less than Significant)

Based on the following assumptions, SB 610 applies to the proposed project and thus, a Water Supply Assessment (WSA) was prepared for the proposed project:

1. The proposed project is subject to CEQA and an EIR is required.
2. The proposed project, with up to 887,086 square feet of proposed industrial or industrial park land uses, meets the definition of a “Project” as specified in Water Code section 10912(a) paragraph (5) as defined for industrial development.
3. The proposed project has not been the subject of a previously adopted WSA and has not been included in an adopted WSA for a larger project.

The City’s 2015 Water Master Plan was used to estimate the water demand for buildout of the Plan Area. A conservative demand factor for commercial development (1700 gal/day/gross acre) was used for buildout of the Plan Area. The planning horizon for the buildout of the Plan Area is anticipated to range from 2027 to 2040. The total water needed for future buildout of the Plan Area is expected to be 169.15 acre-feet/year (AFY). Table 3.14-5 below is from the Pittsburg 2020 UWMP and provides the projected water demands for the City through the 2045 planning horizon. The initial increase through year 2030 is based on permitted and planned projects. Growth past 2030 assumes an annual increase of 1.5 percent. The projected 169.15 AFY demand for buildout of the Plan Area is within the total estimated increase in water demand over the planning period.

TABLE 3.14-5: 2020 UWMP PROJECTED WATER DEMAND

	ACTUAL (AFY)	PROJECTED WATER USE (AFY)				
	2020	2025	2030	2035	2040	2045
Single Family	4,399	5,256	5,732	6,175	6,587	7,026
Multi-Family	1,184	1,415	1,543	1,662	1,773	1,891
Commercial	479	572	624	672	717	765
Industrial	889	1,062	1,158	1,248	1,331	1,420
Institutional/Governmental	152	181	198	213	227	242
Landscape	915	1,093	1,192	1,284	1,370	1,461
Other (Hydrant Meters)	23	28	30	33	35	37
Losses	1,192	1,424	1,553	1,673	1,784	1,903
Total	9,233	11,031	12,030	12,960	13,824	14,745

The 2020 UWMP indicates that the City is capable of meeting the water demands of its customers between 2025 and 2045. To further ensure availability of water supplies, will-serve letters will be required in conjunction with each subsequent phase of development. Therefore, it can be assumed that buildout of the Plan Area would have sufficient water supplies to serve future development. A **less than significant impact** would occur, and no mitigation is required.

Impact 3.14-3: Would the project result in a determination by the wastewater treatment provider which serves or may serve the project that it has adequate capacity to serve the project's projected demand in addition to the provider's existing commitments? (Less than Significant)

As previously described, the City owns and maintains the local sewer collection system that serves the Plan Area. The City's wastewater is conveyed to Delta Diablo facilities for treatment. Delta Diablo adopted and updated a district Master Plan (2022), which includes a phased treatment plant expansion project to ultimately provide 24.0 mgd (average dry weather flow) capacity in order to accommodate anticipated population growth for the communities of Pittsburg, Antioch, and unincorporated Bay Point. The Master Plan requires that Delta Diablo continue to implement phased improvements to some pump stations, sewer mains, and the various wastewater treatment plants when triggered by growth.

Therefore, it is anticipated that there would be adequate capacity for buildout of the Plan Area. However, each phase of development within the proposed Specific Plan would be required to evaluate wastewater generation at the project-level and obtain will-serve letters from Delta Diablo. At this time, it would be determined whether capacity for wastewater treatment exists or whether a project would result in the need for expanded treatment facilities.

Should the construction of new facilities be required to meet future demands, each development project would undergo site-specific environmental analysis, as applicable. Furthermore, to help offset the costs and ensure the City retains adequate water and wastewater service facilities, such as capacity at the water treatment plant and pump stations, development projects would be subject

to impact fees at the time of building permit issuance for each future phase of development. Therefore, at the program-level of analysis, impacts associated with wastewater treatment would be **less than significant**.

Impact 3.14-4: Would the project generate solid waste in excess of State or local standards, or in excess of local infrastructure, or otherwise impair the attainment of solid waste reduction goals? (Less than Significant)

Buildout of the Plan Area would not require demolition of existing structures, as the Plan Area is currently vacant.

Future development within the Plan Area is estimated to generate 14,345 pounds or approximately seven tons of solid waste per day, as shown in Table 3.14-6 below. The Keller Canyon Landfill is permitted to accept up to 3,500 tons of solid waste per day and has a remaining capacity of 63,408,410 cubic yards. Therefore, the Keller Canyon Landfill has sufficient capacity to serve future development. Implementation of the Specific Plan would not generate solid waste in excess of State or local standards, nor would it require an expansion of landfill capacity; therefore, impacts would be **less than significant**.

TABLE 3.14-6: ESTIMATED SOLID WASTE GENERATION

<i>LAND USE</i>	<i>BUILDOUT (SQ FT)</i>	<i>SOLID WASTE GENERATION RATE (PPD)</i>	<i>SOLID WASTE GENERATION (PPD)</i>
Phase I PDC	347,740	1.4 per 100 sq ft	4,938
Manufacturing/Industrial	608,894	1.42 per 100 sq ft	8,646
Commercial	152,224	5 per 1,000 sq ft	761
Total			14,345

SOURCE: CALRECYCLE "ESTIMATED SOLID WASTE GENERATION RATES".

[HTTPS://WWW2.CALRECYCLE.CA.GOV/WASTECHARACTERIZATION/GENERAL/RATES](https://www2.calrecycle.ca.gov/WasteCharacterization/General/Rates)

Impact 3.14-5: Would the project comply with federal, state, and local management and reduction statutes and regulations related to solid waste? (Less than Significant)

As previously described, Assembly Bill (AB) 341 requires cities and counties in California to divert 75 percent of solid waste from landfills to help reduce greenhouse gas emissions. AB 341 requires all businesses that generate four cubic yards or more of commercial solid waste per week shall arrange for recycling services. Businesses can take one or any combination of the following in order to reuse, recycle, compost or otherwise divert solid waste from disposal:

- Self-haul.
- Subscribe to a hauler(s).
- Arrange for the pickup of recyclable materials.
- Subscribe to a recycling service that may include mixed waste processing that yields diversion results comparable to source separation.

3.14 UTILITIES AND SERVICE SYSTEMS

SB 1383 makes it mandatory for all residences and businesses to recycle their organic refuse weekly, which can include donating surplus food, to divert organic material from going to the landfill.

As discussed above, Chapter 8.10 (Construction and Demolition Debris Recycling) PMC serves to recycle or reuse C&D debris in order to meet CalRecycle requirements for recycling utilizing the California Green Building Standards Code. The chapter requires applicants to pay the building demolition permit fee and/or fees applicable to the proposed project set forth in the master fee schedule established by the city council. Applicants for building, demolition, or site development permits involving any covered project are also required to complete and submit a waste Management Plan (WMP).

Furthermore, future development within the Plan Area would be required to comply with the City's recycling regulations to help the City meet state requirements, which include instruction on the storage and discarding of recyclable refuse as detailed in Chapter 8.06 PMC. All future development would be required to comply with federal, state and local regulations pertaining to solid waste. By complying with these requirements, the proposed project would not impair the attainment of solid waste reduction goals. Therefore, impacts would be **less than significant**, and no mitigation is required.

This section of the Program Environmental Impact Report (PEIR) provides a background discussion of the hazards associated with wildfires in the Pittsburg Technology Park Specific Plan project (proposed Specific Plan; proposed project) area (Plan Area). The section also evaluates the proposed project's potential to exacerbate wildfire hazards. The section is organized with an existing setting, regulatory setting, and impact analysis. The discussion of fire suppression resources is located within Chapter 3.12, *Public Services and Recreation*, of this PEIR. Information used in this section is from the following documents.

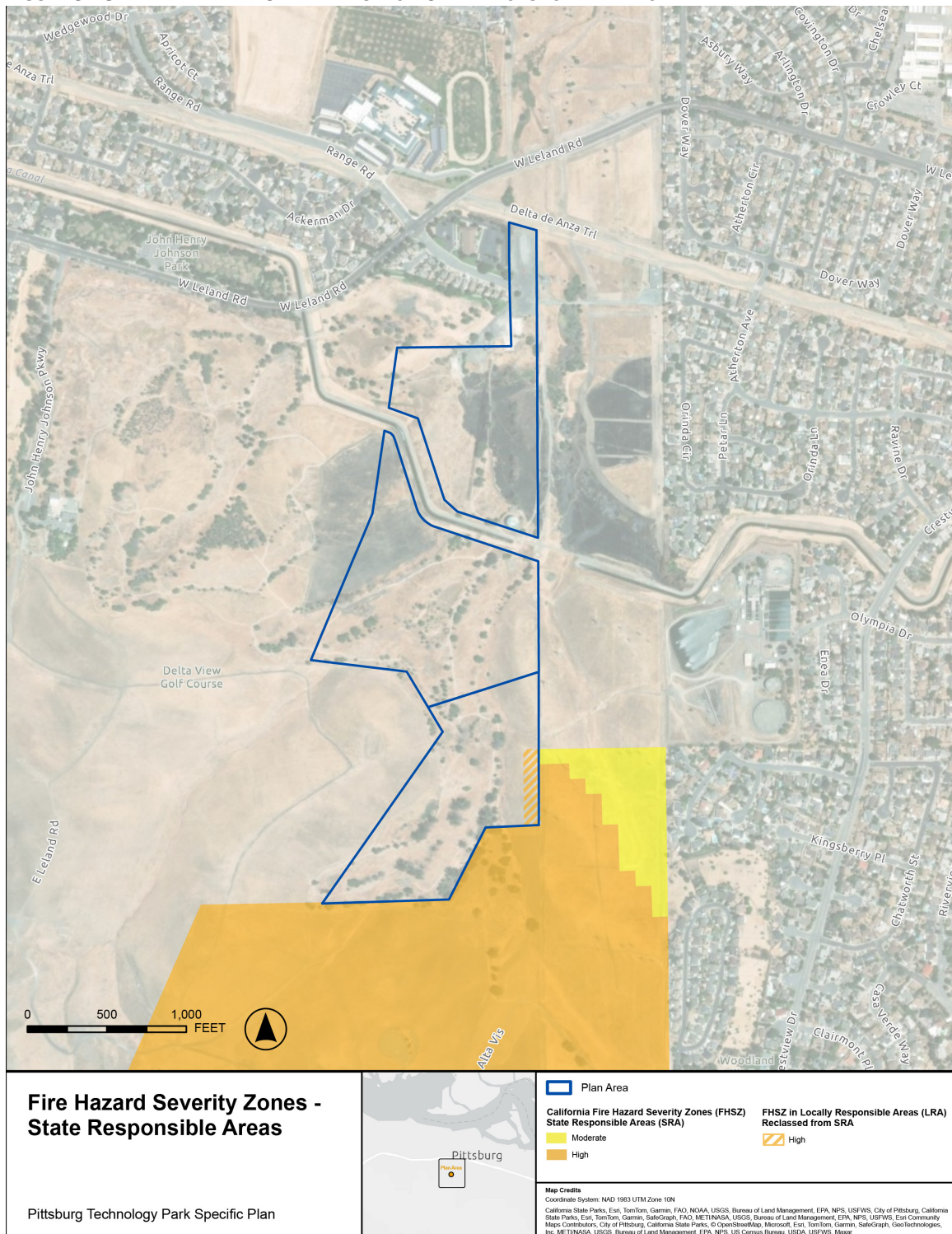
- Vollmar Natural Lands Consulting. March 2024. *Biological Evaluation Report, Pittsburg Technology Park Specific Plan*. (Appendix E).
- WSP USA. January 2023. *Geotechnical Due Diligence Report, Pittsburg Technology Center*. (Appendix G)
- City of Pittsburg. *Pittsburg 2040 General Plan Draft Environmental Impact Report*. December 2023.

3.15.1 ENVIRONMENTAL SETTING

FIRE HAZARD SEVERITY ZONES

The state has charged the California Department of Forestry and Fire Protection (CalFire) with the identification of Fire Hazard Severity Zones (FHSZ) within State Responsibility Areas (SRAs). The SRA is the area of the state where the State of California is financially responsible for the prevention and suppression of wildfires. SRA does not include lands within city boundaries or in federal ownership. FHSZs rate areas for wildfire using categories of "moderate," "high," or "very high" based on fuel loading, slope, weather, and other relevant factors. In addition, CalFire must classify Very High Fire Hazard Severity Zones (VHFHSZs) identified within any Local Responsibility Areas (LRAs). LRAs are incorporated cities, urban regions, agriculture lands, and portions of the desert where the local government is responsible for wildfire protection. This is typically provided by city fire departments, fire protection districts, counties, and by CalFire under contract. The FHSZ maps are used by the State Fire Marshall as a basis for the adoption of applicable building code standards.

As shown in Figure 3.15-1, a small area of approximately 1.08 acres in the southeast portion of the Plan Area is located within an LSA and categorized as a "high" FHSZ. No portions of the Plan Area are categorized as a VHFHSZs by CalFire.

FIGURE 3.15-1. FIRE HAZARD SEVERITY ZONES – STATE RESPONSIBLE AREAS

FIRE THREAT AREAS

CalFire's Fire Threat Model identifies fire threats using fuel rank, which is a ranking system developed by CalFire that incorporates four wildfire factors: fuel model, slope, ladder index, and crown index, and modeled characteristics regarding fire probability and behaviors.

The U.S. Forest Service has developed a series of fuel models, which categorize fuels based on burn characteristics. These fuel models help predict fire behavior. In addition to fuel characteristics, slope is an important contributor to fire hazard levels. A surface ranking system has been developed by CalFire, which incorporates the applicable fuel models and slope data. The model categorizes slope into six ranges: 0 to 10 percent, 11 to 25 percent, 26 to 40 percent, 41 to 55 percent, 56 to 75 percent, and greater than 75 percent. The combined fuel model and slope data are organized into three categories, referred to as surface rank. Thus, surface rank reflects the quantity and burn characteristics of the fuels and the topography in a given area.

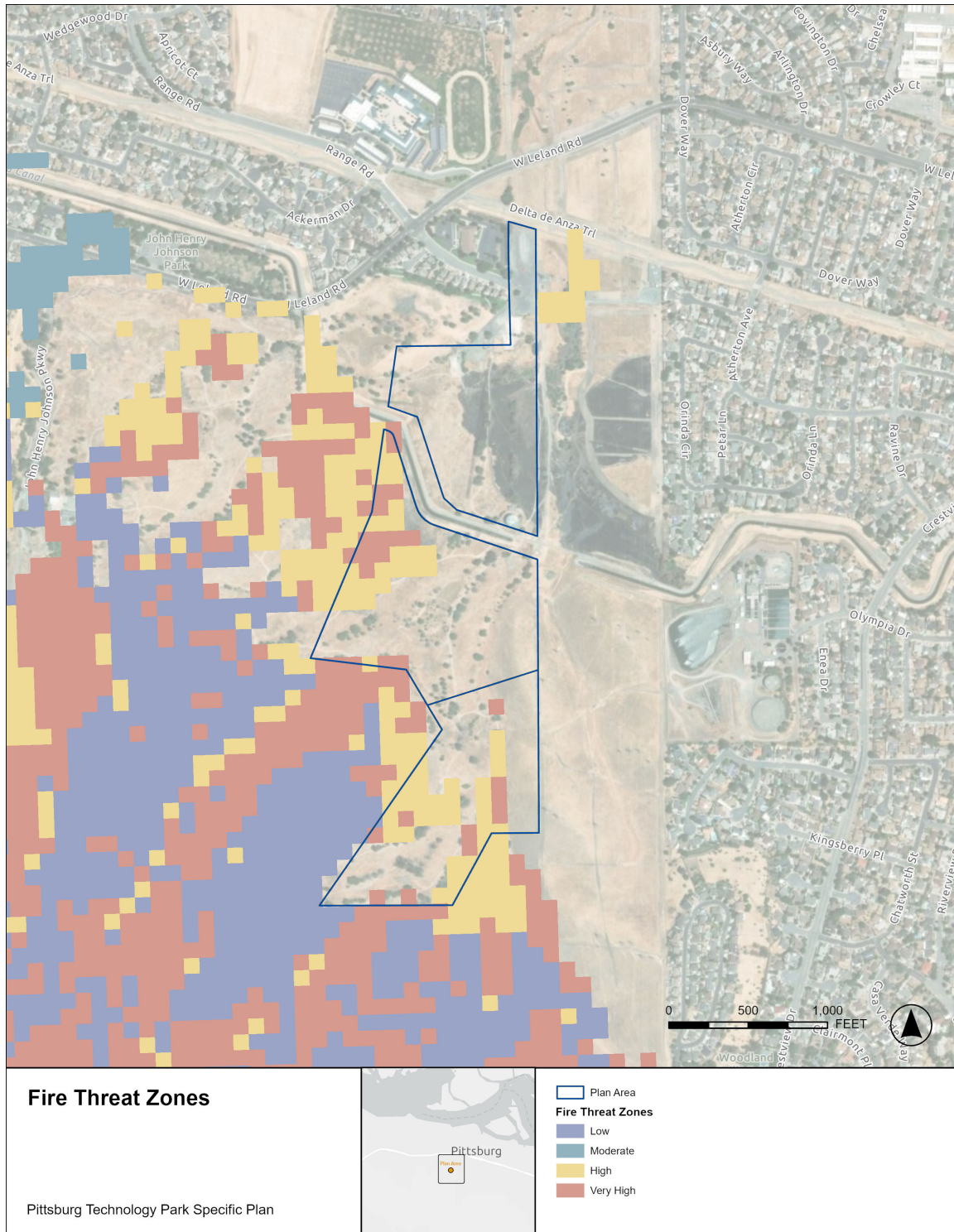
The ladder index is the distance from the ground to the lowest leafy vegetation for tree and plant species. The crown index is a reflection of the quantity of leafy vegetation present within individual specimens of a given species.

The surface rank, ladder index, and crown index for a given area are combined in order to establish a fuel rank of medium, high, or very high. Fuel rank is used by CalFire to identify areas in the California Fire Plan where large, catastrophic fires are most likely.

The fuel rank data are used by CalFire to delineate fire threat based on a system of ordinal ranking. Thus, the Fire Threat model creates discrete regions, which reflect fire probability and predicted fire behavior. The four classes of fire threat range from moderate to extreme.

As shown in Figure 3.15-2, the Plan Area contains approximately 11.4 acres with "high" fire threats, and approximately 5.19 acres of "very high" fire threats. "Very high" fire threats are located throughout the Plan Area, where there tends to be a greater amount of combustible vegetation and where slopes are greater. CalFire data for the areas immediately south, northeast, and west of the Plan Area also include "high" and "very high" fire threats.

FIGURE 3.15-2. FIRE THREAT ZONES



WILDFIRE-CONDUCTIVE CONDITIONS

A fire environment is defined as the “surrounding conditions, influences, and modifying forces that determine fire behavior”. The four components that affect fire behaviors are fuels (i.e., vegetation, buildings, etc.), weather, topography, and human behavior.

Weather and topography cannot be significantly altered to reduce fire hazard. Terrain also has a strong influence within the fire environment and can be carefully assessed when designing fire hazard reduction treatments for minimizing potential impacts. “Aspect” has a strong bearing on the type of vegetation present, temperature, and moisture regime of the soil and vegetation. Slope steepness is important since fire behavior usually increases with steepness. The rate of wildfire spread due to slope and wind is generally proportional to the grade upslope and wind speed and associated location downwind. Slope position (ridge, valley, saddle, draw, etc.) is also a key consideration when planning fire prevention measures. For example, additional defensible space may be necessary and required where slopes are steep and if positioned on a warm southerly aspect.

The Plan Area consists of rolling hills along the lower slopes of the eastern Los Medanos Hills in the City of Pittsburg. Elevation within the Plan Area ranges from approximately 68 feet to 290 feet above sea level, trending upward in elevation from the northeast to the southwest. The Plan Area is surrounded by rising hillsides to the west, south and east consisting of undisturbed natural ground with maximum inclinations on the order of 15 to 20 degrees from horizontal.

Following the closure of the golf course in 2018, previously managed areas have been colonized by dense and tall stands of invasive weeds. Portions of the Plan Area that were never maintained as golf course grounds are also fairly disturbed, either due to the planting of stands of exotic trees and shrubs, or due to a complete lack of grazing or other forms of management. Steeper slopes within the fenced portion of the Plan Area feature semi-natural habitats, with scattered planted trees and un-grazed annual grassland. The grazed areas outside the fencing that surrounds the Plan Area to the south and southwest are dominated by non-native grasses and forbs, although, there are some localized areas of native wildflowers.

The climate of the Plan Area and surrounding vicinity is characterized as “Mediterranean,” with cool, wet winters and warm, dry summers as well as high inter- and intra-annual variability in precipitation. On average, nearly 98 percent of precipitation occurs during the “wet season,” from October through May.

WILDLAND URBAN INTERFACE

A wildland urban interface (WUI) is any area where structures and other human developments meet or intermingle with wildland vegetative fuels—the shrubs, trees and grasses. These plants and wildland areas have evolved over time to burn. Developments in the WUI exacerbate fire occurrence and fire spread in several ways:

- Increased numbers of human-caused wildfires.
- Wildfires become harder to fight.

- Firefighting resources are diverted from containment to protecting lives and homes.
- Letting natural fires burn becomes impossible, leading to build-up of fuel and increasing wildfire hazard further.
- Increased fire frequency tends to eliminate native shrubs, which are replaced by weedy, highly flammable annual grasslands.

All 22.05 acres of Phase I of the Plan Area is located within a WUI zone.

Fire threat determination is a combination of two factors: 1) fire frequency, or the likelihood of a given area burning, and 2) potential fire behavior (hazard). These two factors are combined to create four threat classes ranging from moderate to extreme. Fire threat can be used to estimate the potential for impacts on various assets and values susceptible to fire. Impacts are more likely to occur and/or be of increased severity for the higher threat classes.

POST-FIRE SLOPE INSTABILITY

Post-fire slope instability results from fires burning vegetation, roots, and organic compounds, which reduces soil protection, enhances water repellency, and compromises soil stability. Fires have the potential to bake soil into a hard crust that easily repels water. Additionally, fires destroy vegetation that would slow and absorb rainfall and whose roots would help to stabilize soil. The burning of vegetation and soil on slopes more than doubles the rate that water will run off into watercourses. The combined effect of fire and the occurrence of heavy rainfall in the post-fire season can lead to highly destructive debris flows with impacts to downhill resources.

Post-fire debris flows are particularly hazardous because they can occur with little warning, exert great impulsive loads on objects in their paths, strip vegetation, block drainage ways, damage structures, and endanger human life.

Debris flows differ from mudflows in that debris flows are composed of larger particles. Additionally, it takes much less rainfall to trigger debris flows from burned areas than from unburned areas. In Southern California, as little as 0.3 inch of rainfall in 30 minutes has triggered debris flows, and any storm that has intensities greater than about 0.4 inch per hour can produce debris flows.

3.15.2 REGULATORY SETTING

FEDERAL

Disaster Mitigation Act (2000)

Section 104 of the Disaster Mitigation Act of 2000 (Public Law 106-390) enacted Section 322, Mitigation Planning of the Robert T. Stafford Disaster Relief and Emergency Assistance Act, which created incentives for state and local entities to coordinate hazard mitigation planning and implementation efforts and is an important source of funding for fuels mitigation efforts through hazard mitigation grants.

National Incident Management System (NIMS)

The City adopted NIMS, which provides a systematic, proactive approach to guide government agencies, nongovernmental organizations, and the private sector to work together to prevent, respond to, recover from, and mitigate the effects of incidents, regardless of cause, size, location, or complexity, in order to reduce the loss of life and property and harm to the environment. NIMS improves the City's ability to prepare for and respond to potential incidents and hazard scenarios.

National Fire Plan (NFP) 2000

The summer of 2000 marked a historic milestone in wildland fire records for the United States. Dry conditions across the western United States led to destructive wildfire events on an estimated 7.2 million acres, nearly double the 10-year average. Costs in damages including fire suppression activities were approximately 2.1 billion dollars. Congressional direction called for substantial new appropriations for wildland fire management. This resulted in action plans, interagency strategies, and the Western Governor's Association's "A Collaborative Approach for Reducing Wildland Fire Risks to Communities and the Environment – A 10-Year Comprehensive Strategy - Implementation Plan", which collectively became known as the National Fire Plan. This plan places a priority on collaborative work within communities to reduce their risk from large-scale wildfires.

Healthy Forest Initiative 2002/Healthy Forest Restoration Act 2003

In August 2002, the Healthy Forests Initiative (HFI) was launched with the intent to reduce the severe wildfires risks that threaten people, communities, and the environment. Congress then passed the Healthy Forests Restoration Act (HFRA) on December 3, 2003, to provide the additional administrative tools needed to implement the HFI. The HFRA strengthened efforts to restore healthy forest conditions near communities by authorizing measures such as expedited environmental assessments for hazardous fuels projects on federal land. This HFRA emphasized the need for federal agencies to work collaboratively with communities in developing hazardous fuel reduction projects and places priority on fuel treatments identified by communities themselves in their Community Wildfire Protection Plans.

Department of the Interior Department Manual Part 620

Wildland Fire Management, Part 620 of the Department of the Interior Departmental Manual, pertains to wildland fire management policies, with the goal of providing an integrated approach to wildland fire management. The guiding principles of the plan emphasize the need for public health and safety considerations, risk management protocols, inter-agency collaboration, and economic feasibility of wildfire management practices, as well as the ecological role of wildfires.

STATE

California Strategic Fire Plan

The California Strategic Fire Plan is a strategic document, which guides fire policy for much of California. The plan is aimed at reducing wildfire risk through pre-fire mitigation efforts tailored to local areas through assessments of fuels, hazards, and risks.

CalFire Santa Clara Unit Strategic Fire Plan

The CalFire Santa Clara Unity Strategic Fire Plan, updated in March 2023, is the most current document that assesses the wildland fire situation throughout the State Responsible Area within CalFire jurisdiction. The Plan was created to assess the fire situation in the Unit and identifies strategic targets for pre-fire solutions within the five counties (Santa Clara, Alameda, Contra Costa, San Joaquin, and Stanislaus) of the CalFire Santa Clara Unit.

California State Multi-Hazard Mitigation Plan

The purpose of the State Multi-Hazard Mitigation Plan (SHMP) is to significantly reduce deaths, injuries, and other losses attributed to natural- and human-caused hazards in California. The SHMP provides guidance for hazard mitigation activities emphasizing partnerships among local, state, and federal agencies as well as the private sector.

California Public Resource Code

The State's Fire Safe Regulations are set forth in Public Resources Code Section 4290, which include the establishment of SRAs. An SRA is the area where the State of California is financially responsible for the prevents and suppression of wildfires. An SRA does not include lands within city boundaries or in federal ownership. Areas in federal ownership are under Federal Responsibility Areas (FRA), and areas within city boundaries are included in LRAs.

Public Resources Code Section 4291 sets forth defensible space requirements, which are applicable to anyone that ...owns, leases, controls, operates, or maintains a building or structure in, upon, or adjoining a mountainous area, forest-covered lands, brush-covered lands, grass-covered lands, or land that is covered with flammable material (Section 4291(a)). These requirements include:

- Maintenance of defensible space of 100 feet from each side and from the front and rear of the structure, not beyond the property line except as required by state law, local ordinance, rule, or regulation;
- An insurance company that insures an occupied dwelling or occupied structure may require a greater distance than that required under paragraph (1) if a fire expert, designated by the director, provides findings that the clearing is necessary to significantly reduce the risk of transmission of flame or heat sufficient to ignite the structure, and there is no other feasible mitigation measure possible to reduce the risk of ignition or spread of wildfire to the structure.
- Removal of the portion of a tree that extends within 10 feet of the outlet of a chimney or stovepipe;
- Maintenance of a tree, shrub, or other plant adjacent to or overhanging a building free of dead or dying wood;
- Maintenance of the roof of a structure free of leaves, needles, or other vegetative materials;
- Prior to constructing a new building or structure or rebuilding a building or structure damaged by a fire in an area subject to this section, the construction or rebuilding of which requires a building permit, the owner shall obtain a certification from the local building

official that the dwelling or structure, as proposed to be built, complies with all applicable state and local building standards.

Assembly Bill 337

Per AB 337, local fire prevention authorities and the California Department of Forestry and Fire Protection (CalFire) are required to identify “Very High Fire Hazard Severity Zones (VHFHSZ) in Local Responsibility Areas (LRA). Standards related to brush clearance and the use of fire-resistant materials in fire hazard severity zones are also established.

California Fire Code

The California Fire Code establishes standards related to the design, construction, and maintenance of buildings. The standards set forth in the California Fire Code range from designing for access by firefighters and equipment and minimum requirements for automatic sprinklers and fire hydrants to the appropriate storage and use of combustible materials.

California Code of Regulations Title 8

In accordance with California Code of Regulations Title 8, Sections 1270 and 6773 (*Fire Prevention and Fire Protection and Fire Equipment*), the Occupational Safety and Health Administration (Cal OSHA) establishes fire suppression service standards. The standards range from fire hose size requirements to the design of emergency access roads.

California Code of Regulations Title 14 (Natural Resources)

Division 1.5 (Department of Forestry and Fire Protection), Title 14 of the CCR establishes a variety of wildfire preparedness, prevention, and response regulations.

California Code of Regulations Title 19 (Public Safety)

Title 19 of the CCR establishes a variety of emergency fire response, fire prevention, and construction and construction materials standards.

California Code of Regulations Title 24 (CA Building Standards Code)

The California Fire Code is set forth in Part 9 of the Building Standards Code. The California Fire Code, which is pre-assembled with the International Fire Code by the International Code Council, contains fire-safety building standards referenced in other parts of Title 24.

California Health and Safety Code and UBC Section 13000 et seq.

State fire regulations are set forth in Section 13000 et seq. of the California Health and Safety Code, which is divided into “Fires and Fire Protection” and “Buildings Used by the Public.” The regulations provide for the enforcement of the California Fire Code and mandate the abatement of fire hazards. The Health and Safety Code establishes broadly applicable regulations, such as standards for buildings and fire protection devices, in addition to regulations for specific land uses, like as childcare facilities and high-rise structures.

California Public Utilities Commission (CPUC) General Order 95

CPUC General Order (GO) 95 regulates all aspects of design, construction, and operation and maintenance of overhead electrical power lines and fire safety hazards for utilities subject to its jurisdiction. GO 165 imposes inspection requirements for transmission and distribution lines and GO 166 requires emergency response procedures to respond to electric system failures, major outages, or hazards posed by damage to electric utility facilities. Rule 11 enables electric utilities to suspend customer service when minimum vegetation clearance requirements are not met. In addition to updating various GO 95 requirements and ordering further study, the decision called for creation by the CPUC of a High Fire-Threat District (HFTD) map identifying zones of high hazard, elevated risk and extreme risk for destructive utility-associated wildfires.

On December 21, 2017, the CPUC issued its Decision Adopting Regulations to Enhance Fire Safety in the High Fire Threat District, adding statewide HFTD map requirements to GO 95 and enhancing GO 95's fire safety regulations within HFTD areas. (Decision 17-12-024.) As described in the CPUC's HFTD) maps the City of Pittsburg is within Tier 2 – Elevated, and Tier 3 – Extreme risk for destructive utility-associated wildfires.

California Public Utilities Code Section 8367 et seq.

State regulations relating to wildfire mitigation are set forth in Section 8387 of the California Public Utilities Code. The regulations provide that each local publicly owned electric utility and electrical cooperative shall construct, maintain, and operate its electrical lines and equipment in a manner that will minimize the risk of wildfire posed by those electrical lines and equipment. The local publicly owned electric utility or electrical cooperative is also required to prepare a wildfire mitigation plan.

LOCAL

City of Pittsburg 2040 General Plan

The 2040 General Plan embodies several ideas and principles applicable to the wildfire impacts of future buildout of the Plan Area, including:

Urban Design

Action 4-A-2.b: Landscape Design: Use sturdy, native species to maximize water conservation, fire resistance, and erosion control in landscape design.

Circulation & Transportation

Policy 7-P-1.6: Design streets to operate with vehicle speeds that are safer for all users, especially pedestrian and bicyclists, while providing adequate access for emergency vehicles. Speed reductions strategies should include reduced lane widths and application of traffic calming measures on local and collector streets and especially near parks, schools, trails, and in the Downtown core.

Safety & Resiliency

Policy 11-P-1.1: Ensure Pittsburg is prepared to effectively respond to any emergency or disaster, including flooding, fire, hazardous material releases, and seismic activity, in cooperation with other public agencies and appropriate organizations.

Policy 11-P-1.10: Require development to provide additional access roads when necessary to provide for safe access of emergency equipment and civilian evacuation concurrently.

Action 11-A-1.c: Improve local evacuation capacity through maintaining City roadways, emergency access, and evacuation routes, and provide signage to clearly identify emergency access and evacuation routes.

Community Facilities

Policy 12-P-6.2: Require adequate road widths, turnarounds, and emergency access development projects for fire response trucks.

Policy 12-P-6.3: Require development in areas of high fire hazard to be designed and constructed to minimize potential losses and maximize the ability of fire personnel to suppress fire incidents.

Policy 12-P-6.4: Require existing and new development in or adjacent to high and very high fire hazard severity zones, wildland urban interface zones, and State Responsibility Areas to maintain defensible space zones, landscape using native, fire-resistant plants and fire-resistant materials, abate weeds, and, where feasible, harden structures and infrastructure against fires.

Action 12-A-6.b: Continue to enforce the California Building Code and the California Fire Code, with amendments to address local conditions, to ensure that all construction and development implements fire-safe techniques, including fire resistant materials, where required.

City of Pittsburg Municipal Code

Chapter 15.20 of the City of Pittsburg Municipal Code (PMC), California Fire Code, adopts and enacts the 2022 California Fire Code (California Code of Regulations, and Appendix Chapter 1, Administration, Title 24, Part 9 (based on the 2021 International Fire Code published by the International Code Council)). This section includes defensible space and brush management regulations.

Chapter 15.92 PMC, Community Facility Fees – Fire Protection Facilities, provides a method for financing fire protection facilities required by the goals and policies of the general plan and necessitated by the needs of new construction and development for adequate fire protection facilities and services. Pursuant to Chapter 15.92 PMC, a fire protection facilities fee shall be paid as

a condition precedent to the issuance of a building permit for new construction. The fee shall be in the amount established by resolution of the city council.

PMC Section 18.84.315, Additional Landscape Design Standards – States that plant material in developments shall be selected for energy efficiency, taking into account color, form, and pattern, as well as solar access and allowances for solar heat gain of buildings in winter and shading of buildings in summer. Furthermore, there must be considerations for the reduction of the heat island effect, particularly in parking lots and on roadways, as well as soil retention and fire resistance. The overall landscape plan must be integrated into all elements of the project, including buildings, structures, parking lots, and streets, to achieve a desirable microclimate, minimize energy demands, and ensure resilience to fire hazards.

City of Pittsburg Hazard Mitigation Plan

The City of Pittsburg Hazard Mitigation Plan (HMP) was prepared in order to assess the natural, technological, and human-caused risks to Pittsburg so as to reduce the potential impact of the hazards by creating mitigation strategies. The HMP was updated in 2022. The 2022 HMP represents the City of Pittsburg’s commitment to create a safer, more resilient, community by taking actions to reduce risk and by committing resources to lessen the effects of hazards on the people and property of Pittsburg. The HMP complies with the Federal Disaster Mitigation Act (2000), Federal Register 44 CFR Parts 201 and 206. The Pittsburg City Manager’s Office and Police Department has coordinated preparation of the HMP in cooperation with other Pittsburg departments, community stakeholders, partner agencies, and members of the public. The HMP addresses hazards and risks associated with releases of hazardous materials, including incidents associated with refineries and chemical plants and establishes a Mitigation Action Plan to reduce risks and inform the City’s response to disasters.

City of Pittsburg Emergency Operations Plan

The City of Pittsburg Emergency Operations Plan (EOP), adopted in 2018, is the official City emergency management document that guides the emergency response and assigns the roles and responsibilities of departments, units, and individuals during emergencies. The EOP establishes the organizational structure, policies, and procedures for the City’s emergency response, including:

- Methods for carrying out emergency operations;
- The process for rendering mutual aid;
- Emergency services of local, state, and federal agencies;
- How resources are mobilized;
- Emergency public information; and
- Continuity of government.

As required by Government Code 8607, the Pittsburg EOP uses the Standardized Emergency Management System and the National Incident Management System for coordination of multi-agency or multi-jurisdictional emergencies.

Contra Costa County Emergency Operations Plan

The Contra Costa County Emergency Operations Plan (EOP) provides the basis for a coordinated response before, during, and after an emergency affecting Contra Costa County. The EOP establishes emergency organization, assigns tasks, specifies policies and general procedures, and provides for the coordination of planning efforts of the various emergency staff and service elements in the Operational Area. The EOP facilitates multi-jurisdictional and interagency coordination in emergency operations and is designed to be utilized in coordination with applicable local, State and federal contingency plans. It also establishes the organizational framework of the California Standardized Emergency Management System (SEMS) and the National Incident Management System (NIMS) within Contra Costa County.

3.15.3 THRESHOLDS OF SIGNIFICANCE

Consistent with Appendix G of the CEQA Guidelines, the proposed project would have a significant impact related to wildfire, if located in or near state responsibility areas or lands classified as very high fire hazard severity zones, if it would:

- Substantially impair an adopted emergency response plan or emergency evacuation plan.
- Due to slope, prevailing winds, and other factors, exacerbate wildfire risks, and thereby expose project occupants to pollutant concentrations from a wildfire or the uncontrolled spread of a wildfire.
- Require the installation or maintenance of associated infrastructure (such as roads, fuel breaks, emergency water sources, power lines or other utilities) that may exacerbate fire risk or that may result in temporary or ongoing impacts to the environment.
- Expose people or structures to significant risks, including downslope or downstream flooding or landslides, as a result of runoff, post-fire slope instability, or drainage changes.

It is noted that there are no areas identified as VHFHSZs in the Plan Area. However, areas within Phase III of the proposed Specific Plan are within SRAs. Consistent with Appendix G of the CEQA Guidelines, the following impact discussion focuses on the impacts related to sections in the Plan Area which are located within an SRA.

3.15.4 IMPACTS AND MITIGATION MEASURES

Impact 3.15-1: Substantially impair an adopted emergency response plan or emergency evacuation plan (Less than Significant)

As previously stated, the City's HMP evaluates various risks including natural, technological, and human-induced, to minimize their potential impact through mitigation strategies. The City's EOP details its response procedures in a significant emergency or disaster and outlines the procedures in place for establishing evacuation routes in the case of a fire hazard. Due to every evacuation scenario having some level of unique challenge, constraint, and fluid condition that requires interpretation, fast decision making, and alternatives, no specific evacuation routes for fire are identified.

The proposed Specific Plan includes requirements for providing adequate emergency access to and from the Plan Area. For example, Section 6.7 of the proposed Specific Plan states that future development will provide two emergency vehicle access (EVA) roads and that fire access within the Plan Area will adhere to the Contra Costa County Fire Protection Department (CCCFPD) Fire Prevention Standards.

The CCCFPD's Fire Prevention Standards state that fire apparatus access roadways shall be provided for all facilities and buildings. This fire apparatus access shall extend to within 150 feet of all portions of the facility and the exterior walls of the first story of a building. New buildings require a Fire District review for access compliance before project approval. These measures align with established fire prevention standards and ensure efficient emergency vehicle access rather than impairing an adopted emergency response or evacuation plan.

Furthermore, future development would be subject to all applicable City regulations, reviews, and requirements pertaining to emergency response, emergency access, and maintaining emergency evacuation routes, as well as further CEQA analysis of project-specific impacts.

Additional site design components described in the proposed Specific Plan, such as the roadway network, internal circulation, and pedestrian paths, are structured to enhance overall safety and accessibility. The proposed Specific Plan emphasizes efficient access and separation of automobile and truck circulation, which contributes to a well-organized site that is less likely to impede emergency response efforts. Additionally, the inclusion of sidewalks and bicycle facilities promotes alternative modes of transportation, which can be beneficial during emergencies. The parking standards consider the specific needs of the technology park and provide flexibility for reductions, ensuring that parking requirements would not hinder emergency response activities.

Because the proposed Specific Plan and subsequent development would not involve physical changes that would significantly alter the existing roadway network and sufficient EVA routes would be developed, future development would not substantially impair emergency response plans. Therefore, impacts would be **less than significant**, and no mitigation is required.

Impact 3.15-2: Due to slope, prevailing winds, and other factors, exacerbate wildfire risks, and thereby expose project occupants to pollutant concentrations from a wildfire or the uncontrolled spread of a wildfire (Less than Significant)

Under existing conditions, the Plan Area has varying topography with moderately hilly terrain. The Plan Area lies partially within a High FHSZ SRA and "high", and "very high" Fire Threat areas. Future development under the proposed Specific Plan would result in the conversion of an undeveloped area to a proposed technology park with hardscape and landscape areas (defensible space). As compared to existing conditions, future development would reduce the potential for wildfire hazards to occur or to be exacerbated in the Plan Area.

The proposed Specific Plan is a policy document that does not include site specific designs or development proposals. However, the proposed Specific Plan identifies the following fire protection guidelines for future development within the Plan Area:

- In compliance with the California Fire Protection Standards, defensible space must be maintained throughout the Plan Area adjacent to open spaces. Should the designated defensible space distances prove challenging to achieve, then structures within this zone must be constructed using fire-resistant materials and practices to mitigate potential fire risks.
- Brush management shall be required through construction and operations of future development pursuant to the California Fire Code.
- Landscape design shall be designed, installed, and maintained in accordance with the following Chapter 15.20 PMC California Fire Code. Chapter 15.20 is an amended version of the 2022 California Fire Code (CFC).
- Every aspect of the project's development plans will undergo thorough review by the Contra Costa County Fire Protection District during future discretionary development applications and Building Permit review processes to ensure adherence to these code provisions. Additional fire safety measures, such as fire-resistant roof construction, secure attachments, vegetative buffer zones, and other precautions, may be mandated as part of this evaluation.

The proposed Specific Plan also includes requirements for adequate water supply and fire flow availability, ensures adequate emergency access, adequate fire protection services, fire safe design site standards, and ensures public awareness regarding fire safety.

All future development under the proposed Specific Plan would be required to comply with the provisions of federal, State, and local requirements related to wildland fire hazards, including State fire safety regulations associated with wildland-urban interfaces, fire-safe building standards, and defensible space requirements. As future developments in the Plan Area are considered by the City, each project would be evaluated for potential impacts associated with wildland fire hazards as required under CEQA.

The proposed Specific Plan and subsequent development in the Plan Area would not facilitate or exacerbate the spread of wildfires thereby exposing project occupants to pollutant concentrations from wildfire. Therefore, impacts would be **less than significant**, and no mitigation is required.

Impact 3.15-3: Require the installation or maintenance of associated infrastructure (such as roads, fuel breaks, emergency water sources, power lines or other utilities) that may exacerbate fire risk or that may result in temporary or ongoing impacts to the environment (Less than Significant)

Future development within the Plan Area would include the construction and installation of infrastructure such as roadways and utilities. However, future development would not require fire prevention infrastructure such as emergency water sources or fire breaks, because the Plan Area is generally located in an urbanized area currently served by sufficient infrastructure.

As described previously, the proposed Specific Plan is a policy document that does not include site specific designs or proposals, and does not, in and of itself, propose or approve any entitlements for development. The proposed project would not result in or require the construction of new utility facilities, which would cause significant environmental impacts. Future development would be required to pay development impact fees at the time of building permit issuance. Furthermore, the Specific Plan includes requirements for adequate water supply and water flow availability, emergency access, fire protection services, and fire safe design site standards. Onsite utilities would be analyzed on a project-level basis and site-specific analyses would be conducted to ensure adequacy of the existing utility system.

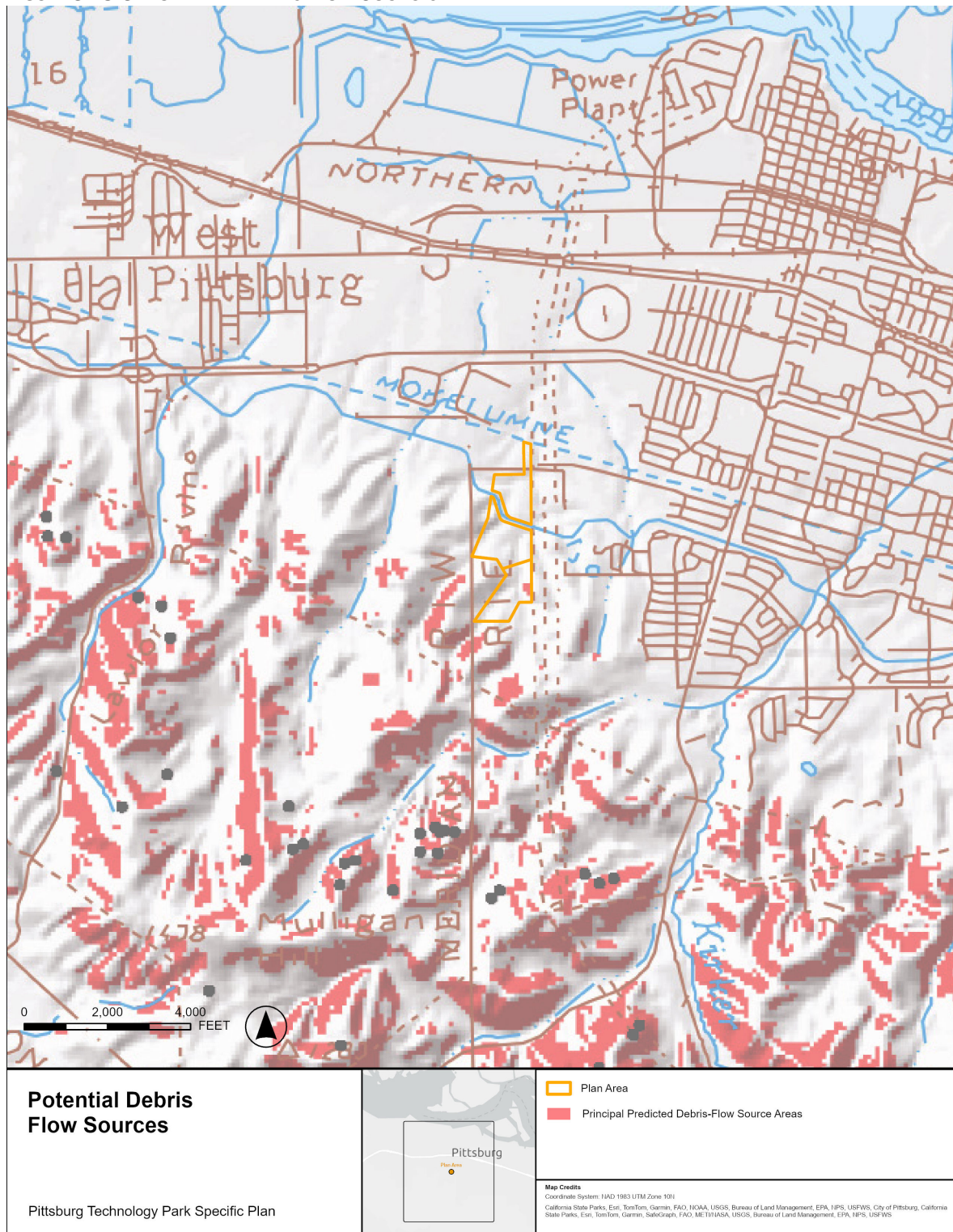
Implementation of the Specific Plan policies listed in Impacts 3.15-1 and 3.15-2 above, combined with local and state regulations, as previously discussed, would ensure that wildland fire hazards would not be exacerbated by the installation of infrastructure. Furthermore, future development would not be required to implement any off-site fire protection infrastructure or fire breaks that could result in impacts to the environment. As such, implementation of the Specific Plan would not exacerbate wildfire risks; therefore, impacts would be **less than significant**, and no mitigation is required.

Impact 3.15-4: Expose people or structures to significant risks, including downslope or downstream flooding or landslides, as a result of runoff, post-fire slope instability, or drainage changes (Less than Significant with Mitigation)

As previously described, vegetation loss due to wildfires can exacerbate landslide risk by destabilizing slopes. A vegetation fire occurred in the summer of 2022 and is slowly coming back as non-native grasses and invasive weeds. The landslide potential for the Plan Area is considered low to moderate where elevation change is relatively low. However, small areas in northern portion of Phase I, the western portion of Phase II, and the eastern portion of Phase III have very high landslide potential, which coincides with areas with increased elevation change. All drainages in the vicinity discharge to the unnamed stream in the eastern portion of the Plan Area, which ultimately discharges to the Suisun Bay. Additionally, the Contra Costa Canal traverses the Plan Area, bringing water to the East Bay from the Sierra Nevada Mountains.

As shown in Figure 3.15-3, hills west and south of the Plan Area pose a potential risk to future development in the Plan Area, including downslope flooding or landslides as a result of post-fire instability. Additionally, the potential for debris flows, including mudslides that may be brought on by intense and persistent periods of rain, may exist within the offsite canyon areas to the west and south of the Plan Area. In the event that a significant wildfire were to burn in the hills south of the Plan Area, portions of the Plan Area may be exposed to potential risks associated with landslides flooding, and/or debris flow in the weeks, months, and years following the fire as a result in changes to the vegetative cover of the land and the rain absorption capacity of the soil. Therefore, it is assumed that without mitigation, post-fire slope instability could have a potentially significant impact on future development.

FIGURE 3.15-3. POTENTIAL DEBRIS FLOW SOURCES



Mitigation Measures**MM 3.15-1: Post-Fire Slope Instability Review**

Prior to approval of building permit, the applicant shall demonstrate that debris flow potential has been studied for post-fire conditions. Alternatives for mitigating potential debris flow impacts shall be considered and refined as each phase of future development is designed. Preliminary mitigation measures may include restricting the use of portions of the site until the potential for debris flow is quantified, using best modeling methods. If it is determined that there is high potential for debris flow impacts, additional infrastructure or interventions may be required, including constructing debris collection basins, routine removal of debris-generating materials, and sizing up stormwater runoff conveyance facilities for bulked debris flows.

Significance Determination

Implementation of **MM 3.15-1** would ensure appropriate debris flow review and modeling is completed and necessary mitigation measures are in place. This mitigation measure would reduce this potential impact to a **less than significant** level.

The California Environmental Quality Act (CEQA) requires an EIR to evaluate a project's effects in relationship to broader changes that are occurring or that may foreseeably occur, in the surrounding environment. Accordingly, this chapter presents discussion of CEQA-mandated analysis for significant and unavoidable, significant irreversible, growth inducing, and cumulative impacts associated with the proposed project.

4.1 CUMULATIVE SETTING AND IMPACT ANALYSIS

CEQA requires that an EIR contain an assessment of the cumulative impacts that could be associated with buildout of the Plan Area. According to CEQA Guidelines Section 15130(a), "an EIR shall discuss cumulative impacts of a project when the project's incremental effect is cumulatively considerable." "Cumulatively considerable," as defined in section 15065(a)(3), means that "the incremental effects of an individual project are significant when viewed in connection with the effects of past projects, the effects of other current projects, and the effects of probable future projects" (as defined by Section 15130). As defined in CEQA Guidelines Section 15355, a cumulative impact consists of an impact that is created as a result of the combination of the proposed project evaluated in the EIR together with other projects causing related impacts.

According to section 15130(b) of the CEQA Guidelines, the discussion of cumulative effects "... need not provide as great a detail as is provided for the effects attributable to the project alone. The discussion should be guided by standards of practicality and reasonableness..." Pursuant to section 15130(d), cumulative impact discussions may rely on previously approved land use documents such as general plans, specific plans, and local coastal plans, which may be incorporated by reference.

In addition, Section 15130(b) identifies that the following three elements are necessary for an adequate cumulative analysis:

- 1) Either:
 - a) A list of past, present, and probable future projects producing related or cumulative impacts, including, if necessary, those projects outside the control of the agency; or,
 - b) A summary of projections contained in an adopted local, regional or statewide plan, or related planning document, that describes or evaluates conditions contributing to the cumulative effect. Such plans may include: a general plan, regional transportation plan, or plans for the reduction of greenhouse gas emissions. A summary of projections may also be contained in an adopted or certified prior environmental document for such a plan. Such projections may be supplemented with additional information such as a regional modeling program. Any such planning document shall be referenced and made available to the public at a location specified by the lead agency.
- 2) A summary of the expected environmental effects to be produced by those projects with specific reference to additional information stating where that information is available; and
- 3) A reasonable analysis of the cumulative impacts of the relevant projects. An EIR shall examine reasonable, feasible options for mitigating or avoiding the project's contribution to any significant cumulative effects. Where a lead agency is examining a project with an incremental effect that is not "cumulatively considerable," a lead agency need not consider

4.0 OTHER CEQA TOPICS

that effect significant but shall briefly describe its basis for concluding that the incremental effect is not cumulatively considerable.

CUMULATIVE SETTING

Under CEQA, the discussion of cumulative impacts should focus on the severity of the impacts and the likelihood of their occurrence. Cumulative effects would occur from development associated with buildout of the Plan Area combined with effects of development on land within and around the City of Pittsburg and the region. The geographic scope for the cumulative analysis is defined within each area below. It should be noted that, for some environmental topics, the geographic scope for the cumulative analysis also covers the boundaries of Contra Costa County, the San Francisco Bay Area Basin, and/or other jurisdictional boundaries that are relevant to the particular environmental topic. A broad examination of cumulative impacts involves considering buildout of the Plan Area together with growth and new development.

The geographic area considered for each cumulative impact depends upon the impact that is being analyzed. For example, the proposed project effects on air quality would combine with the effects of projects in the entire air basin, whereas noise impacts would primarily be localized to the surrounding area. The geographic area that could be affected by the proposed project varies depending upon the type of environmental issue being considered. Section 15130(b)(3) of the CEQA Guidelines states that lead agencies should define the geographic scope of the area affected by the cumulative effect. Each subsection below identifies the specific parameters for the cumulative evaluation.

A significant impact would occur if the proposed project's contribution to the cumulative effect is determined to be substantial. Each subsection below provides an overview of the potential cumulative impacts that could occur followed by a summary of the proposed project's contribution to that cumulative effect. The subsection concludes with a determination of the significance of the proposed project.

Table 4-1 identifies the approved (but not yet constructed or occupied) and pending projects in the proposed project vicinity that are evaluated in the cumulative analysis.

TABLE 4-1: PROJECTS IN PROPOSED PROJECT VICINITY

<i>NAME AND LOCATION</i>	<i>DESCRIPTION</i>	<i>DISTANCE TO PROPOSED PROJECT</i>	<i>STATUS</i>
T-Mobile Cell Tower Modification 2222 Golf Club Road, Pittsburg, CA	Cell Tower/Antenna Modification	Approximately ¼ mile to the northeast	Completed
AT&T Backup Generator 2222 Golf Club Road, Pittsburg, CA	Installation of a backup generator at an existing AT&T Cell tower/Antenna	Approximately ¼ mile to the northeast	Completed
Stoneman Park Subdivision	342 Unit Residential Subdivision	Approximately ½ mile to the southwest	Pending review

<i>NAME AND LOCATION</i>	<i>DESCRIPTION</i>	<i>DISTANCE TO PROPOSED PROJECT</i>	<i>STATUS</i>
Pittsburg Premier Fields Project	Develop a portion of the former Delta View Golf Course into three multi-purpose natural turf sports fields	Within less than 100 feet to the west	Pending review
Los Médanos Industrial Park	Development of industrial park	Approximately 1.6 miles to the east	Pending review
Montreux Residential Subdivision	356-unit residential subdivision	Approximately 1.5 miles southeast	EIR Certification
Dreamcourts	39,779 s.f. gymnasium	Approximately 375 feet to the west	Approved

CUMULATIVE EFFECTS OF THE PROJECT

Method of Analysis

Although the environmental effects of an individual project may not be significant when considered separately, the combined effects of several projects may be significant when considered collectively. Section 15130 of the CEQA Guidelines requires a reasonable analysis of a project's cumulative impacts, which are defined as "two or more individual effects which, when considered together are considerable or which compound or increase other environmental impacts." The cumulative impact that results from several closely related projects is: the change in the environment which results from the incremental impact of the proposed project when added to other closely related past, present, and reasonably foreseeable probable future projects. Cumulative impacts can result from individually minor but collectively significant projects taking place over a period of time (State CEQA Guidelines 15355[b]). Cumulative impact analysis may be less detailed than the analysis of the proposed project's individual effects (State CEQA Guidelines 15130[b]).

In order to assess cumulative impacts, an EIR must analyze either a list of past, present, and probable future projects (referred to as the "list approach") or a summary of projections contained in an adopted general plan or related planning document (referred to as the "projection method"). The discussion in this section relies on the list of cumulative projects method, with projects considered included above.

According to section 15130(b) of the CEQA Guidelines, the discussion of cumulative effects should be guided by practicality and reasonableness and reflect the severity and likelihood of occurrence, but "...need not provide as great detail as is provided for the effects attributable to the project alone." To supplement the summary of projections to determine significant cumulative impacts, the following elements are necessary to an adequate discussion:

- A defined geographic scope of the area affected by the cumulative effect with reasonable explanation of geographical limitations;

- A summary of expected environmental effects to be produced by those projects with specific reference to additional information stating where that information is available; and
- A reasonable analysis of the cumulative impacts of the relevant projects. An EIR shall examine reasonable, feasible options for mitigating or avoiding the project's contribution to any significant cumulative effects.

Cumulative Impacts

Cumulative impacts for most issue areas are not quantifiable and are therefore discussed in general qualitative terms as they pertain to development patterns in the surrounding areas. An exception to this is a topic like traffic, which may be quantified by estimating future traffic patterns, pollutant emitters, etc. and determining the combined effects that may result. A discussion of cumulative impacts for each environmental topic area analyzed in Chapter 3 is included below.

AESTHETICS

The proposed project is located near the southern edge of the City of Pittsburg, within the larger San Francisco Bay region. Based on the location of the Plan Area, the area for the assessment of cumulative visual impacts includes the viewshed from Railroad Avenue and State Route 4 (SR 4), per the City of Pittsburg 2040 General Plan (2040 General Plan), updated in 2024. Future development within the Plan Area could have a cumulative impact on visual resources due to changes in visual character and quality resulting from incremental increases in density and urbanization. The following is a summary of the proposed project's contribution to cumulative aesthetic impacts.

With implementation of design guidelines related to building form, materials, and landscape design, as discussed in Section 3.1, *Aesthetics*, future development in the Plan Area would not have a substantial adverse effect on views towards the mountains. While development in the Plan Area, along with the Premier Fields project located west of the Plan Area, could alter views from SR4 looking south, future development within the Plan Area would be required to adhere to proposed project design guidelines, which encourage design that blends with the environment to enhance the surrounding visual character. Therefore, the proposed project would not have a cumulatively considerable contribution to adverse visual impacts from this viewshed.

There are no state scenic highways within or near the City, and there are no highways in the City's vicinity eligible for Scenic Highway designation. Furthermore, the 2040 General Plan does not designate any scenic corridors. Thus, the proposed project would not combine with other projects to result in a cumulative impact associated with scenic resources.

Future development within the Plan Area and other listed projects would be required to conform to the 2040 General Plan design standards which are specific to locations and uses allowed per the 2040 General Plan. The 2040 General Plan identifies key gateway and landmark features as focal points to the City, and future development would be required to adhere to design elements, specifically on important gateways including State Route 4, Railroad Avenue/Kirker Pass Road and Nortonville Road, Willow Pass Road, West Leland Road, Pittsburg-Antioch Highway, and Buchanan Road. The proposed Specific Plan, in combination with other projects along these proximal gateways

would be required to adhere to design guidelines to enhance the visual character of the surrounding area and would have a less than cumulatively considerable impact on scenic quality.

With implementation of the design guidelines and development standards identified in Section 3.1, *Aesthetics*, buildout of the Plan Area would not create a substantial new source of light or glare that would adversely affect views in the area. Although future development within the Plan Area, along with other projects, such as the Premier Fields project adjacent to the west and the Dreamcourts project to the northwest, have the potential to add new sources of light, all development within the viewshed would be required to adhere to the City of Pittsburg Municipal Code (PMC) Section 18.82.030 and discretionary projects subject to CEQA, would implement mitigation that would minimize any impacts. Although there would be a cumulative increase in light and glare within the Plan Area, through conformance with regulation and proposed project design guidelines, the contribution of future development under the proposed project would be less than cumulatively considerable.

AIR QUALITY

Cumulative impacts to air quality may be regional or localized. Regional air quality would be impacted if emissions from the proposed project contributed to cumulative degradation of air quality in the San Francisco Bay Area Air Basin (SFBAAB). Localized air quality would be impacted if emissions from the proposed project and other proximate emissions sources resulted in pollutant concentrations that exceeded standards at a sensitive receptor.

The study area for the assessment of cumulative regional air quality impacts is the SFBAAB, which comprises all of Alameda, Contra Costa, Marin, Napa, San Francisco, San Mateo, and Santa Clara counties, the southern portion of Sonoma, and the southwestern portion of Solano County. Future development within the Plan Area could have a cumulative impact on air quality due to increased air pollution emissions associated with construction and operations, including transportation. The cumulative assessment of regional air quality impacts to the SFBAAB relies partially on assessment of the proposed project's consistency with State and federal laws, regulations, and programs set forth by the BAAQMD. The BAAQMD, with assistance from ABAG and MTC, has prepared and implemented specific plans to meet the applicable laws, regulations, and programs. The most recent and comprehensive of which is the Bay Area 2017 CAP (2017 CAP). The BAAQMD has also developed CEQA Air Quality Guidelines (most recently in 2022) to assist lead agencies in evaluating the significance of air quality impacts. CEQA requires lead agencies to determine whether a project is consistent with all applicable air quality plans. The analysis provided in Section 3.2, *Air Quality*, demonstrates that the 2040 General Plan would be consistent with the current air quality plan control measures; and because the proposed project would implement the ECI land use of the General Plan, the proposed project would not conflict with or obstruct implementation of the applicable air quality plan. Other projects would also be expected to be consistent with and comply to applicable air quality plans.

The proposed project may result in the development of projects that could exceed air quality impact screening levels for construction emissions, which could contribute to a violation of National Ambient Air Quality Standards or California Ambient Air Quality Standards, resulting in a

cumulatively considerable air quality impact at the program-level. Due to the potential for full project buildout to include land use types that generate diesel truck trips beyond what was estimated in the CalEEMod modeling analysis, implementation of mitigation measures detailed in Section 3.2.4 would be necessary to mitigate emissions. Other projects would be expected to incorporate applicable mitigation measures to ensure impacts regarding violation of National Ambient Air Quality Standards or California Ambient Air Quality Standards are reduced to acceptable levels. Implementation of the proposed project would have a less than cumulatively considerable contribution to cumulative air emissions within implementation of mitigation measures.

As discussed in Section 3.2 of this PEIR, future development under the proposed project has the potential to expose sensitive receptors to substantial pollutant concentrations. Future construction activities could result in increased toxic air contaminants (TAC) emissions, such as diesel exhaust associated with construction equipment. Subsequent development could allow uses that have the potential to produce TACs or hazardous air pollutants during the operations, specifically diesel particulate matter (DPM) from diesel generators and diesel truck trips. However, future development projects under the proposed project, as well as other cumulative projects, are required to comply with applicable regulations that reduce exposure of these emissions on sensitive receptors and may be required to conduct a Health Impact Analysis for mitigation measures that are site-specific. Thus, while the proposed project in combination with other industrial projects, such as the Los Medanos Industrial Park, could result in a cumulative increase in air toxics, the proposed project would have a less than cumulatively considerable consideration, with site-specific mitigation guided by future Health Risk Assessments (HRAs).

The analysis provided in Section 3.2 demonstrates that odors resulting from Implementation of the 2040 General Plan would be not result in other emissions or odors; and because the proposed project would implement the ECI land use of the General Plan, the proposed project would not result in other emissions (such as those leading to odors adversely affecting a substantial number of people) and would not combine with other projects to result in cumulatively considerable impacts.

BIOLOGICAL RESOURCES

Areas for other development projects may include sensitive habitats, which may contain special-status plants and wildlife, migratory bird species, and jurisdictional resources. As discussed in Section 3.3, *Biological Resources*, future development within the Plan Area would be required to implement mitigation measures to reduce impacts to the identified species and habitats to less than significant levels. Furthermore, future development projects under the proposed project, in combination with other projects will be required to comply obtain permit authorization from USACE, the RWQCB, and/or CDFW, as discussed in Section 4.3, *Biological Resources* and comply with federal, state, and local regulations for the protection of sensitive natural communities, including protected wetlands, as well as with the HCP/NCCP. Therefore, the proposed project would result in a less than cumulatively considerable contribution to adverse effects on habitat and special-status species, sensitive habitats, and jurisdictional waters.

Future development projects within the Plan Area, in combination with other projects, also have the potential to impact wildlife corridors. Future development within the proposed Plan Area would be

required to implement mitigation for potential impacts to known wildlife corridors. Therefore, the proposed project's contribution to cumulative impacts would be less than cumulatively considerable.

CULTURAL AND TRIBAL CULTURAL RESOURCES

Cultural resource impacts are site-specific and generally do not combine to result in cumulative impacts. As discussed in Section 3.4, *Cultural and Tribal Cultural Resources*, one historic resource in within the Plan Area, P-7-2956 Pittsburg-Tesla PG&E Distributions Lines, meets the criteria (Criterion A/1 and C/3) for listing on the NRHP/CRHP as a contributing element to early power distribution systems in Northern California. Future development in the Plan Area would not physically alter significant portions of P-7-2956 Pittsburg-Tesla PG&E Distributions Lines materials, workmanship, and would not alter its current route or location along the landscape. Additionally, cumulative projects would be required to perform cultural resources investigations prior to development. Such investigations would identify resources on the affected areas that are or appear to be eligible for listing on the NRHP or CRHR. Such investigations would also recommend mitigation measures to protect and preserve cultural resources. As discussed in Section 3.4 of this PEIR, future development within the Plan Area would be required to implement mitigation measures to ensure proper identification, treatment, and preservation of cultural resources. With adherence to investigations and PMC Section 15.84, surrounding historic resources would be protected, and development within the Plan Area, in combination with surrounding development, would not result in a cumulative impact to cultural resources.

Future development projects accommodated by the proposed project could result in potential site-specific impacts to currently unknown archaeological and cultural resources discovered during grading and trenching activities. Other projects within the cumulative study area also have the potential to result in damage and/or loss to these resources. The combination of the proposed project as well as past, present, and reasonably foreseeable projects in the City and County would be required to comply with all applicable state, federal, County, and local regulations concerning preservation, salvage, or handling of cultural resources, including compliance with required mitigation. Similar to the proposed project, these projects also would be required to implement and conform to mitigation measures, which would likely address appropriate treatment of discovered resources during construction. With mitigation measures that require contractor awareness training, archaeological monitoring, and established protocols for unanticipated discoveries, development within the Plan Area in combination with other projects, would not result in a cumulative impact to archaeological resources.

GEOLOGY AND SOILS

Geology and soils impacts are site-specific and generally do not combine to result in cumulative impacts. Like those accommodated by the proposed project, future development projects would be required to comply with applicable state and local building regulations. Site-specific geologic hazards would be addressed in each project's geotechnical investigation. Therefore, no significant cumulative impact would occur.

Additionally, other projects in the area that would involve ground disturbance could damage paleontological resources that could be buried in those project sites. As with the proposed project, other projects would require site-specific paleontological analysis that could lead to mitigation requiring monitoring and recovery, identification, and curation of any resources discovered. Cumulative impacts to paleontological resources would be less than significant, and the proposed project's contribution would not be cumulatively considerable.

GREENHOUSE GASES (GHGs) AND ENERGY

Emissions of greenhouse gas (GHG) emissions contributing to global climate change are attributable in large part to human activities associated with the industrial/manufacturing, utility, transportation, residential, and agricultural sectors. Therefore, the cumulative global emissions of GHGs contributing to global climate change can be attributed to every nation, region, and city, and virtually every individual on Earth. A project's GHG emissions are at a micro-scale relative to global emissions but could result in a cumulatively considerable incremental contribution to a significant cumulative macro-scale impact.

Short-term GHG emissions would occur as a result of construction activities. However, the proposed project does not directly approve or otherwise entitle any new development projects, and as such, construction related GHG emissions cannot be known. Compliance with standard BAAQMD best management practices for construction, would ensure that future development would result in a less than cumulatively considerable contribution to construction related GHG emissions. Future development accommodated by the proposed project, along with other cumulative projects would be required to adhere to BAAQMD best management practices.

The BAAQMD is responsible for preparing and updating air quality plans to achieve GHG reduction goals for carbon neutrality by 2045 and utilizes emissions inventory and data analysis for the region. Future development accommodated by the proposed project, along with other cumulative projects would be required to adhere to BAAQMD plans and updated GHG thresholds, and therefore would have a less than cumulatively considerable contribution relative to GHG emissions.

HAZARDS AND HAZARDOUS MATERIALS

The exposure of hazardous materials is generally site-specific, as exposure on the public and environment from upset and accident is determined through appropriate transportation, use, and disposal of materials. The release of hazardous materials is site-specific and tend to not compound or increase in combination with projects elsewhere. The results of Phase I ESA indicate that the accidental release of hazardous materials is unlikely, as all known contaminated sites within a mile have gone through remediation and are closed. Future projects accommodated by the proposed project, as well as cumulative projects near the Plan Area would be required to comply with applicable federal, state, and local regulations of agencies having jurisdiction over hazardous materials, including the U.S. Environmental Protection Agency and federal Resource Conservation and Recovery Act. Therefore, the proposed project would result in a less than cumulatively considerable impact related to hazardous materials exposure.

The cumulative study area for airport hazards includes the entirety of the airport influence area for the Buchanan Field Airport, which is located approximately 10 miles or further southwest of the Plan Area. The proposed project's incremental contribution to airport hazard impacts would not be cumulatively considerable. As discussed in Section 3.7 of this PEIR, the proposed project would not impair implementation of or physically interfere with the City's emergency response plan or evacuation routes. Furthermore, applications for all future projects within the Plan Area in addition to cumulative projects in the surrounding area would require review by the Contra Costa County Fire Protection District prior to issuance of building permit. Therefore, the proposed project's incremental contribution to emergency response planning impacts would not be cumulatively considerable.

Regarding potential cumulative impacts related to wildfire, the Plan Area is not categorized as being within a VHFSZ by CalFire. However, a small portion of the Plan Area is in a "high" FHSZ and could result in increased fire related risk to people and structures; therefore, cumulative impacts resulting from development of these sites in addition to development of cumulative projects within high fire hazard areas could occur as a result of implementation of the proposed Specific Plan. However, any impacts would be reduced through adherence to guidelines identified by the proposed Specific Plan for landscaping and fire prevention in the Plan Area. The proposed Specific Plan also includes requirements for adequate water supply and fire flow availability, ensuring adequate emergency access, adequate fire protection services, fire safe design site standards, and ensuring public awareness regarding fire safety. All future development under the proposed Specific Plan as well as other cumulative projects would be required to comply with the provisions of federal, state, and local requirements related to wildland fire hazards, including state fire safety regulations associated with wildland-urban interfaces, fire-safe building standards, and defensible space requirements, reducing risks in conjunction with development related to wildfire. Thus, the proposed Specific Plan's incremental contribution to wildfire impacts would not be cumulatively considerable.

HYDROLOGY AND WATER QUALITY

The cumulative study area for potential hydrology and water quality impacts is the Suisun Bay watershed.

Water Quality and Drainage

While continued development within the City could result in additional stormwater runoff and increased pollutants into receiving waters through the construction and operation of future projects, each project is required to comply with federal, state and local regulatory stormwater documents, standards, and requirements. Compliance with these requirements would ensure that each project provides adequate storage capacity for the additional stormwater runoff generated, as well as incorporate sufficient BMPs to successfully reduce pollutants from site runoff during the construction and operational phases. As discussed in Section 3.8 of this PEIR, any potential impacts from the proposed project on drainage and water quality would be mitigated to less-than-significant levels, as would other potential development projects' impacts. Thus, the proposed project would result in a less than cumulatively considerable contribution to impacts on the City's existing storm drainage system and downstream waterways.

Groundwater

Cumulative development within the Plan Area groundwater basin could contribute to impacts with respect to groundwater recharge and drainage patterns. The Plan Area is located in the Pittsburg Plain Groundwater Basin, which is not adjudicated and is not listed as a critically overdrafted groundwater basin by DWR. Future development projects accommodated by the proposed project as well as other cumulative projects would be evaluated for conformance with the General Plan, PMC, and other applicable regulations. Development and infrastructure projects would also be analyzed for potential environmental impacts, consistent with the requirements of CEQA. Thus, the proposed project would result in a less than cumulatively considerable contribution to impacts on groundwater and groundwater recharge.

Flooding

As noted previously, the Plan Area is within an area of minimal flood hazard and is outside of the 100-year or 500-year FEMA flood zones or regulatory floodways. The 100-year floodplain is largely confined to the northern portion of the City limits and the creeks traveling downslope from Mt. Diablo. Future development accommodated under the proposed project as well as other cumulative projects could increase imperviousness within their respective areas and could thus exacerbate present drainage issues that lead to flooding during moderate storm events. As described in Section 3.8 of this PEIR, the City of Pittsburg regulates storm water discharge in accordance with the NPDES permit through PMC Section 13.28, Stormwater Management and Discharge Control. In addition to complying with the NPDES programs and C.3 Guidebook stormwater requirements, future development under the proposed project as well as other projects would be required to follow policies outlined within the 2040 General Plan. The 2040 General Plan includes policies that are intended to reduce impacts associated with stormwater and drainage, including maintaining storm drainage systems, improving flood management facilities, and other best practices in order to protect the community from flood hazards and minimize the discharge of materials into the storm drain system that are toxic. Thus, the proposed project would result in a less than cumulatively considerable contribution to flooding impacts.

LAND USE AND PLANNING

The cumulative study area for the assessment of land use impacts would be the City and neighboring jurisdictions. Cumulative land use impacts could result from changes to land use plans, which become incompatible and/or unsustainable.

Adoption of the proposed project could contribute to cumulative impacts if buildout would conflict with land use plans and/or policies, state planning initiatives, or create incompatible neighborhoods. The proposed project would be consistent with policies of adopted plans and regulations governing land use and development in the City. In addition, the proposed project would not conflict with any relevant regional or local plans. Therefore, the proposed project's incremental contribution to land use impacts associated with land use plans, policies and state planning initiatives would not be cumulatively considerable.

Regarding the division of an established community, the Plan Area is located south of residential areas and is abutting open space; therefore, it would not divide existing communities. The proposed

project would not combine with other projects to result in a cumulative impact relative to division of a community.

NOISE

The study area for the assessment of cumulative noise impacts is the Plan Area and surrounding neighborhoods, which could experience in an increase in ambient noise levels due to new stationary sources and project-generated traffic. Future development under the proposed project would allow new operational noise sources, including stationary sources that typically involve the use of heavy machinery, which can contribute to a significant source of noise, and vehicular traffic. Future development under the proposed project, in combination with cumulative projects in the area, could result in an increase in ambient noise levels, impacting proximate sensitive receptors.

Future projects in the area, such as the sports field to the west, could contribute to an incremental increase in ambient noise within the cumulative study area. Buildout of the Plan Area would adhere to 2040 General Plan noise performance standards and ensure proper site layout to reduce sound levels to acceptable levels. Other projects would also be required to adhere to 2040 General Plan performance standards where any project-level exceedance requires further analysis and mitigation prior to development. With adequate noise analysis and appropriate mitigation, future development within the Plan Area would result in a less than cumulatively considerable contribution to ambient noise impacts.

POPULATION AND HOUSING

The cumulative study area considered for population and housing impacts is the City of Pittsburg. The proposed project would guide future development in the Plan Area in conformance with the 2040 General Plan by fostering economic opportunities for a growing population, rather than inducing unplanned growth. All other future development in the City would continue to be controlled by the 2040 General Plan and City Zoning Ordinance. The proposed project would not result in the displacement of housing or people, as described in Section 3.11 of this PEIR. Therefore, the proposed project would not result in a cumulatively considerable impact associated with population and housing.

PUBLIC SERVICES AND RECREATION

The cumulative study area for public services and recreation is the applicable provider's service area. New development or redevelopment within the service area could result in cumulative impacts associated with additional demands for public services, resulting in the need for new or expanded facilities. As discussed in Section 3.12 of this PEIR, payment of applicable service fees would reduce potential impacts. As population growth occurs in the City and the need for new facilities are identified, any future construction of such facilities would be subject to a separate environmental review. No expanded services or facilities are warranted with the implementation of the proposed project, and impacts would not be cumulatively considerable.

TRANSPORTATION/TRAFFIC

The cumulative study area for traffic includes the roads that would support project-related traffic as detailed in Section 3.13, *Transportation and Circulation*. New development or redevelopment within the Plan Area could result in cumulative impacts associated with increased trips resulting in congested roadways. As discussed in Section 3.13, the proposed project would result in an increased VMT. However, this impact would be mitigated with the implementation of **MM 3.13-1**, which requires the implementation of a Travel Demand Management (TDM) plan. Through the incorporation of mitigation measures, buildout within the Plan Area would not result in a cumulatively considerable impact regarding VMT.

Subsequent development of the technology park accommodated by the proposed project as well as other cumulative projects would be required to be consistent with all applicable goals, policies, and actions of the 2040 General Plan. Any subsequent development that exceeds any LOS threshold per the City's Traffic Impact Analysis Guidelines would be required to adopt mitigation measures to eliminate those violations, as described in **MM 3.13-2**. Furthermore, all future development under the proposed project would be required to pay its fair share of its costs to the City's circulation network, as described in **MM 3.13-3**. With the incorporation of these mitigation measures, the proposed project would have a less than cumulatively considerable contribution to transportation impacts.

UTILITIES AND SERVICE SYSTEMS

The study area for public utilities is the applicable provider's service area. New development or redevelopment within the service area could result in additional demands for public utilities, resulting in the need for new or expanded facilities, as further detailed below.

Storm Water System

Stormwater drainage and conveyance facilities would be evaluated at the project-level in association with subsequent development projects. As future development projects are considered, each project would be required to complete site-specific hydrology, drainage, and stormwater studies in conjunction with project grading plan approval in conformance with applicable regulations. At this program-level of review, the proposed project's incremental contribution to storm water facility impacts would not be cumulatively considerable as each individual project would be required to install applicable storm water improvements consistent with current storm water regulations.

Wastewater

Development contemplated under the proposed project would increase wastewater flows, resulting in the need for additional wastewater conveyance infrastructure. Wastewater conveyance facilities would be evaluated at the project-level in association with subsequent development projects. Future development projects would be subject to compliance review with the General Plan policies, building code standards of the PMC, and other applicable regulations that pertain to wastewater utilities and building standards for plumbing design. Thus, the proposed project's incremental contribution to wastewater impacts would not be cumulatively considerable.

Water System/Water Supply

It is anticipated that additional water conveyance infrastructure would be required as part of future development projects within the Plan Area. Increased water demand from past, present, and future development could always have cumulative adverse impacts to water supply. However, the 2020 Urban Water Management Plan indicates that the City is capable of meeting water demands to 2045 buildout. Additionally, recycled water lines service the Plan Area, and it is anticipated that future development would use recycled water to reduce domestic water demand. Should new facilities be required to be constructed in the future, each would undergo site-specific environmental analysis, as applicable. Thus, the proposed project's incremental contribution to water system/water supply impacts would not be cumulatively considerable.

Solid Waste Disposal

As discussed in Section 3.14, the Keller Canyon Landfill is permitted to accept up to 3,500 tons of solid waste per day and has a remaining capacity of 63,408,410 cubic yards. Therefore, the Keller Canyon Landfill has sufficient capacity to serve future development. Future development under the proposed project would not generate solid waste in excess of State or local standards, nor would it require an expansion of landfill capacity. Potential future development within the Plan Area as well as other cumulative projects would be required to comply with all applicable 2040 General Plan policies, which would encourage recycling and reduce construction waste during development of the proposed project. Because adequate capacity exists at the Keller Canyon Landfill, the proposed project's incremental contribution to cumulative impacts related to solid waste would be less than cumulatively considerable contribution.

WILDFIRES

The cumulative study area for the assessment of impacts related to wildfire is the City of Pittsburg region. As discussed in Section 3.15, the Plan Area is not located within a VHFSZ designated by CalFire. However, a small portion of the Plan Area is in a "high" FHSZ and could result in increased fire related risk to people and structures; therefore, cumulative impacts resulting from development of these sites in addition to development of cumulative projects within high fire hazard areas could occur as a result of implementation of the proposed project. However, any impacts would be reduced through adherence to guidelines identified by the proposed project for landscaping and fire prevention in the Plan Area. The proposed project also includes requirements for adequate water supply and fire flow availability, ensuring adequate emergency access, adequate fire protection services, fire safe design site standards, and ensuring public awareness regarding fire safety. All future development under the proposed project as well as other cumulative projects would be required to comply with the provisions of federal, state, and local requirements related to wildland fire hazards, including state fire safety regulations associated with wildland-urban interfaces, fire-safe building standards, and defensible space requirements, reducing risks in conjunction with development related to wildfire. Thus, the proposed project's incremental contribution to wildfire impacts would not be cumulatively considerable.

4.2 GROWTH INDUCEMENT

Pursuant to Sections 15126(d) and 15126.2(d) of the CEQA Guidelines, this section is provided to examine ways in which the proposed project could foster economic or population growth, or the construction of additional housing, either directly or indirectly, in the surrounding environment. To address this issue, potential growth-inducing effects will be examined through analysis of the following questions:

- Would this project remove obstacles to growth, e.g., through the construction or extension of major infrastructure facilities that do not presently exist in the project area, or through changes in existing regulations pertaining to land development?
- Would this project result in the need to expand one or more public services to maintain desired levels of service?
- Would this project encourage or facilitate economic effects that could result in other activities that could significantly affect the environment?
- Would approval of this project involve some precedent-setting action that could encourage and facilitate other activities that could significantly affect the environment?

Please note that growth-inducing effects are not to be construed as necessarily beneficial, detrimental, or of little significance to the environment. This issue is presented to provide additional information on ways in which this Project could contribute to significant changes in the environment, beyond the direct consequences of developing the land use concept examined in the preceding sections of this Draft PEIR.

1. Would this project remove obstacles to growth, e.g., through the construction or extension of major infrastructure facilities that do not presently exist in the project area, or through changes in existing regulations pertaining to land development?

The removal of a physical obstacle to growth, such as the construction or extension of a major infrastructure facilities that are not presently in the area, would be considered a potentially growth inducing impact. As discussed in Section 2.0, *Project Description*, Section 3.13, *Transportation*, and Section 3.14, *Utilities*, the proposed project would include various new infrastructure improvements onsite, including a roadway extension and related improvements, a public water main extension, a sewer main extension and service laterals, and dry utilities (electricity, communications).

Implementation of the proposed project would require the construction and improvement of roadways and extension of infrastructure into areas that would facilitate additional planned growth pursuant to the 2040 General Plan. Although the infrastructure improvements are planned for, the improvements would allow further development to occur within the project area. The proposed project is consistent with the 2040 General Plan, as discussed in Section 3.9 *Land Use and Planning*, and its associated Final EIR, which evaluated long-term growth based on land use designations throughout the City. Therefore, the proposed project would remove obstacles to growth to accommodate the demands of 2040 General Plan full buildout, which could allow for future development once infrastructure is in place and would be considered growth inducing.

2. Would this project result in the need to expand one or more public services to maintain desired levels of service?

As the City continues to develop, it requires the further commitment of public services in the form of fire protection, police services, and other public facilities. As discussed in Section 3.12, *Public Services*, the proposed project would not directly necessitate the construction of new public services including fire protection or law enforcement services, and any pressure on such services would be addressed through payment of development impact fees. The proposed project is consistent with the 2040 General Plan and its associated Final EIR, which evaluated a range of policies and actions to ensure public service demands are adequately funded and coordinated between the City and appropriate service agencies, and that new development would provide funds to pay for its fair share of services. The proposed project would not, therefore, have significant growth-inducing consequences with respect to public services.

3. Would this project encourage or facilitate economic effects that could result in other activities that could significantly affect the environment?

During future project construction, a number of construction-related jobs would be created. However, construction related jobs would not result in a significant population increase because they would be filled by workers in the region and the construction phase would be temporary.

As discussed in Section 3.0, *Project Description*, the proposed project objectives include fostering economic opportunities within the community by expanding the variety of industrial and business park uses. The 2040 General Plan provides that at full buildout, new growth would result in a population increase of approximately 20,470 persons and 24,659 new jobs within the city. The General Plan is intended to provide for and address future growth in the City and identifies the Plan Area as an adequate site to support this economic development. In turn, the proposed project is a complimentary plan to the General Plan, which would provide both policy and regulatory direction for the Plan Area. Although the proposed project would result in new permanent employment opportunities and stimulate economic opportunities, it is planned to meet future employment demands outlined in the 2040 General Plan. The proposed project is consistent with the 2040 General Plan and its associated Final EIR, which evaluated long-term growth based on land use designations throughout the City. Overall, the proposed project would not result in increased levels of growth that would otherwise not occur. Furthermore, the proposed project includes design guidelines and performance standards that are intended to minimize and mitigate environmental impacts from future development. Therefore, the proposed project would not encourage or facilitate economic effects that could significantly affect the environment.

4. Would approval of this project involve some precedent-setting action that could encourage and facilitate other activities that could significantly affect the environment?

The proposed project consists of a Specific Plan to allow for a variety of technology-focused business park uses on approximately 76.4 acres. Pressures to develop other land in the surrounding area would derive from regional economic conditions and market demands for housing, commercial, and other employment uses that are not directly or indirectly influenced by zoning actions on a particular

property. The proposed project is consistent with the 2040 General Plan, as discussed in Section 3.9, *Land Use and Planning*, and its associated Final EIR, which evaluated long-term growth based on land use designations throughout the City. Approval of the proposed project would not, therefore, involve a precedent-setting action that could be applied to other properties and thereby encourage or facilitate growth that would not otherwise occur.

Environmental Impacts of Induced Growth

As described above, implementation of the proposed project would provide development to accommodate City forecasted employment demands. All physical environmental effects from construction and operation of future development have been analyzed in all technical sections of this Draft PEIR. Therefore, development of the proposed project has been analyzed in this Draft PEIR and would be adequately mitigated either through implementation of Plans, Programs, and Policies and/or mitigation measures, and in some cases, through performance standards included in the proposed project.

4.3 SIGNIFICANT IRREVERSIBLE EFFECTS

Legal Considerations

CEQA Section 15126.2(c) and Public Resources Code Sections 21100(b)(2) and 21100.1(a), requires that the EIR include a discussion of significant irreversible environmental changes which would be involved in the proposed action should it be implemented. Irreversible environmental effects are described as:

- The project would involve a large commitment of nonrenewable resources;
- The primary and secondary impacts of a project would generally commit future generations to similar uses (e.g., a highway provides access to previously remote area);
- The project involves uses in which irreversible damage could result from any potential environmental accidents associated with the project; or
- The phasing of the proposed consumption of resources is not justified (e.g., the project involves the wasteful use of energy).

Determining whether the proposed project would result in significant irreversible effects requires a determination of whether key resources would be degraded or destroyed such that there would be little possibility of restoring them. Irretrievable commitments of resources should be evaluated to assure that such current consumption is justified.

Consumption of Nonrenewable Resources

The Plan Area is in the City of Pittsburg near the southern edge of Suisun Bay, within the larger San Francisco Bay. The Plan Area was part of the former Delta View Golf Course and is currently vacant. The land encompasses a variety of natural habitat types, including grasslands, wetlands, remnant patches of landscaping trees, and paved roads and parking areas. Biological resources and cultural resources impacts associated with future development in the Plan Area would be mitigated to less than significant, as described in Section 3.3, *Biological Resources* and Section 3.4, *Cultural Resources*.

Additionally, there exists high potential for paleontological resources to be present within the geologic units underlying the Plan Area (Quaternary old alluvium). Potential paleontological resources impacts associated with future grading and development in the Plan Area would be mitigated to less than significant as discussed in Section 3.5, *Geology and Soils*. Implementation of the proposed project would result in less than significant impacts to water bodies (drainage and water quality) as described in Section 3.8, *Hydrology*. The Plan Area does not support any agricultural and mineral resources and no impacts to these resources would result.

With regard to energy resources, actions related to future development would result in an irretrievable commitment of nonrenewable resources, including energy supplies and construction materials, such as lumber, steel, and aggregate. Non-renewable energy resources (coal, natural gas, and oil) would be used in construction, heating, and refrigeration of food and water, transportation, lighting, and other associated energy needs.

Development anticipated within the Plan Area, together with other projects in the City, would require the commitment or destruction of other nonrenewable and slowly renewable resources. These resources include (but are not limited to) lumber and other forested products; sand and gravel; asphalt; petrochemical construction materials; steel, copper, lead, other metals; and water. However, the amount and rate of consumption of these resources would not result in significant environmental impacts or the unnecessary, inefficient, or wasteful use of resources.

As described previously, the Plan Area was previously developed as the former Delta View Golf Course and is currently vacant. Any development projects occurring within the Plan Area would likely require the demolition of any existing structures as well as the use of additional resources to develop these parcels. The list of permitted uses within the Plan Area allows for a variety of development types and is included in Chapter 2, *Project Description*, and no specific projects are presumed.

In summary, future construction and operation associated with implementation of the proposed project would result in the irretrievable commitment of limited, slowly renewable, and nonrenewable resources, which would limit the availability of these particular resource quantities for future generations or for other uses. However, the use of such resources would be consistent with local and regional growth forecasts for the area. As such, although irreversible environmental changes would result from future development, such changes would not be considered significant.

Environmental Accidents

With respect to environmental accidents potentially associated with buildout within the Plan Area, potential impacts related to hazardous materials and associated health hazards from implementation of the proposed project would be avoided or reduced to below a level of significance through mandatory conformance with applicable regulatory/industry standards and codes. As described in Section 3.15, *Wildfires*, the Plan Area is located within a “high” FHSZ. All future development under the proposed project would be required to comply with the provisions of federal, state, and local requirements related to wildland fire hazards, including state fire safety regulations associated with wildland-urban interfaces, fire-safe building standards, and defensible space requirements. As future developments in the Plan Area are considered by the City, each

project would be evaluated for potential impacts associated with wildland fire hazards as required under CEQA.

Consumption of Resources

In general, there is potential for wasteful, inefficient, or unnecessary consumption of resources for all development. CEQA Guidelines Section 15126.2 requires the consideration of wasteful resources as significant environmental impacts. Section 3.6 of this PEIR discusses the proposed project and impacts related to unnecessary consumption. Section 3.6 also discusses how future development within the Plan Area and other development projects would be required to go through environmental review for wasteful energy consumption at the project-level.

4.4 EFFECTS FOUND NOT TO BE SIGNIFICANT

In accordance with CEQA Guidelines Section 15128, this section briefly describes the environmental issue areas that were determined not to be significant. It is determined that the proposed project would have no impact on agricultural and forestry resources and mineral resources. These topic areas are not discussed in full detail in Chapter 3, *Environmental Analysis*, and instead, a brief discussion of each of these environmental impacts is provided in this section.

AGRICULTURE AND FORESTRY RESOURCES

According to CEQA Guidelines, a project would have significant effect on agricultural and forest resources if it were to:

1. Convert Prime Farmland, Unique Farmland, or Farmland of Statewide Importance to non-agricultural use;
2. Conflict with existing zoning for agricultural use, or a Williamson Act contract;
3. Conflict with existing zoning for, or cause rezoning of, forest land, timberland, or timberland zoned Timberland Production; or
4. Result in the loss of forest land or conversion of forest land to non-forest use.

Important Farmland Maps for California are compiled using the Land Inventory and Monitoring (LIM) criteria; land that has been irrigated for agricultural production containing soils with favorable physical and chemical components are mapped as important. Soil criteria and for important farmland is determined and inventoried by the United States Department of Agriculture (USDA) Natural Resources Conservation Service (NRCS). Important farmland categories (Public Resources Code Section 21060.1) constitute: Prime Farmland, Farmland of Statewide Importance, Unique Farmland, Farmland of Local Importance, and Grazing Land.

As mapped and monitored by the California Department of Conservation (DOC) Farmland Mapping and Monitoring Program (FMMP), there are no lands within the Plan Area that are mapped as Prime Farmland, Unique Farmland, or Farmland of Statewide Importance. The Plan Area does not contain land zoned for agricultural use. In addition, based on DOC mapping (2023), there are no Williamson Act contracts within the Plan Area. Therefore, no conversion of agricultural use to non-agricultural use would result from the proposed project, resulting in no impact.

The Plan Area does not contain forest land and there are no areas designated for forest use. Therefore, development of the Plan Area would not result in the loss of forest land or timber production.

MINERAL RESOURCES

According to CEQA Guidelines, a project would have significant effect on mineral resources if it would:

1. Result in the loss of availability of a known mineral resource that would be of value to the region and the residents of the state; or
2. Result in the loss of availability of a locally important mineral resource recovery site delineated on a local general plan, specific plan or other land use plan.

The Plan Area is not designated by the State for locally important mineral resources, nor is the Plan Area utilized for mineral resource production. As such, future development under the proposed project would not impact mineral resources.

5.1 CEQA REQUIREMENTS

The California Environmental Quality Act (CEQA) requires that an Environmental Impact Report (EIR) analyze a reasonable range of feasible alternatives that meet most or all of the proposed project objectives while potentially reducing or avoiding one or more environmental effects of the proposed project. The range of alternatives required in an EIR is governed by a “rule of reason” that requires an EIR to set forth only those alternatives necessary to permit a reasoned choice (CEQA Guidelines Section 15126.6[f]). Where a potential alternative was examined but not chosen as one of the range of alternatives, the CEQA Guidelines require that the EIR briefly discuss the reasons the alternative was dismissed.

Alternatives that are evaluated in the EIR must be potentially feasible alternatives. However, not all possible alternatives need to be analyzed. An EIR must “set forth only those alternatives necessary to permit a reasoned choice.” (CEQA Guidelines, Section 15126.6(f).) The CEQA Guidelines provide a definition for a “range of reasonable alternatives” and, thus limit the number and type of alternatives that need to be evaluated in an EIR. An EIR need not include any action alternatives inconsistent with the lead agency’s fundamental underlying purpose in proposing a project. (*In re Bay-Delta Programmatic Environmental Impact Report Coordinated Proceedings* (2008) 43 Cal.4th 1143, 1166.)

First and foremost, alternatives in an EIR must be potentially feasible. “Among the factors that may be taken into account when addressing the feasibility of alternatives are site suitability, economic viability, availability of infrastructure, general plan consistency, other plans or regulatory limitations, jurisdictional boundaries..., and whether the proponent can reasonably acquire, control or otherwise have access to the alternative site (or the site is already owned by the proponent)” (Section 15126.6[f][1]).

For each alternative, this analysis:

- Describes the alternative.
- Analyzes the impact of the alternative as compared to the Project.
- Identified the impacts of the project that would be avoided or lessened by the alternative.
- Assesses whether the alternative would meet most of the basic project objectives.
- Evaluated the comparative merits of the alternative and the project.

5.2 FACTORS GUIDING SELECTION OF ALTERNATIVES

PROJECT OBJECTIVES

The alternatives to the proposed project selected for analysis in the EIR were developed to minimize significant environmental impacts while fulfilling the basic objectives of the proposed project. Significant impacts are summarized in Chapter 4.0 and described in greater detail in Sections 3.1

through 3.16. As described in Chapter 2.0, *Project Description*, the following objectives have been identified for the proposed project:

- Develop a comprehensive master plan for the Plan Area that provides for technology park uses while incorporating essential infrastructure facilities.
- Foster economic and employment opportunities within the community by expanding the variety of industrial, office, and technology park uses.
- Enable the construction of industrial or office buildings that will be attractively incorporated into the landscape, while minimizing impacts to the surrounding natural environment and sensitive resources.
- Identify and facilitate the installation and ongoing maintenance of water, sewer, drainage, and road infrastructure in connection with future development projects in the Plan Area.
- Establish guidelines and standards for building and site development aesthetics that create a distinctive and cohesive identity for the Plan Area.

5.3 ALTERNATIVES ANALYZED IN THIS EIR

Based on the project objectives listed above, the following four alternatives have been determined to represent a reasonable range of alternatives to the proposed Project. These alternatives are analyzed in detail in the following section.

Alternative A: No Project/No Development Alternative

The No Project/No Development Alternative is analyzed based on the CEQA Guidelines Section 15126.6(e)(3)(B), which states:

In certain instances, the no project alternative means ‘no build’ wherein the existing environmental setting is maintained.

Under the No Project/No Development Alternative, the proposed project would not be implemented, and no new development would occur.

Alternative B: No Project/Adopted 2040 General Plan Alternative

The No Project/Existing General Plan Alternative is based on the CEQA Guidelines section 15126.6(e)(3)(A) which states:

When the project is the revision of an existing land use or regulatory plan, policy or ongoing operation, the “no project” alternative will be the continuation of the existing plan, policy or operation into the future. Typically, this is a situation where other projects initiated under the existing plan will continue while the new plan is developed. Thus, the projected impacts of the proposed plan or alternative plans would be compared to the impacts that would occur under the existing plan.

Consistent with CEQA Guidelines, Alternative B would not adopt or implement the development program proposed under the Pittsburgh Technology Center Specific Plan. The Plan Area would conform to the 2040 General Plan and Zoning.

Alternative C: Phase I Data Hub Development Only

Alternative C would continue to provide a job-creating development in a portion of the Plan Area under separate approvals; however, it would not adopt or implement the proposed project. Alternative C considers development of the Pittsburgh Data Hub (PDH) for Phase I of the Plan Area. The PDH is composed of a 347,000 square foot data center, commercial switching yard and PG&E electrical substation, along with ancillary facilities, as described below. The City Zoning Administrator would need to approve a development permit for the PDH to demonstrate conformance with the IL-O. It is assumed that the remainder of the Plan Area would not be developed and would be retained as vacant land for the foreseeable future.

The PDH project includes an emergency backup generating facility with a generation capacity of up to 92 megawatts (MW) to support the need for the PDH to provide uninterruptible power supply for its tenant's servers. The Pittsburgh Back-up Generating Facility (PBGF) would consist of 37, 3 MW diesel-fired backup generators arranged in a generation yard located on the west side of the PDH. A total of 36 generators would be dedicated to replacing the electricity needs of the data center in case of a loss of utility power, and one additional generator would be used to support general office loads along with building and life safety services. An application for a Small Power Plan Exemption (SPPE) was submitted to the California Energy Commission (CEC) on February 28, 2024, for the PBGF (24-SPPE-1). The entirety of the SPPE application, including a detailed analysis of the potential PDH project impacts, is included as Appendix C to this Program Environmental Impact Report (PEIR).

Alternative D: Limited Uses Alternative

Alternative D would revise the list of permitted uses in the proposed project to place more emphasis on technology center, research, innovation, and light industrial uses. Specifically, this Alternative would eliminate all office, logistics, and warehouse uses, thereby reducing vehicle miles traveled (VMT), truck trips and associated diesel emissions. Alternative D was developed to reduce potential impacts associated with air quality, greenhouse gases, energy, noise, and transportation.

An EIR must identify an "environmentally superior" alternative and where the No Project Alternative is identified as environmentally superior, the EIR is then required to identify as environmentally superior an alternative from among the others evaluated. Each alternative's environmental impacts are compared to the proposed project and determined to be environmentally superior, neutral, or inferior. *Section 5.6, Environmentally Superior Alternative*, identifies the Environmentally Superior Alternative.

5.4 ALTERNATIVES REJECTED AS INFEASIBLE

The following is a discussion of the alternatives considered during the scoping and planning process and the reasons why they were not selected for detailed analysis in this Draft EIR.

ALTERNATIVE DEVELOPMENT AREAS

CEQA requires that the discussion of alternatives focus on alternatives to the proposed project or its location that are capable of avoiding or substantially lessening any significant effects of the proposed project. The key question and first step in the analysis is whether any of the significant

effects of the proposed project would be avoided or substantially lessened by putting the proposed project in another location. Only locations that would avoid or substantially lessen any of the significant effects of the proposed project need be considered for inclusion in the EIR (State CEQA Guidelines Section 15126[5][B][1]). In addition, an alternative site need not be considered when implementation is “remote and speculative,” such as when the alternative site is beyond the control of a project applicant.

There are no suitable alternative sites within the control of the Project Applicant. In the event land could be purchased of suitable size and developmental characteristics, based on the known general conditions in the southern portion of the City, an alternative site would likely have similar impacts as the proposed project. Given the size and nature of the proposed project and the proposed project objectives, it would be impractical and infeasible to propose the Project on an alternate site in the area with fewer environmental impacts.

5.5 ENVIRONMENTAL ANALYSIS OF THE ALTERNATIVES

The alternatives analysis provides a summary of the relative impact level of significance associated with each alternative for each of the environmental issue areas analyzed in this PEIR. Table 5-1 below summarizes the comparative effects of each alternative.

ALTERNATIVE A: NO PROJECT/NO DEVELOPMENT ALTERNATIVE

Description

CEQA Guidelines Section 15126.6(e)(3)(B) requires the analysis of the No Project/No Development Alternative. In accordance with the CEQA Guidelines, under the No Project/No Development Alternative, the proposed project would not be implemented, and no new development would occur.

The Plan Area generally encompasses the eastern half of the former Delta View Golf Course, south of West Leland Road. The Plan Area consists of three individual parcels totaling approximately 76.4 acres. The Contra Costa Canal runs east-west through the Plan Area, separating the site into two major project areas. The Plan Area is predominantly undeveloped and includes remnant features of the former golf course including sand pits, paved roads, and parking areas. Vegetation onsite primarily consists of annual grasses and large trees with some wetlands occurring in larger drainage swales. Accordingly, the No Project/No Development Alternative provides a comparison between the environmental impacts with implementation of the proposed project and buildout of the Plan Area as compared to the current environmental conditions, without any future development occurring.

TABLE 5-1. ALTERNATIVES IMPACT SUMMARY

<i>Environmental Issue Area</i>	<i>Specific Plan (Proposed Project)</i>	<i>No Project/No Development</i>	<i>No Project/2040 General Plan</i>	<i>Phase I Data Hub Development</i>	<i>Limited Uses</i>
<i>Aesthetics</i>	LTS	Less than	Greater than	Less than	Similar
<i>Air Quality</i>	LTS with Mitigation	Less than	Greater than	Less than	Less than
<i>Biological Resources</i>	LTS with Mitigation	Less than	Similar	Less than	Similar
<i>Cultural and Tribal Cultural Resources</i>	LTS with Mitigation	Less than	Similar	Similar	Similar
<i>Greenhouse Gas Emissions and Energy</i>	LTS	Less than	Greater than	Less than	Less than
<i>Geology and Soils</i>	LTS	Less than	Similar	Similar	Similar
<i>Hazards and Hazardous Materials</i>	LTS	Less than	Similar	Similar	Similar
<i>Hydrology and Water Quality</i>	LTS	Less than	Similar	Similar	Similar
<i>Land Use and Planning</i>	LTS	Greater than	Similar	Similar	Similar
<i>Noise</i>	LTS with Mitigation	Less than	Greater than	Less than	Less than
<i>Population and Housing</i>	LTS	Less than	Similar	Similar	Similar
<i>Public Services and Recreation</i>	LTS	Less than	Similar	Similar	Similar
<i>Transportation and Traffic</i>	LTS with Mitigation	Less than	Greater than	Less than	Less than
<i>Utilities and Service Systems</i>	LTS	Less than	Greater than	Less than	Less than
<i>Wildfire</i>	LTS	Similar	Similar	Similar	Similar

Comparative Analysis of Environmental Effects

AESTHETICS

Under the No Project/No Development Alternative, the visual character and quality of the Plan Area would be maintained in its existing condition. No new structures, landscaping, or lighting would be introduced. The No Project/No Development Alternative would not have the potential to conflict with the character or quality of existing and planned development surrounding the Plan Area and would not create a new source of substantial light or glare that would impact nighttime views in the area. No impacts related to aesthetics would occur under the No Project/No Development

Alternative. Therefore, under this Alternative, impacts regarding aesthetics, light, and glare would be reduced when compared to the proposed project.

AIR QUALITY

Under the No Project/No Development Alternative, no new development would occur; thereby no construction related or operational emissions would occur. Additionally, by maintaining the Plan Area as vacant land, the increase in operational traffic-related emissions would not occur. No impacts related to air quality would occur under the No Project/No Development Alternative. Therefore, impacts under the No project/No Development Alternative would be reduced compared to the proposed project.

BIOLOGICAL RESOURCES

Under the No Project/No Development Alternative, the currently vacant land would be maintained. No grading or alterations to the Plan Area would occur from future development projects. Therefore, there would be no potential impacts to special-status species or their habitat. In addition, no potential impacts to migratory birds, jurisdictional waters, or wildlife corridors would occur under the No Project/No Development Alternative. Therefore, impacts under this alternative would be reduced compared to the proposed project.

CULTURAL AND TRIBAL CULTURAL RESOURCES

As previously described, no grading or development would occur under this Alternative. Therefore, there would be no potential impacts to subsurface historical, archaeological or tribal cultural resources. Therefore, the No Project/No Development Alternative would avoid site disturbances within the Plan Area and the potential to encounter and impact cultural resources would not occur. Impacts under this Alternative would be reduced compared to the proposed project.

GEOLOGY AND SOILS

No subsequent construction activities, including demolition and grading, would occur under the No Project/No Development Alternative. Therefore, impacts concerning seismic ground shaking, liquefaction, lateral spreading, subsidence, or collapse within the Project site would not occur. Furthermore, this Alternative would not result in impacts to paleontological resources since no grading would occur. Therefore, impacts under the No Project/No Development Alternative would be reduced compared to the proposed project.

GREENHOUSE GAS EMISSIONS AND ENERGY

Under the No Project/No Development Alternative, no subsequent development would occur, and no construction, demolition, or operational activities would generate GHG emissions. Furthermore, this alternative would not increase GHG emissions, unlike the proposed project. Therefore, impacts under the No Project/No Development Alternative would be reduced compared to the proposed project.

HAZARDS AND HAZARDOUS MATERIALS

Because there is no potential for future development to occur under the No Project/No Development Alternative, there would be no impacts related to hazards or hazardous materials.

Under this Alternative, fuels, lubricants, and greases in construction equipment would not be utilized and there would be no potential for an accidental release to occur. Therefore, impacts under this Alternative would be reduced compared to the proposed project.

HYDROLOGY AND WATER QUALITY

Under the No Project/No Development Alternative, water quality conditions, groundwater supplies, drainage patterns, and runoff amounts would not be altered. Although these conditions would remain as is, this Alternative would not include the potential for new source control, site design, and treatment best management practices to minimize runoff and water pollution, which would be required for future development under the proposed project. Overall, impacts under this Alternative would be less than the proposed project.

LAND USE AND PLANNING

The Plan Area would be maintained as vacant property under the No Project/No Development Alternative. The No Project/No Development Alternative for the Plan Area would be inconsistent with the 2040 General Plan Employment Center Industrial (ECI) land use designation for the property. Furthermore, this Alternative would be inconsistent with 2040 General Plan policies related to encouraging the development and intensification of employment centers, including high quality, professional office campuses, business parks, and industrial parks, along with innovation districts, related mixed-use development and open spaces. Therefore, the No Project/No Development Alternative would have a greater impact than the proposed project.

NOISE

The No Project/No Development Alternative would not result in future development in the Plan Area. Therefore, the potential for new sources of temporary or operational sources of noise or vibration would not occur. Additionally, there would be no potential for an increase in mobile-source noise resulting from this Alternative. Therefore, impacts under this Alternative would be reduced compared to the proposed project.

POPULATION AND HOUSING

Employment growth would not occur under the No Project/No Development Alternative because the potential for development of a new employment center would not occur. Because no new development bringing additional employees to the area would not occur, there would be no impact to population and housing. Therefore, impacts under this Alternative would be reduced compared to the proposed project.

PUBLIC SERVICES AND RECREATION

Under the No Project/No Development Alternative, there would be no increase in demand for fire or police services, or recreational facilities. Therefore, this Alternative would have no impact on public services and recreation. Impacts under this Alternative would be reduced compared to the proposed project.

TRANSPORTATION AND TRAFFIC

Under the No Project/No Development Alternative, no new employees or truck trips resulting from future development would occur, and no VMT would be generated from the site. Additionally, no potential impacts to traffic would occur since the Plan Area would remain vacant. Therefore, no impacts to transportation or traffic would occur under this Alternative and would be reduced compared to the proposed project.

UTILITIES AND SERVICE SYSTEMS

The potential for future development would not occur under the No Project/No Development Alternative; therefore, there would be no increase in demand for utilities or services to the Plan Area. Furthermore, no additional demand for regional water supplies or wastewater treatment would be required. This Alternative would have no impacts on utilities and service systems, which would be reduced compared to the proposed project.

WILDFIRE

Under the No Project/No Development Alternative, the Plan Area would remain vacant and undeveloped for the foreseeable future. Therefore, there would be no potential for future development to facilitate or exacerbate the spread of wildfires thereby exposing occupants to pollutant concentrations from wildfire. Furthermore, this Alternative would not expose people or structures to risks related to downslope or downstream flooding or landslides as a result of post-fire conditions. However, by keeping the Plan Area in its existing condition, natural vegetation would continue to grow thereby increasing fire fuel.

Although this Alternative would not introduce additional structures or people to fire-related risks, retaining the Plan Area in its natural condition would still have risks associated with wildfire. Therefore, impacts related to wildfire would be similar under this Alternative compared to the proposed project.

Conclusion Regarding the No Project/No Development Alternative

The No Project/No Development Alternative would reduce impacts related to most environmental issues including aesthetics, air quality, biological resources, cultural and tribal cultural resources, geology and soils, GHG emissions and energy, noise, population and housing, public services and recreation, transportation, and utilities. However, impacts to land use and planning would be greater under this alternative, and impacts associated with wildfires would be similar.

Implementation of the No Project/No Development Alternative would mean that the proposed project would not be implemented, no development would occur in the Plan Area, and none of the proposed project objectives would be achieved. The No Project/No Development Alternative would not develop a Specific Plan that provides for technology park uses (objective 1); foster economic opportunities within the community (objective 2); provide attractive construction of industrial or office buildings (objective 3); facilitate the implementation of roads, utilities and other infrastructure in connection with development of the Plan Area (objective 4); and establish standards for aesthetic and cohesive development for the Plan Area (objective 5).

ALTERNATIVE B: NO PROJECT/ADOPTED 2040 GENERAL PLAN ALTERNATIVE

Description

Section 15126.6(e) of the CEQA Guidelines requires that an EIR evaluate and analyze the impacts of the “No Project” Alternative. When the proposed project is the revision of an existing land use or regulatory plan or policy, the “No Project” Alternative is the continuation of the plan or policy. Therefore, under the No Project/Existing General Plan Alternative, the City of Pittsburgh 2040 General Plan land uses and zoning would remain in effect, and development would occur in accordance with the 2040 General Plan.

Under Alternative B, development of the Plan Area would proceed pursuant to the 2040 General Plan and zoning map. As shown in Table 2-1 of Chapter 2, *Project Description*, buildout potential under the Alternative B would total 3,300 employees. Compared to the proposed project, the No Project Alternative would result in an increase in employees. Specifically, Alternative B would have approximately 1,782 more employees than what is assumed for the buildout of the Plan Area.

Although the Specific Plan would not change the land use designation nor the density standards, the primary difference between the proposed project and Alternative B is that the proposed project would regulate the allowed uses and future buildout of the Plan Area in a cohesive manner. Without the land use and property development regulations included in the proposed project, future buildout of the Plan Area would be expected to occur largely on a parcel-by-parcel basis without a unified approach.

Comparative Analysis of Environmental Effects

AESTHETICS

Under the No Project/Adopted 2040 General Plan Alternative, the development area would be the same as the proposed Plan Area. The Plan Area would be developed pursuant to the 2040 General Plan, which could include a variety of permitted uses such as business parks, large scale medical facilities, light industrial and manufacturing facilities. Because the proposed project provides a set of unified property development regulations for the Plan Area, without the proposed project, the City Zoning Administrator would need to review and approve future development permits to determine zoning conformance on a case-by-case basis. Future development under Alternative B would lack cohesion without the development standards and design guidelines identified for the Plan Area as established by the proposed Specific Plan. Individual developments would be expected to comply with the City of Pittsburgh Municipal Code (PMC) requirements including, without limitation, those related to heights, scale, and setbacks. Therefore, impacts related to aesthetics under this alternative would be greater than those of the proposed project.

AIR QUALITY

As previously described, buildout of the Plan Area pursuant to the 2040 General Plan would allow for the development of a variety of employment-center industrial uses. Construction activities under Alternative B could potentially create air quality impacts through the use of heavy-duty construction

equipment and vehicle trips generated from construction workers traveling to and from the Plan Area. It is assumed that construction activities for future development under Alternative B would be substantially similar to those of the proposed project.

Although construction within the Plan Area would be similar to the proposed project, operational impacts of Alternative B would generate higher levels of criteria pollutant emissions associated with vehicle trips. The 2040 General Plan is assumed to result in approximately 1,782 more employees than the proposed project and allows for all permitted uses in the ECI land use designation, including large scale medical facilities. Therefore, operational impacts related to air pollutant emissions under Alternative B is assumed to be greater when compared to the proposed project.

BIOLOGICAL RESOURCES

The No Project/Adopted 2040 General Plan Alternative would have the same overall impact area as the Plan Area. It is expected for similar impacts to jurisdictional waters, sensitive species, and migratory and nesting birds to occur under this Alternative. Future development, pursuant to the 2040 General Plan, would also have the potential to interfere with native or migratory wildlife species or corridors.

Development under this Alternative would be required to adhere to all applicable federal, state, and local regulations, policies, and ordinances protecting biological resources. Additionally, future development projects would be required to show consistency with the adopted East Contra Costa HCP/NCCP. It is expected for similar mitigation measures from the proposed project to be implemented for future projects proposed under this Alternative. Therefore, impacts would be similar when compared to the proposed project.

CULTURAL AND TRIBAL CULTURAL RESOURCES

Under Alternative B, buildout of the Plan Area is not anticipated to have a significant impact on any historic resources within or adjacent to the Plan Area. Furthermore, projects under this Alternative would involve ground-disturbing activities that have a similar potential to damage or destroy previously unidentified archaeological or tribal cultural resources. Therefore, Alternative B would be required to implement similar mitigation measures as the proposed project to reduce the potential for impacts to archaeological resources during construction. Impacts to cultural and tribal cultural resources under this Alternative would be similar to the proposed project.

GEOLOGY AND SOILS

Under the No Project/Adopted 2040 General Plan Alternative, the development area would be the same as the proposed project's Plan Area. Future development of the Plan Area would still result in exposing additional persons and structures in the Plan Area to risks associated with geologic hazards. The No Project/Adopted 2040 General Plan Alternative would be required to comply with the same regulatory requirements as the proposed project. Therefore, this Alternative would have similar impacts when compared to the proposed project.

Furthermore, this Alternative has the same potential to effect undiscovered paleontological resources in the Plan Area as the proposed project. However, it is expected that this Alternative

would be required to implement similar mitigation measures to the proposed project. Therefore, this Alternative would have the same impacts to paleontological resources when compared to the proposed project.

GREENHOUSE GAS EMISSIONS AND ENERGY

The No Project/Adopted 2040 General Plan Alternative would have the same overall impact area; however, this alternative would result in additional employees and higher-intensity permitted uses. Therefore, it is anticipated that this Alternative would result in higher levels of GHG emissions than the proposed project.

HAZARDS AND HAZARDOUS MATERIALS

This Alternative would have the same development area as the proposed project's Plan Area. Therefore, the same potential for impacts related to exposure to any existing onsite hazards or hazardous materials and wildland fires would occur under this Alternative as the proposed project. The No Project/Adopted 2040 General Plan Alternative would allow for development of large scale medical facilities which may require the routine transport, use, or disposal of hazardous materials, which could be slightly greater than the proposed project. However, the Alternative would be expected to comply with all of the same federal, state, and local laws and permitting requirements as would be completed for the proposed project. Therefore, this Alternative would result in similar impacts associated with hazards and hazardous materials when compared to the proposed project.

HYDROLOGY AND WATER QUALITY

Similar to the proposed project, land disturbance affecting hydrology and water quality would occur during construction activities under the No Project/Adopted 2040 General Plan Alternative. This Alternative would alter the existing drainage pattern of the site and would likely result in similar impacts to stormwater runoff and groundwater recharge, as the proposed project. It is expected that development under this Alternative would adhere to regulatory requirements related to water quality management including the implementation of NPDES permits, other discharge permits, WQMPs, SWPPPs, and BMPs. Therefore, the No Project/Adopted 2040 General Plan Alternative would result in impacts similar to those that would occur from the proposed project.

LAND USE AND PLANNING

Under the No Project/Adopted 2040 General Plan Alternative, the Plan Area would be built out in accordance with the 2040 General Plan, Pittsburg Municipal Code (PMC) zoning regulations and land use designation criteria. Build out of the Plan Area under Alternative B pursuant to the 2040 General Plan would allow for uses that have greater potential impacts associated with air quality, greenhouse gas emissions, energy, noise, and transportation.

Similar to the proposed project, Alternative B would be consistent with the applicable goals and policies of the 2040 General Plan adopted for the purpose of avoiding or mitigating environmental effects. Overall, under this Alternative, impacts related to land use and planning would be similar to that of the proposed project.

NOISE

It is anticipated that the buildout of the Plan Area under Alternative B would result in similar construction activities as the proposed project; thereby resulting in similar construction-related noise and vibration impacts. However, because the 2040 General Plan assumes a greater amount of employees, this Alternative would result in greater noise levels associated with an increase in project-generated vehicle trips. Because additional vehicle trips would be generated under the No Project/Adopted 2040 General Plan Alternative, greater noise-related impacts would result than that of the proposed Project.

POPULATION AND HOUSING

The No Project/Adopted 2040 General Plan Alternative would increase the number of employees serving the Plan Area; however, future buildout would be consistent with the 2040 General Plan. This Alternative would accommodate the planned growth within the City as identified in the 2040 General Plan by fostering economic opportunities for a growing population, rather than inducing unplanned growth. Development under this Alternative would be required to conform to the 2040 General Plan and City Zoning Ordinance. Therefore, impacts to population and housing under this Alternative would be similar to the proposed project.

PUBLIC SERVICES AND RECREATION

Under the No Project/Adopted 2040 General Plan Alternative, buildout of the Plan Area would increase the demand for public services, including fire and police protection services. Similar to the proposed project, this Alternative would require payment of fees, and compliance with applicable plans and regulations. Therefore, this Alternative would have similar impacts when compared to the proposed Project.

TRANSPORTATION AND TRAFFIC

Under the No Project/Adopted 2040 General Plan Alternative, buildout of the Plan Area is assumed to generate 3,300 employees. Compared to the proposed project's total of 1,582 employees, this Alternative would generate an additional 1,718 employees. The Contra Costa Transportation Authority's Transportation Analysis Guidelines were used in the 2040 General Plan to determine total daily trips. This Alternative would result in an additional 3,006 daily trips, thereby increasing VMT. It is expected that projects under this Alternative would be developed consistent with the 2040 General Plan's goals, policies, and actions. Additionally, it is expected that mitigation measures similar to that proposed for the proposed project would be implemented under this Alternative.

Under Alternative B, development throughout the Plan Area would be expected to occur on a parcel-by-parcel basis. Without implementation of the proposed project, the Plan Area would not be expected to have coordinated internal circulation network with a focus on creating a pedestrian-friendly environment. Any proposed improvements would be designed per standard City procedures and requirements.

For the reasons stated above, impacts resulting from the No Project/Adopted 2040 General Plan Alternative would be greater than those associated with the proposed Project.

UTILITIES AND SERVICE SYSTEMS

The No Project/Adopted 2040 General Plan Alternative would result in similar impacts to utilities and service systems due to similar permitted uses designated for the Plan Area in the 2040 General Plan. This Alternative does have the potential to increase the demand for water and wastewater, solid waste services, and gas and electricity services when compared to the proposed project due to the permitted use of large scale medical facilities. Under this Alternative, demand for regional water supplies would occur and additional wastewater would be conveyed to the water treatment plant. Therefore, impacts to utilities and service systems would be similar and potentially greater than that of the proposed project.

WILDFIRE

Similar to the proposed project, future development would be subject to all applicable City regulations, reviews, and requirements pertaining to emergency response, emergency access, and maintaining emergency evacuation routes, as well as further CEQA analysis of project-specific impacts. Furthermore, new buildings would require a Fire District review for access compliance before project approval. These measures align with established fire prevention standards and ensure efficient emergency vehicle access rather than impairing an adopted emergency response or evacuation plan. Therefore, this impact would be similar to the proposed project.

This Alternative would also introduce new fire hazards or fire risk to people and structures in the Plan Area. However, existing provisions of federal, State, and local requirements related to wildland fire hazards, including State fire safety regulations associated with wildland-urban interfaces, fire-safe building standards, and defensible space would be required. Additionally, development on parcels south of the Contra Costa Canal would introduce new risks, including downslope landslides as a result of post-fire instability. It is anticipated that a similar mitigation measure identified in the proposed project would be required for this Alternative. Therefore, impacts under this Alternative would be similar to that of the proposed project.

Conclusion Regarding the No Project/Adopted 2040 General Plan Alternative

The No Project/Adopted 2040 General Plan Alternative would result in greater impacts to aesthetics, air quality, GHG emissions and energy, noise, transportation, and utilities than the proposed project. This Alternative would result in similar impacts to biological resources, cultural and tribal cultural resources, geology, hazards and hazardous materials, hydrology, land use and planning, population and housing, public services and recreation, and wildfire.

Implementation of the No Project/Adopted 2040 General Plan Alternative would meet two of the five project objectives. Under this Alternative, a comprehensive Specific Plan would not be developed (objective 1), nor would this Alternative establish standards for aesthetic and cohesive development for the Plan Area (objective 5); development under this Alternative would occur in a piecemeal fashion without the continuity of design and planning as provided under the proposed project. However, this Alternative would still foster economic opportunities within the community (objective 2) through the implementation of the ECI land use designation; and facilitate the

implementation of roads, utilities and other infrastructure in connection with development of the Plan Area (objective 4). Objective 3 would be partially met by this Alternative, in that future development would still be required to comply with General Plan policy and zoning; however, site design would not necessarily occur in a cohesive fashion, resulting in a less attractive overall incorporation of development into the landscape.

ALTERNATIVE C: PHASE I DATA HUB DEVELOPMENT ONLY

Description

Under Alternative C, the proposed project would not be implemented and would instead consider the Pittsburgh Data Hub (PDH) as a reasonably foreseeable development proposal for an approximately 22.31-acre portion of the former Delta View Golf Course (Golf Course) site. The PDH is composed of a 347,000 square foot data center, commercial switching yard and PG&E electrical substation, along with ancillary facilities. The City Zoning Administrator would need to approve a development permit for the PDH to demonstrate conformance with the IL-O. It is assumed that the remainder of the Plan Area would not be developed and would be retained as vacant land for the foreseeable future.

An application for a Small Power Plan Exemption (SPPE) was submitted to the California Energy Commission (CEC) on February 28, 2024, for the PBGF (24-SPPE-1). The entirety of the SPPE application, including a detailed analysis of the potential PDH project impacts, is included as Appendix C to this Program Environmental Impact Report (PEIR). Because the SPPE Application is a publicly available document and includes a project-specific detailed analysis, the PEIR analysis of Alternative C contains a more detailed environmental evaluation than the other alternatives, as required for a PEIR.

Comparative Analysis of Environmental Effects

AESTHETICS

Development of the PDH on an approximately 22.31-acre portion of the former Golf Course site would proceed in accordance with the 2040 General Plan policies and PMC governing scenic quality and character. The development would not incorporate large glass panels that would significantly increase glare, and all lighting would be installed in accordance with PMC. Additionally, all building materials and lighting plans would be reviewed by the City through its Design Review process prior to issuance of building permits.

Because Phases II and III of the Plan Area would not be developed under this Alternative, impacts to this area, which has dispersed trees, natural vegetation, and undulating ridgelines providing a visually-pleasing landscape would be impacted to a lesser magnitude than the proposed project. Therefore, the Phase I Data Hub Development Only Alternative would result in reduced impacts, as compared to the proposed project.

AIR QUALITY

As described in Appendix C of this PEIR, the PDH would not result in a cumulatively considerable net increase in any criteria pollutants for construction activities. The emissions estimated during construction activities assume that emissions are reduced with the implementation of best management practices recommended by the BAAQMD CEQA Guidelines.

Operation of the PDH would not result in a cumulatively considerable net increase of any criteria pollutant when compared with BAAQMD CEQA significance thresholds. An air quality modeling analysis was performed to compare the modeled impacts during maintenance and testing of the generators to the national and California air quality standards. The analysis demonstrated that the maximum modeled ambient concentrations from PDH operation, when combined with background concentrations were found to be less than the applicable NAAQS and CAAQS for all pollutants, except the 24-hour PM_{2.5} NAAQS and 24-hour PM₁₀ CAAQS. In these two cases, the PM_{2.5} and PM₁₀ background concentrations exceed the standards on their own. Therefore, Project concentrations were compared against the respective significant impact levels and were found to be below those values.

Future development would only be constructed on an approximately 22.31-acre portion of the former Delta View Golf Course site, and modeled air quality analyses demonstrate that the PDH development project would result in less than significant impacts. Therefore, the Phase I Data Hub Development Only Alternative would result in a reduced impact when compared to the proposed project.

BIOLOGICAL RESOURCES

Biological resource impacts would be substantially reduced under the Phase I Data Hub Development Only Alternative. Impacts to special-status plant and animal species, sensitive habitat, natural communities, and jurisdictional waters would be reduced due to the smaller development footprint of this Alternative.

As described in Appendix C of this PEIR, the most important avenue for wildlife movement in the PDH vicinity is the PG&E transmission line corridor immediately to the east, which is generally open, containing a through-flowing stream as noted above, and provides direct connectivity from to the edge of Suisun Bay. Importantly, this corridor also connects to the south via a crossing over the Contra Costa Canal at the southeast corner of Phase I. Development of the PDH would result in a minor encroachment on the corridor along the transmission line associated with replacement of the existing stormwater discharge pipe, and would not alter the existing canal crossing. Therefore, development of the PDH would eliminate the potential interference with a wildlife corridor.

Development of the PDH would be required to adhere to all applicable federal, state, and local regulations, policies, and ordinances protecting biological resources. Additionally, similar measures to the proposed project would also be implemented under this Alternative to ensure impacts to biological resources would be reduced to less than significant level. Because the extent of construction would be smaller under this Alternative than under the proposed project, the impact on biological resources would be of a lesser magnitude.

CULTURAL AND TRIBAL CULTURAL RESOURCES

Under this Alternative, development of the PDH would not result in a significant impact on any known historic resource within or adjacent to the development area.

As described in Section 3.4, *Cultural and Tribal Cultural Resources*, of this PEIR, the Contra Costa Canal was determined to be eligible for the NRHP and CRHR under Criterion A/1. The Contra Costa Canal is located within an easement that extends beyond its physical structure. As described in Appendix C, construction of the PDH development would not extend into the easement and would involve limited grading activities near the canal. To further ensure construction activities would not affect the Contra Costa Canal, similar mitigation measures have been proposed. These measures would ensure that workers are trained to avoid and/or protect against accidental damage to the Contra Costa Canal and would require the presence of an archaeological monitor on-site during grading and excavation activities to ensure that such activities avoid damage to the canal.

Development of the PDH under this Alternative would involve ground-disturbing activities that have a similar potential to damage or destroy previously unidentified archaeological or tribal cultural resources as the proposed project. Therefore, Alternative C would also be required to implement similar mitigation measures as the proposed project to reduce the potential for impacts to archaeological or tribal cultural resources during construction. Because this Alternative would develop a smaller portion of the Plan Area, this Alternative would have a lower likelihood of encountering previously unknown resources as compared to the proposed project. As such, impacts to cultural and tribal cultural resources under this Alternative would be similar when compared to the proposed project.

GEOLOGY AND SOILS

The impacts associated with geologic hazards under Alternative C would be similar to the proposed project but of a lesser magnitude. Alternative C would have a smaller total footprint and less employees than the proposed project. However, this Alternative would still require grading and development in a seismically active region. Therefore, additional persons and structures would be in an area subject to risks associated with seismic ground shaking and geologic hazards. Development of the PDH would be required to comply with the same regulatory requirements as the proposed project.

Development under this Alternative would still involve ground-disturbing activities that have a potential to damage or destroy previously unidentified paleontological resources. Therefore, Alternative C would also be required to implement similar mitigation measures as the proposed project to reduce the potential for impacts to paleontological resources during construction. As such, impacts to paleontological resources under this Alternative would be similar when compared to the proposed project.

GREENHOUSE GAS EMISSIONS AND ENERGY

As detailed in Appendix C of this PEIR, construction of the PDH would result in approximately 1,171 metric tons of emissions per year, including demolition, site preparation, grading, and on-and-off-site construction.

On an annual basis, the PDH's total operational emissions related to emergency backup generator maintenance and testing use would be approximately 2,862 metric tons of CO₂e per year. This is well below the BAAQMD threshold for stationary sources of 10,000 metric tons per year of CO₂e for stationary sources. Operation of the PDH would consume energy for multiple purposes including, but not limited to, building heating and cooling, lighting, appliances and electronics. Energy would also be consumed during each vehicle trip generated by employees and visitors.

Because the Phase I Data Hub Development Only Alternative would have a significantly smaller development footprint than the proposed project, construction and operational emissions would be lower than those estimated for the proposed project.

HAZARDS AND HAZARDOUS MATERIALS

Alternative C would have a substantially smaller development area compared to the proposed project, and Phase I is not located in or near state responsibility areas or lands classified as very high fire hazards severity zones. Construction of Phase I would result in the same type of hazardous materials typically used for construction. However, less construction activity would be required, which could lead to fewer overall construction impacts associated with hazardous materials than the proposed project. Operation-related impacts are also anticipated to be reduced compared to the proposed project as a result of less development. This Alternative would be expected to comply with all of the same federal, state, and local laws and permitting requirements as would be completed for the proposed project. Overall, this Alternative would result in similar impacts when compared to the proposed project.

HYDROLOGY AND WATER QUALITY

Similar to the proposed project, land disturbance affecting hydrology and water quality would occur during construction activities but at a lesser magnitude. Development under this Alternative would adhere to the same regulatory requirements as the proposed project related to water quality management, including the implementation of NPDES permits, WQMPs, SWPPPs, and BMPs. Therefore, this Alternative would result in similar impacts to hydrology and water quality when compared to the proposed project.

LAND USE AND PLANNING

The Phase I Data Hub Development Only Alternative would have a smaller overall development area when compared to the Plan Area. Although this Alternative has a smaller footprint, it would still be built out in accordance with the 2040 General Plan, PMC zoning regulations and land use designation criteria. This Alternative would be consistent with the 2040 General Plan's policies related to encouraging the development and intensification of employment centers. Additionally, similar to the proposed project, Alternative C would be consistent with the applicable goals and policies of the 2040 General Plan adopted for the purpose of avoiding or mitigating environmental effects. Overall, under this Alternative, impacts related to land use and planning would be similar to that of the proposed project.

NOISE

Construction under this Alternative would generate similar type and volume of construction noise as the proposed project. Operational noise would also be reduced as traffic-generated and stationary noise sources would be less than under buildout of the Plan Area. This Alternative would implement similar noise reduction measures and would be required to adhere to all federal, state, and local regulations regarding noise-related impacts. Therefore, noise-related impacts under this Alternative would be similar to, but of less magnitude than that of the proposed project.

POPULATION AND HOUSING

Under this Alternative, there would be a decrease in the number of employees serving the development area. Similar to the proposed project, this Alternative would accommodate the planned growth within the City as identified in the 2040 General Plan. It is not anticipated for employees to have to permanently relocate closer to the development area. However, if some workers were to relocate closer to the proposed project, it is not expected to induce substantial unplanned population growth in the area. Furthermore, development under this Alternative would be required to conform to the 2040 General Plan and City Zoning Ordinance. Therefore, impacts to population and housing under this Alternative would be similar to the proposed project.

PUBLIC SERVICES AND RECREATION

The Phase I Data Hub Development Only Alternative would still require additional demand on public services, such as fire and police protection services. Similar to the proposed project, this Alternative would require payment of fees, and compliance with applicable plans and regulations. Therefore, this Alternative would have similar impacts when compared to the proposed Project.

TRANSPORTATION AND TRAFFIC

Under Alternative C, buildout of the Phase I Data Hub is assumed to generate 60 employees. Compared to the proposed project's total of 1,582 employees, this Alternative would decrease the number of employees by 1,522. As described in Appendix B, project trip generation under this Alternative was estimated using rates from the Institute of Transportation Engineers (ITE) *Trip Generation Manual* (11th Edition). The amount of traffic that would be generated by the employees and visitors expected to be present on the site was estimated using rates from the manual's Land Use Code 160, Data Center. Using this data, trip generation estimates were developed for the proposed project and is expected to generate approximately 344 weekday daily vehicle trips, including approximately 40 morning peak hour trips and approximately 33 evening peak hour trips. This Alternative would result in a decrease in daily trips by 2,425 when compared to the proposed project, thereby reducing VMT. It is expected that this Alternative would be developed consistent with the 2040 General Plan's goals, policies, and actions. Additionally, it is expected that mitigation measures similar to that proposed for the proposed project would be implemented under this Alternative.

Without implementation of the proposed project, the Plan Area would not be expected to have coordinated internal circulation network with a focus on creating a pedestrian-friendly environment.

Under Alternative C, development of Phase I would be designed per standard City procedures and requirements.

Because total VMT would be reduced under this Alternative, impacts relating to transportation and traffic would be less than those of the proposed project.

UTILITIES AND SERVICE SYSTEMS

Alternative C would only develop on Phase I of the Plan Area and would generate less employees onsite than the proposed project. Thereby, reducing the demand for regional water supplies and generation of wastewater and solid waste. Therefore, the impacts to utilities and service systems would be reduced compared to those of the proposed project.

WILDFIRE

Similar to the proposed project, Phase I development would be subject to all applicable City regulations, reviews, and requirements pertaining to emergency response, emergency access, and maintaining emergency evacuation routes. Furthermore, new development would require a Fire District review for access compliance before project approval. These measures align with established fire prevention standards and ensure efficient emergency vehicle access rather than impairing an adopted emergency response or evacuation plan.

The Phase I development area is not located in or adjacent to state responsibility areas or lands classified as very high fire hazard severity zones. However, by keeping Phases II and III of the Plan Area in its existing condition, natural vegetation would continue to grow, thereby increasing fire fuel volumes. Although this Alternative would not place additional structures or people in a fire hazard severity zone, retaining the Plan Area in its natural condition would still present potential risks associated with wildfire. This Alternative would be required to comply with all federal, state, and local regulations associated with reducing fire-related risks. Therefore, impacts under this Alternative would be similar to those of the proposed project.

Conclusion Regarding the Phase I Data Hub Development Only Alternative

The Phase I Data Hub Development Only Alternative would result in reduced impacts related to aesthetics, air quality, biological resources, GHG emissions and energy, noise, transportation, and utilities. This Alternative would result in similar impacts related to cultural and tribal cultural resources, geology, hazards and hazardous materials, hydrology, land use and planning, population and housing, public services and recreation, and wildfire.

Implementation of the Phase I Development Only Alternative would meet three of the five project objectives, but not to the same extent under the proposed project. Under this Alternative, a comprehensive Specific Plan would not be developed (objective 1) nor would this Alternative establish standards for aesthetic and cohesive development for the Plan Area (objective 5). However, this Alternative would still foster economic opportunities within the community (objective 2); provide attractive construction of industrial or office buildings (objective 3); and facilitate the implementation of roads, utilities and other infrastructure in connection with development of the Plan Area (objective 4).

ALTERNATIVE D – LIMITED USES ALTERNATIVE

Description

Alternative D would implement the proposed project and would have the same development footprint as the proposed project. However, Alternative D would revise the list of permitted uses in the proposed project to place more emphasis on technology center, research, innovation, and light industrial uses. Specifically, this Alternative would eliminate all office, logistics, and warehouse uses, thereby reducing VMT, truck trips and associated diesel emissions. Alternative D was developed to reduce potential impacts associated with air quality, greenhouse gases, energy, noise, and transportation.

Comparative Analysis of Environmental Effects

AESTHETICS

The Limited Use Alternative would have the same development footprint as the proposed project and would implement the proposed project. The existing open space would be replaced with an employment center, which would include buildings, parking lots, lighting, and landscaped areas. Similar to the proposed project, future development projects would be required to adhere to all requirements of the proposed project. Furthermore, all development would be consistent with the 2040 General Plan goals and policies related to aesthetics and visual quality. Therefore, the Plan Area would be developed in a cohesive and coordinated manner. Under this Alternative, impacts regarding aesthetics, light, and glare would be similar to the proposed Project.

AIR QUALITY

The Limited Uses Alternative would restrict the list of permitted uses in the proposed project and allowed to be developed within the Plan Area. This Alternative would remove all higher-intensity uses such as, offices, logistics, and warehouses. Limiting the uses allowed to be developed within the Plan Area would reduce the number of employees and daily vehicular trips. Furthermore, removal of the logistics and warehousing uses would reduce the potential for substantial truck traffic and associated diesel emissions. Development under this alternative is expected to result in less stationary source emissions and less transportation-related air emissions than the proposed project. Therefore, overall air quality impacts would be reduced in comparison to the proposed project.

BIOLOGICAL RESOURCES

The Limited Uses Alternative would have the same impact area as the proposed project. Impacts to jurisdictional waters, sensitive species, and migratory and nesting birds would occur under this Alternative. Future development under this Alternative would also have the potential to interfere with native or migratory wildlife species or corridors.

Development under this Alternative would be required to adhere to all applicable federal, state, and local regulations, policies, and ordinances protecting biological resources. Additionally, future development projects would be required to show consistency with the adopted East Contra Costa HCP/NCCP. It is expected for similar mitigation measures from the proposed project to be

implemented for future projects proposed under this Alternative. Therefore, impacts would be similar when compared to the proposed project.

CULTURAL AND TRIBAL CULTURAL RESOURCES

Like the proposed project, buildout of the Plan Area under Alternative C is not anticipated to have a significant impact on any historic resources within or adjacent to the Plan Area. Subsequent development projects under this Alternative would also involve ground disturbing activities that have a similar potential to damage or destroy previously unidentified archaeological or tribal cultural resources. Alternative C would implement similar mitigation measures as the proposed project to reduce the potential for impacts to archaeological and tribal cultural resources during construction. Impacts to cultural and tribal cultural resources under this Alternative would be similar to the proposed project.

GEOLOGY AND SOILS

Under the Limited Uses Alternative, the development area would be the same as the Plan Area. Future development of the Plan Area would still result in exposing additional persons and structures in the Plan Area to risks associated with geologic hazards. The Limited Uses Alternative would be required to comply with the same regulatory requirements as the proposed project. Therefore, this Alternative would have similar impacts when compared to the proposed project.

This Alternative has the same potential to effect undiscovered paleontological resources in the Plan Area as the proposed project. It is expected that this Alternative would be required to implement similar mitigation measures to the proposed project. Therefore, this Alternative would have the same impacts to paleontological resources when compared to the proposed project.

GREENHOUSE GAS EMISSIONS AND ENERGY

Alternative C would limit the list of permitted uses available to be developed within the Plan Area. The limited list of permitted uses would exclude higher-intensity uses such as offices, logistics, and warehouses. Limiting the uses allowed to be developed within the Plan Area would reduce the number of employees and daily vehicular trips. Furthermore, removal of the logistics and warehousing uses would reduce the potential for substantial truck traffic and associated diesel emissions. Development under this alternative is expected to result in less stationary source emissions and less transportation-related GHG emissions than the proposed project. Furthermore, all subsequent development projects under this Alternative would also be required to adhere to the GHG emissions and energy reduction strategies and requirements identified in the proposed project. GHG emissions and energy-related impacts would be reduced in comparison to the proposed project.

HAZARDS AND HAZARDOUS MATERIALS

This Alternative would have the same development area as the proposed project. Therefore, the same potential for impacts related to exposure to any existing onsite hazards or hazardous materials and wildland fires would occur under this Alternative as the proposed project. Subsequent development under this Alternative would be expected to comply with all of the same federal, state, and local laws and permitting requirements as would be completed for the proposed project.

Therefore, this Alternative would result in similar impacts associated with hazards and hazardous materials when compared to the proposed project.

HYDROLOGY AND WATER QUALITY

Similar to the proposed project, land disturbance affecting hydrology and water quality would occur during construction activities under the Limited Uses Alternative. This Alternative would alter the existing drainage pattern of the site and would likely result in similar impacts to stormwater runoff and groundwater recharge, as the proposed project. It is expected that development under this Alternative would adhere to regulatory requirements that manage water quality including the implementation of NPDES permits, other discharge permits, WQMPs, SWPPPs, and BMPs. Therefore, the Limited Uses Alternative would result in impacts similar to those that would occur from the proposed project.

LAND USE AND PLANNING

Under Alternative C, the Plan Area would be built out in accordance with the 2040 General Plan zoning regulations and land use designation criteria. Similar to the proposed project, Alternative C would be consistent with the applicable goals and policies of the 2040 General Plan adopted for the purpose of avoiding or mitigating environmental effects. Overall, under this Alternative, impacts related to land use and planning would be similar to that of the proposed project.

NOISE

This Alternative would result in the development of an employment center with more emphasis on technology center, research, innovation, and light industrial uses. Construction noise impacts would be similar to the proposed project because this Alternative has the same development footprint. However, since this Alternative restricts higher-intensity uses from being built, it is expected for there to be fewer daily vehicle trips to the Plan Area. Furthermore, removal of the logistics and warehousing uses would reduce the potential for substantial truck traffic and associated operational noise. This Alternative would implement similar noise reduction measures and would be required to adhere to all federal, state, and local regulations regarding noise-related impacts. Therefore, noise-related impacts under this Alternative would be of less magnitude than that of the proposed project.

POPULATION AND HOUSING

Under the Limited Uses Alternative, there would be a decrease in the number of employees serving the Plan Area. Similar to the proposed project, this Alternative would accommodate the planned growth within the City as identified in the 2040 General Plan. It is not anticipated for employees to have to permanently relocate closer to the development area. However, if some workers were to relocate closer to the proposed project, it is not expected to induce substantial unplanned population growth in the area. Furthermore, development under this Alternative would be required to conform to the 2040 General Plan and City Zoning Ordinance. Therefore, impacts to population and housing under this Alternative would be similar to the proposed project.

PUBLIC SERVICES AND RECREATION

The Limited Uses Alternative would require additional demand on public services, such as fire and police protection services. Similar to the proposed project, this Alternative would require payment of fees, and compliance with applicable plans and regulations. Therefore, this Alternative would have similar impacts when compared to the proposed Project.

TRANSPORTATION AND TRAFFIC

Under this Alternative, operational traffic and truck trips would be reduced as a result of limiting higher-intensity permitted uses. Development under this Alternative is still expected to be developed consistent with the 2040 General Plan's goals, policies, and actions. Furthermore, subsequent development under this Alternative would be required to adhere to all requirements and guidelines set forth in the proposed project. The Plan Area would still be developed with a focus on creating a pedestrian-friendly environment and there would be a coordinated mobility network. Overall, transportation and traffic-related impacts under Alternative D would be of less magnitude than the proposed project.

UTILITIES AND SERVICE SYSTEMS

Alternative D would limit the permitted uses within the Plan Area, which would reduce the amount of employees onsite. Therefore, the demand for regional water supplies and generation of wastewater and solid waste would also be reduced. Impacts to utilities and service systems under the Limited Uses Alternative would be reduced compared to those of the proposed project.

WILDFIRE

Similar to the proposed project, future development under Alternative D would be subject to all applicable City regulations, reviews, and requirements pertaining to emergency response, emergency access, and maintaining emergency evacuation routes, as well as further CEQA analysis of project-specific impacts. Furthermore, new buildings would require a Fire District review for access compliance before project approval. These measures align with established fire prevention standards and ensure efficient emergency vehicle access rather than impairing an adopted emergency response or evacuation plan. Therefore, this impact would be similar to the proposed project.

This Alternative would also introduce new fire hazards or fire risk to people and structures in the Plan Area. However, existing provisions of federal, State, and local requirements related to wildland fire hazards, including State fire safety regulations associated with wildland-urban interfaces, fire-safe building standards, and defensible space would be required. Additionally, development on parcels south of the Contra Costa Canal would introduce new risks, including downslope landslides as a result of post-fire instability. It is anticipated that a similar mitigation measure identified in the proposed project would be required for this Alternative. Therefore, impacts under this Alternative would be similar to that of the proposed project.

Conclusion Regarding the Limited Uses Alternative

Implementation of the Limited Uses Alternative would result in reduced impacts related to air quality, GHG emissions and energy, noise, transportation, and utilities. This Alternative would have similar impacts related to aesthetics, biological resources, cultural and tribal cultural resources, geology, hazards and hazardous materials, hydrology, land use and planning, population and housing, public services and recreation, and wildfire.

The Limited Uses Alternative would achieve all five project objectives at the same capacity that the proposed project would. The Limited Uses Alternative would develop and implement a comprehensive Specific Plan for the Plan Area providing for technology park uses (objective 1); foster economic opportunities within the community by expanding the variety of industrial and business park uses (objective 2); provide attractive construction of industrial buildings (objective 3); facilitate the installation of roads, utilities, and other infrastructure in connection with development of the Plan Area (objective 4); and establish standards for aesthetic and cohesive development in the Plan Area (objective 5).

5.6 ENVIRONMENTALLY SUPERIOR ALTERNATIVE

CEQA requires that an environmentally superior alternative be identified among the alternatives that are analyzed in the EIR. If the No Project Alternative is the environmentally superior alternative, an EIR must also identify an environmentally superior alternative among the other alternatives (CEQA Guidelines Section 15126.6(e)(2)). The environmentally superior alternative is that alternative with the least adverse environmental impacts when compared to the proposed project.

CEQA does not require the lead agency (the City of Pittsburg) to choose the environmentally superior alternative. Instead, CEQA requires the City to consider environmentally superior alternatives, weigh those considerations against the environmental impacts of the proposed project, and make findings that the benefits of those considerations outweigh the harm. “Among the factors that may be used to eliminate alternatives from detailed consideration in an EIR are: (i) failure to meet most of the basic project objectives, (ii) infeasibility, or (iii) inability to avoid significant environmental impacts” (State CEQA Guidelines Section 15126.6[c]).

A comparative analysis of the proposed Specific Plan and each of the proposed project alternatives is provided in Table 5-2 below. The table includes a numerical scoring system, which assigns a score of 1 to 3 to each of the alternatives with respect to how each alternative compares to the proposed project in terms of the severity of the environmental topics addressed in this PEIR. A score of “2” indicates that the alternative would have the same level of impact when compared to the proposed project. A score of “1” indicates that the alternative would have a better (or reduced) impact when compared to the proposed project. A score of “3” indicates that the alternative would have a worse (or increased) impact when compared to the proposed project. The project alternative with the lowest total score is considered the environmentally superior alternative.

TABLE 5-2: COMPARISON OF ALTERNATIVES TO THE PROPOSED PROJECT

<i>ENVIRONMENTAL ISSUE</i>	<i>PROPOSED PROJECT</i>	<i>ALTERNATIVE A (NO PROJECT/NO DEVELOPMENT)</i>	<i>ALTERNATIVE B (NO PROJECT/2040 GENERAL PLAN ALTERNATIVE)</i>	<i>ALTERNATIVE C (PHASE I DATA HUB ONLY DEVELOPMENT)</i>	<i>ALTERNATIVE D (LIMITED USES)</i>
Aesthetics	2 – Same	1 – Better than	3 – Worse than	1 – Better than	2 – Same
Air Quality	2 – Same	1 – Better than	3 – Worse than	1 – Better than	1 – Better than
Biological Resources	2 – Same	1 – Better than	2 – Same	1 – Better than	2 – Same
Cultural and Tribal Cultural Resources	2 – Same	1 – Better than	2 – Same	2 – Same	2 – Same
Geology and Soils	2 – Same	1 – Better than	2 – Same	2 – Same	2 – Same
Greenhouse Gases and Energy	2 – Same	1 – Better than	3 – Worse than	1 – Better than	2 – Same
Hazards and Hazardous Materials	2 – Same	1 – Better than	2 – Same	2 – Same	2 – Same
Hydrology and Water Quality	2 – Same	1 – Better than	2 – Same	2 – Same	2 – Same
Land Use and Planning	2 – Same	3 – Worse than	2 – Same	2 – Same	2 – Same
Noise	2 – Same	1 – Better than	3 – Worse than	1 – Better than	1 – Better than
Population and Housing	2 – Same	1 – Better than	2 – Same	2 – Same	2 – Same
Public Services and Recreation	2 – Same	1 – Better than	2 – Same	2 – Same	2 – Same
Transportation and Circulation	2 – Same	1 – Better than	3 – Worse than	1 – Better than	1 – Better than
Utilities	2 – Same	1 – Better than	3 – Worse than	1 – Better than	1 – Better than
Wildfire	2 – Same	2 – Same	2 – Same	2 – Same	2 – Same
SUMMARY	30	18	36	23	26

CONCLUSION

As shown in Table 5-2, Alternative A (the No Project/No Development Alternative) results in the least environmental impacts of all alternatives considered. However, as required by CEQA, when the No Project/No Development Alternative is the environmentally superior alternative, the environmentally superior alternative among the others must be identified.

The Phase I Data Hub Development Only Alternative has been identified as the environmentally superior alternative because it would result in reduced impacts related to aesthetics, air quality, biological resources, GHG emissions and energy, noise, transportation, and utilities. Additionally, this Alternative would meet three of the five project objectives, but not to the same extent under the proposed project.

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REFERENCES:

City of Pittsburg. 2024. 2040 General Plan Draft Environmental Impact Report. Available at <https://www.pittsburgca.gov/services/community-development/planning/advanced-planning-special-projects/general-plan-update>. Accessed February 2024.

Pittsburg. 2023. Pittsburg Municipal Code. A Codification of the General Ordinances of the City of Pittsburg, California. Available at <https://www.codepublishing.com/CA/Pittsburg/>. Accessed March 2024.

Aesthetics

City of Pittsburg. 2020a. General Plan Pittsburg 2020: A Vision for the 21st Century. Available at <https://www.pittsburgca.gov/services/community-development/planning/general-plan-current>. Accessed February 2024.

City of Pittsburg. 2020b. Urban Design Element. Available at <https://www.pittsburgca.gov/home/showpublisheddocument/1396/637479142624630000>. Accessed February 2024.

City of Pittsburg. 2010. Development Review Design Guidelines. Adopted November 2010. Available at <https://www.pittsburgca.gov/home/showpublisheddocument/3994/637479142624630000>. Accessed February 2024.

Air Quality

Association of Bay Area Governments (ABAG), Metropolitan Transportation Commission. June 2021. Draft Plan Bay Area 2050 Regional Transportation Plan (RTP)/ Sustainable Communities Strategy (SCS) Environmental Impact Report. State Clearinghouse No. 2020090519. Available at https://planbayarea.org/sites/default/files/documents/2021-06/PBA_2050_DEIR.pdf. Accessed February 2024.

Bay Area Air Quality Management District. 2017a (May). California Environmental Quality Act Air Quality Guidelines. Available at [https://www.baaqmd.gov/~media/files/planning-and-research/ceqa/ceqa_guidelines_may2017-pdf.pdf?la=en](https://www.baaqmd.gov/~/media/files/planning-and-research/ceqa/ceqa_guidelines_may2017-pdf.pdf?la=en). Accessed February 2024.

Bay Area Air Quality Management District. 2017b. Bay Area 2017 Clean Air Plan. Adopted April 19, 2017. Available at https://www.baaqmd.gov/~media/files/planning-and-research/plans/2017-clean-air-plan/attachment-a_-proposed-final-cap-vol-1-pdf.pdf?rev=8c588738a4fb455b9cabb27360409529&sc_lang=en. Accessed March 2024.

Bay Area Air Quality Management District. 2022a. California Environmental Quality Act Air Quality Guidelines. Available at <https://www.baaqmd.gov/plans-and-climate/california-environmental-quality-act-ceqa/updated-ceqa-guidelines>. Accessed March 2024.

- Bay Area Air Quality Management District. 2022b. Community Air Risk Evaluation Program. Available at <https://www.baaqmd.gov/community-health/community-health-protection-program/community-air-risk-evaluation-care-program>. Accessed March 2024.
- Bay Area Air Quality Management District. 2022c. Justification Report: CEQA Thresholds for Evaluating the Significance of Climate Impacts From Land Use Projects and Plans. Available at https://www.baaqmd.gov/~media/files/planning-and-research/ceqa/ceqa-guidelines-2022/appendix-a-thresholds-of-significance-justification_final-pdf.pdf?rev=d35960ec035546629124ae2a25fb1df9. Accessed March 2024.
- Bay Area Air Quality Management District. 2022d. Stationary Source Screening Map. Available at <https://baaqmd.maps.arcgis.com/apps/webappviewer/index.html?id=845658c19eae4594b9f4b805fb9d89a3>. Accessed March 2024.
- California Air Resources Board (CARB). 2024a. Ambient Air Quality Standards. Available at <https://ww2.arb.ca.gov/sites/default/files/2020-07/aqs2.pdf>. Accessed April 2024.
- California Air Resources Board (CARB). 2024b. iADAM Air Quality Statistics. Available at <https://www.arb.ca.gov/adam/>. Accessed April 2024.
- Fehr and Peers. 2024. *Pittsburg Technology Park Specific Plan Transportation Assessment*. (Appendix K).
- California Air Resources Board and California Environmental Protection Agency. 2005. Air Quality and Land Use Handbook: A Community Health Perspective. Available at <https://www.aqmd.gov/docs/default-source/ceqa/handbook/california-air-resources-board-air-quality-and-land-use-handbook-a-community-health-perspective.pdf>. Accessed April 2024.
- Metropolitan Transportation Commission. 2006. Bay Area Regional Rail Plan Technical Memorandum 4a: Conditions, Configuration & Traffic on Existing System. Available at <https://mtc.ca.gov/planning/transportation/public-transit/regional-rail-plan>. Accessed February 2024.
- National Highway Traffic Safety Administration (NHTSA). 2022. Federal Register, Vol. 83, No. 72, Rules & Regulations, Mid-Term Evaluation of Greenhouse Gas Emissions Standards for Model Year 2022-2025 Light Duty Vehicles. 2018. Available at <https://www.federalregister.gov/documents/2018/04/13/2018-07364/mid-term-evaluation-of-greenhouse-gas-emissions-standards-for-model-year-2022-2025-light-duty>. Accessed February 2022.
- Ramboll. 2024. *Pittsburg Technology Park Air Emissions Calculations*. (Appendix D).
- US Environmental Protection Agency (USEPA). 2024a. NAAQS Table. Available at <https://www.epa.gov/criteria-air-pollutants/naqs-table>. Accessed April 2024.
- US Environmental Protection Agency (USEPA). 2024b. AP-42: Compilation of Air Emission Factors from Stationary Sources. Available at <https://www.epa.gov/air-emissions-factors-and-quantification/ap-42-compilation-air-emissions-factors-stationary-sources>. Accessed April 2024.

U.S. Environmental Protection Agency and National Highway Traffic Safety Administration (USEPA and NHTSA). 2016. Greenhouse Gas Emissions and Fuel Efficiency Standards for Medium and Heavy-Duty Engines and Vehicles – Phase 2. Available at <https://www.gpo.gov/fdsys/pkg/FR-2016-10-25/pdf/2016-21203.pdf>. Accessed: February 2022.

U.S. Environmental Protection Agency and National Highway Traffic Safety Administration (USEPA and NHTSA). 2019. The Safer Affordable Fuel-Efficient (SAFE) Vehicles Rule for Model Years 2021-2026 Passenger Cars and Light Trucks. Available at <https://www.govinfo.gov/content/pkg/FR-2019-09-27/pdf/2019-20672.pdf>. Accessed April 2024.

Biological Resources

East Contra Costa County Habitat Conservation Plan Association. 2006. 2006 Final HCP / NCCP. Available at <https://www.cocohcp.org/207/2006-Final-HCP-NCCP>. Accessed April 2024.

Environmental Laboratory. 1987. Corps of Engineers Wetlands Delineation Manual. Available at https://www.sac.usace.army.mil/Portals/43/docs/regulatory/1987_wetland_delineation_manual_reg.pdf. Accessed April 2024.

H.T. Harvey & Associates. 2019. *Caltrans Bat Mitigation: a Guide to Developing Feasible and Effective Solutions*. (Final.) (July.) Los Gatos, CA. Prepared for California Department of Transportation, Sacramento, CA. Prepared in Collaboration with HDR, Inc., Sacramento, CA. Available at <https://dot.ca.gov/-/media/dot-media/programs/environmental-analysis/documents/env/caltrans-bat-mitigation-guide-a11y.pdf>. Accessed April 2024.

Lichvar and McColley. 2008. A Field Guide to the Identification of the Ordinary High Water Mark in the Arid West Region of the Western United States. Available at <https://erdc-library.erdc.dren.mil/jspui/handle/11681/5308>. Accessed April 2024.

U.S. Army Corps of Engineers (USACE). 2005. USACE Regulatory Guidance Letter No. 05-05. Available at <https://www.nap.usace.army.mil/Portals/39/docs/regulatory/rgls/rgl05-05.pdf>. Accessed April 2024.

U.S. Army Corps of Engineers (USACE). 2010. Regional Supplement to the Corps of Engineers Wetland Delineation Manual: Arid West Region (Version 2). Available at https://www.usace.army.mil/Missions/Civil-Works/Regulatory-Program-and-Permits/reg_supp/. Accessed April 2024.

U.S. Environmental Protection Agency (USEPA). 2024. Permit Program Under CWA Section 404. Available at <https://www.epa.gov/cwa-404/permit-program-under-cwa-section-404#:~:text=Section%20404%20requires%20a%20permit,certain%20farming%20and%20forestry%20activities>. Accessed April 2024.

U.S. Fish and Wildlife Service (USFWS). 2024. IPaC: Information for Planning and Consultation. Available at <https://www.govinfo.gov/content/pkg/FR-2019-09-27/pdf/2019-20672.pdf>. Accessed April 2024.

Vollmar Natural Lands Consulting. March 2024. *Biological Evaluation Report, Pittsburg Technology Park Specific Plan*. (Appendix E).

Cultural and Tribal Cultural Resources

ECORP Consulting. April 2024. *Archaeological and Built Environment Resources Inventory Report*. (Appendix F).

The Mercury News. 2024. Pittsburg's steel mill idles amid sale to Japanese company. Available at <https://www.mercurynews.com/2024/01/20/end-of-a-bay-area-era-pittsburgs-steel-mill-idles-amid-sale-to-japanese-company/>. Accessed April 2024.

Geology and Soils

U.S. Department of Agriculture (USDA) Natural Resources Conservation Services (NRCS). NRCS Custom Soil Survey. Available at <https://websoilsurvey.nrcs.usda.gov/app/WebSoilSurvey.aspx>. Accessed February 2024.

WSP USA Inc. 2023. Pittsburg Technology Center, Pittsburg, California, Geotechnical Due Diligence Report. (Appendix G).

WSP USA Inc. 2023. *Phase I Environmental Site Assessment and Limited Soil Screening*. (Appendix I).

Greenhouse Gas Emissions and Energy

Association of Bay Area Governments and Metropolitan Transportation Commission. 2021. Plan Bay Area 2050 Draft Environmental Impact Report. Available at <https://files.ceqanet.opr.ca.gov/264910-3/attachment/vrlKPc4tcTDN5xHP3josMTwb5s2smnubNMvgqzeZb2FvQzaNu8b1nMpdI3G47lpkxcrOpBJTnCM-rwkC0>. Accessed March 2024.

Bay Area Air Quality Management District. 2017. Bay Area 2017 Clean Air Plan. Available at https://www.baaqmd.gov/~/media/files/planning-and-research/plans/2017-clean-air-plan/attachment-a_-proposed-final-cap-vol-1-pdf.pdf. Accessed March 2024.

Bay Area Air Quality Management District, 2022. California Environmental Quality Act Air Quality Guidelines. Available at <https://www.baaqmd.gov/plans-and-climate/california-environmental-quality-act-ceqa/updated-ceqa-guidelines>. Accessed March 2024.

California Air Resources Board. 2023. California Greenhouse Gas Emissions from 2000 to 2021: Trends of Emissions and Other Indicators Date of Release: December 14, 2023. Available at https://ww2.arb.ca.gov/sites/default/files/2023-12/2000_2021_ghg_inventory_trends.pdf. Accessed March 2024.

California Energy Commission (CEC). 2021. Energy Almanac. Available at <http://energyalmanac.ca.gov/overview/index.html>. Accessed March 2024.

California Energy Commission. 2023. California Energy Consumption Database. Available at <http://www.ecdms.energy.ca.gov/>. Accessed March 2024.

- California Environmental Protection Agency. 2010. Climate Action Team Report to Governor Schwarzenegger and the Legislature. Available at http://www.climatechange.ca.gov/climate_action_team/reports/.
- California Office of Environmental Health Hazard Assessment (OEHHA). 2022. 2022 Report: Indicators of Climate Change in California. Available at <https://oehha.ca.gov/climate-change/epic-2022>. Accessed March 2024.
- City of Pittsburg. 2019. City of Pittsburg Greenhouse Gas Emission Inventories Updated 2005 and 2016. Prepared for the City of Pittsburg with the assistance of Rincon Consultants, Inc. July 2019. Available at <https://www.pittsburgca.gov/home/showpublisheddocument/12906/637598869093930000>. Accessed March 2024.
- Fehr and Peers. 2024. *Pittsburg Technology Park Specific Plan Transportation Assessment*. (Appendix K).
- National Highway Traffic Safety Administration (NHTSA). 2022. Federal Register, Vol. 83, No. 72, Rules & Regulations, Mid-Term Evaluation of Greenhouse Gas Emissions Standards for Model Year 2022-2025 Light Duty Vehicles. April 13. Available at <https://www.federalregister.gov/documents/2018/04/13/2018-07364/mid-term-evaluation-of-greenhouse-gas-emissions-standards-for-model-year-2022-2025-light-duty>. Accessed February 2022.
- National Resources Defense Council (NRDC). 2014. NRDC Fact Sheet: California Snowpack and the Drought. April 2014. Available at <https://www.nrdc.org/sites/default/files/ca-snowpack-anddrought-FS.pdf>. Accessed March 2024.
- Ramboll. 2024. *Pittsburg Technology Park Air Emissions Calculations*. (Appendix D).
- United States Energy Information Administration (U.S. EIA). 2022. California State Energy Profile. Last updated March 17, 2022. Available at <https://www.eia.gov/state/print.php?sid=CA>. Accessed February 2024.
- U.S. Environmental Protection Agency (USEPA). 2024a. AP-42: Compilation of Air Emission Factors from Stationary Sources. Available: <https://www.epa.gov/air-emissions-factors-and-quantification/ap-42-compilation-air-emissions-factors-stationary-sources>. Accessed April 2024.
- U.S. Environmental Protection Agency (USEPA). 2024b. Draft Inventory of U.S. Greenhouse Gas Emissions and Sinks: 1990-2022 U.S. Environmental Protection Agency, EPA 430-D-24-001. Available at <https://www.epa.gov/ghgemissions/draft-inventory-us-greenhouse-gas-emissions-and-sinks-1990-2022>. Accessed March 2024.

Hazards and Hazardous Materials

- California Department of Education. 2024. School Accountability Report Card. Available at <https://sarconline.org/public/findASarc>. Accessed February 2024.

City of Pittsburg. 2018. City of Pittsburg Emergency Operations Plan. Adopted December 2018. Available at <https://www.pittsburgca.gov/home/showpublisheddocument/10694/637479142624630000>. Accessed February 2024.

City of Pittsburg. 2017. Hazard Mitigation Plan. Adopted February 2017. Available at <https://www.pittsburgca.gov/home/showpublisheddocument/9646/637479142624630000>. Accessed February 2024.

Contra Costa County. 2011. Contra Costa Operational Area Emergency Operations Plan. Adopted May 2011. Available at <https://www.contracosta.ca.gov/DocumentCenter/View/7352/Emergency-Operations-Plan-2010-11?bidId=>. Accessed February 2024.

Contra Costa County. 2000. Contra Costa County Airport Land Use Compatibility Plan. Adopted December 2000. Available at <https://www.contracosta.ca.gov/DocumentCenter/View/851/Cover-Introduction-and-County-wide-Policies?bidId=>. Accessed February 2024.

WSP USA Inc. 2023. Phase I Environmental Site Assessment and Limited Soil Screening. (Appendix I).

Hydrology and Water Quality

California Water Board. 2022. 2020-2022 California Integrated Report. Available at https://www.waterboards.ca.gov/water_issues/programs/water_quality_assessment/2020_2022_integrated_report.html. Accessed April 2024.

U.S. Department of Agriculture (USDA) Natural Resources Conservation Services (NRCS). U.S. Watersheds. Available at <https://nrcs.maps.arcgis.com/apps/instant/basic/index.html?appid=c5841399969a4f649fd0f806e5bc4748>. Accessed April 2024.

U.S. Environmental Protection Agency (USEPA). 2024. Overview of the Safe Drinking Water Act. Available at <https://www.epa.gov/sdwa/overview-safe-drinking-water-act>. Accessed April 2024.

U.S. Geological Survey (USGS). 2019. USGS Water Resources Links for: 18050001 - Suisun Bay. Available at <https://water.usgs.gov/lookup/getwatershed?18050001/www/cgi-bin/lookup/getwatershed>. Accessed April 2024.

Land Use and Planning

City of Pittsburg. 2021. Pittsburg Moves Active Transportation Plan. Available at <https://www.pittsburgca.gov/home/showpublisheddocument/12728/637479142624630000>. Accessed February 2024.

Contra Costa County. 2005. Contra Costa County General Plan 2005-2020. Available at <https://www.contracosta.ca.gov/4732/General-Plan>. Accessed February 2024.

Noise

Ramboll. 2024. *Pittsburg Technology Park Specific Plan Noise and Vibration Technical Report*. (Appendix J).

Population and Housing

City of Pittsburg. 2023. City of Pittsburg Housing 6th Cycle Housing Element, Housing Plan Background Report. Available at <https://www.pittsburgca.gov/home/showpublisheddocument/16153/638493884604324999>. Accessed February 2024.

Public Services and Recreation***Transportation and Traffic***

Caltrans. 2018. 2018 Standard Specifications. Available at <https://dot.ca.gov/programs/design/2018-ccs-standard-plans-and-standard-specifications/2018-standard-specifications-toc>. Accessed April 2024.

Contra Costa Transportation Authority (CCTA). 2020. Items of interest for circulation to the Regional Transportation Planning Committees (RTPCs), Approval of the Vehicle Miles Traveled Analysis Methodology for Land Use Projects in the Growth Management Program. Available at https://pleasanthill.granicus.com/MetaViewer.php?view_id=2&event_id=916&meta_id=137912. Accessed April 2024.

Fehr & Peers. 2024. Pittsburg Technology Park Specific Plan Transportation Assessment. (Appendix K).

Utilities and Service Systems

California Department of Water Resources. 2014. Pittsburg Plain Groundwater Basin. Available at https://water.ca.gov/-/media/DWR-Website/Web-Pages/Programs/Groundwater-Management/Bulletin-118/Files/2003-Basin-Descriptions/2_002_03_Napa-SonomaLowlandsSubbasin.pdf. Accessed March 2024.

California Department of Resources Recycling and Recovery (CalRecycle). 2024. Estimated Solid Waste Generation Rates. <https://www2.calrecycle.ca.gov/wastecharacterization/general/rates>. Accessed October 2023.

California Energy Commission. 2023. Gas Consumption by County. Available at <http://www.ecdms.energy.ca.gov/gasbycounty.aspx>. Accessed March 2024.

City of Pittsburg. 2015. City of Pittsburg Water System Master Plan. Available at <https://www.pittsburgca.gov/home/showpublisheddocument/8400/637479142624630000>. Accessed March 2024

City of Pittsburg. 2021. City of Pittsburg Urban Water Management Plan. Available at <https://www.pittsburgca.gov/home/showpublisheddocument/14680/638086158261600000>. Accessed March 2024

Delta Diablo. 2022. Delta Diablo Resource Recovery Facility Master Plan. Adopted December 2022. Available at <https://www.deltadiablo.org/files/c0f002856/DD+2022+Master+Plan+-+December+2022+Reduced.pdf>. Accessed March 2024.

Schaaf & Wheeler. 2024. *Water Supply Assessment and Written Verification of Supply*. (Appendix L).

Wildfire

California Department of Forestry and Fire Protection (CalFire). 2020. Frequently Asked Questions About: 2020 Fire Hazard Severity Zones. Available at <https://bof.fire.ca.gov/media/ttpi3n3m/full-14-b-vhfhsz-frequently-asked-questions.pdf>. Accessed February 2024.

City of Pittsburg. 2017. Hazard Mitigation Plan. Adopted February 2017. Available at <https://www.pittsburgca.gov/home/showpublisheddocument/9646/637479142624630000>. Accessed February 2024.

Vollmar Natural Lands Consulting. March 2024. *Biological Evaluation Report, Pittsburg Technology Park Specific Plan*. (Appendix E).

WSP USA Inc. 2023. *Pittsburg Technology Center Geotechnical Due Diligence Report*. (Appendix G).