



Appendix E

Energy Documentation

Construction Fuel Consumption

On-Site Diesel ¹ (off-road construction Equipment)	MTCO ₂ e	Gallons of Fuel ²	Los Angeles County Fuel (Start of Construction)	Percent
Demolition	20	1,990	532,570,627	0.0031%
Site Preparation	16	1,571		
Grading	41	4,013		
Construction/Installation	92	9,055		
Architectural Coating	0	0		
Total	169	16,629		

Off-Site Diesel ¹ (on-road construction trips)				
Demolition	20	1,990	532,570,627	0.0016%
Site Preparation	15	1,443		
Grading	15	1,443		
Construction/Installation	35	3,489		
Architectural Coating	0	0		
Total	85	8,364		

Off-Site Gasoline ²				
Demolition	10	1,140	3,536,229,368	0.0002%
Site Preparation	13	1,496		
Grading	13	1,496		
Construction/Installation	26	2,920		
Architectural Coating	0	0		
Total	62	7,051		

Total Diesel Fuel		24,992	532,570,627	0.0047%
Total Gasoline Fuel		7,051	3,536,229,368	0.0002%
Total Construction Fuel	316	32,043		

Construction Phase ³	Demolition			Site Preparation			Grading		
	On-Site Diesel (Off-Road)	Off-Site Diesel (Hauling/Vendor)	Off-Site Gasoline (Worker)	On-Site Diesel (Off-Road)	Off-Site Diesel (Hauling/Vendor)	Off-Site Gasoline (Worker)	On-Site Diesel (Off-Road)	Off-Site Diesel (Hauling/Vendor)	Off-Site Gasoline (Worker)
2025	25	20	10	15.94583268	14.64152368	13.17629854	40.73281347	15	13.17629854
Total	25	20	10	16	15	13	41	15	13

Construction Phase ³	Construction/Installation, PV Vendor Trips ⁵			Paving					
	On-Site Diesel (Off-Road)	Off-Site Diesel (Hauling/Vendor)	Off-Site Gasoline (Worker)	On-Site Diesel (Off-Road)	Off-Site Diesel (Hauling/Vendor)	Off-Site Gasoline (Worker)	On-Site Diesel (Off-Road)	Off-Site Diesel (Hauling/Vendor)	Off-Site Gasoline (Worker)
2025	92	35	26	1		7			
Total	92	35	26	1	0	7	0	0	0

Notes:

¹ Fuel used for off-road, hauling, and vendor trips assumed to be diesel.

² Fuel used for worker trips assumed to be gasoline.

³ MTCO₂e rates from CalEEMod (3.0 Construction Details).

⁴ For CO₂e emissions, see Chapter 13 (page 94); Conversion Ratios: Climate Registry, General Reporting Protocol, 2016.

⁵ Construction/Installation vendor trips include PV panel deliveries.

Construction Water Energy

Water Energy Intensity ¹	2,701	kWh/MG
Total Construction Water ²	4.24	million gallons
Construction Water Energy	11,452	kWh
Los Angeles County Annual Energy (GWh)	68,484,956,280	kWh
Percentage of County	0.000000	

Notes:

¹ Water energy intensity factor for county subarea per CalEEMod User Guide, Appendix D, page D-343.

² Total Construction Water based on applicant input.

Electricity/Natural Gas Energy

	Mitigated Project Annual Energy	Los Angeles County Annual Energy ³	Percentage Increase
Electricity (kWh/yr)	0	68,484,956,280	0.0000000%
Natural Gas (kBTU/yr)	0	0	NA
Natural Gas (therms/yr)	0	0	NA

Land Use	Electricity ¹ (kWh/yr)		Natural Gas ² (kBTU/yr)	
	Unmitigated	Mitigated	Unmitigated	Mitigated
	0	0	0	0
Total Energy	0	0	0	0

Notes:

¹ Electricity use per CalEEMod (5.3 Energy by Land Use).

² Natural Gas use per CalEEMod (5.2 Natural Gas by Land Use).

³ County total energy values from California Energy Commission energy reports available through ecdms.energy.ca.gov. (year 2020)

Operational Water Energy

Mitigated Indoor	0.00	million gallons
Indoor Energy Intensity Factor ¹	2,701	kWh/MG
Mitigated Outdoor	0.10	million gallons
Outdoor Energy Intensity Factor ²	3,472	kWh/MG
Operational Water Energy	347	kWh
Los Angeles County Annual Energy (GWh)	68,484,956,280	kWh
Percentage Increase	0.00000001	

Notes:

¹ Indoor water energy intensity factor for county subarea per CalEEMod User Guide, Appendix D, page D-343. Factor includes supply

² Outdoor water energy intensity factor for county subarea per CalEEMod User Guide, Appendix D, page D-343. Factor includes supply

³ Operational water use values per CalEEMod (7.2 Water by Land Use).

Operational Fuel

Vehicle Type	Annual VMT ¹	MPG ²	Annual Fuel (Gallons)	Fuel Type	LA County Gallons ³	RS Percent
Passenger Cars	0	21.6	0	Gas	3,536,229,368	0.00000%
Light/Medium Trucks	0	17.2	0	Diesel	532,570,627	0.00000%
Heavy Trucks/Other	570	6.1	93	Diesel	532,570,627	0.00002%
Trucks Total			93		532,570,627	0.00002%
Total	396					

Notes:

¹ Total annual operational VMT based on mitigated annual VMT from CalEEMod (4.2 Trip Summary Information).

² Average fuel economy derived from Department of Transportation.

³ Total annual county fuel per EMFAC 2021 model of projected operational fuel usage.