

Appendix G

Energy Calculations

Building Energy Consumption Summary

Land Use	Electricity (MWh/year)	Natural Gas (MMBtu/year)
Health Club	86	189
Total	86	189

1. Electricity and Natural Gas Values Derived from CalEEMod Defaults.

Energy Calculations Summary

Operational Fuel Use Summary

Vehicle Class	Diesel Gallons	Gasoline Gallons
Passenger	63	8,390
Truck	3,091	7,372
Bus	146	152
Other	9	39
Total	3,309	15,953

1. Fleet mix calculated from CalEEMod default values.
2. Gallons per mile calculated from EMFAC 2014.
3. Annual VMT obtained from CalEEMod output file.

Energy Calculations Summary

Construction Fuel Usage Summary

Construction Phase	Diesel	Gasoline	Diesel	Diesel
	Off-road Equipment (gallons)	On-road (gallons)	On-road (gallons)	Total
2020	13,981	2,884	2,267	16,248
2021	22,422	4,908	3,972	26,393
2022	22,022	5,051	3,622	25,643
2023	612	172	0	612
TOTAL	59,037	13,015	9,860	68,897

Total Gasoline	13,015	gallons
Total Diesel	68,897	gallons

Phase 1 Construction Offroad Equipment

Phase Name	Offroad Equipment Type	Amount	Usage Hours	Horse Power	Load Factor	Number of days	Diesel Fuel Usage
Site Prep	Graders	1	8	187	0.41	5	153
Site Prep	Tractors/Loaders/Backhoes	1	8	97	0.37	5	72
Site Prep	Rubber Tired Dozers	1	7.00	247	0.40	5	173
Grading	Rubber Tired Dozers	1	6.00	247	0.40	12	356
Grading	Tractors/Loaders/Backhoes	1	7.00	97	0.37	12	151
Grading	Graders	1	6.00	187	0.41	12	276
Building Construction	Generator Sets	1	8.00	84	0.74	149	3,705
Building Construction	Cranes	1	6.00	231	0.29	149	2,994
Building Construction	Forklifts	1	6.00	89	0.20	149	796
Building Construction	Tractors/Loaders/Backhoes	1	6.00	97	0.37	149	1,604
Building Construction	Welders	3	8.00	46	0.45	149	3,701
TOTAL							13,981

Notes: Equipment assumptions are consistent with CalEEMod. Fuel usage average of 0.05 gallons of diesel fuel per horsepower-hour is from the SCAQMD CEQA Air Quality Handbook, Table A9-3E.

Number of days accounts for weekend where construction would not occur.

Trips and VMT

Phase Name	Daily Worker Trip	Daily Vendor Trip	Daily Hauling Trip	Days per Year	Total Worker Trips	Total Vendor Trips	Total Haul Trips	Worker Trip Length (miles)	Vendor Trip Length (miles)	Haul Trip Length (miles)	Total Worker Trip Length (miles)	Total Vendor Trip Length (miles)	Total Haul Trip Length (miles)	Total gallons of gasoline	Total gallons of diesel
Site Prep	8	0	0	5	40	0	0	16.80	6.60	20.00	672	0	-	24	0
Grading	8	0	0	12	96	0	0	16.80	6.60	20.00	1,612.80	0.00	-	58	0
Building Construction	31	12	0	149	4,619	1,788	0	16.80	6.60	20.00	77,599.20	11,800.80	-	2,802	2,267
TOTAL														2,884	2,267

Notes: Consistent with CalEEMod, worker vehicles assumed to be gasoline and 50% LDA, 25% LDT1, and 25% LDT2. Vendor and haul trips are assumed to be 100% diesel Heavy-Duty Trucks (T7).

Phase 2 Construction Offroad Equipment

Phase Name	Offroad Equipment Type	Amount	Usage Hours	Horse Power	Load Factor	Number of days	Diesel Fuel Usage
Building Construction	Generator Sets	1	8.00	84	0.74	261	6,490
Building Construction	Cranes	1	6.00	231	0.29	261	5,245
Building Construction	Forklifts	1	6.00	89	0.20	261	1,394
Building Construction	Tractors/Loaders/Backhoes	1	6.00	97	0.37	261	2,810
Building Construction	Welders	3	8.00	46	0.45	261	6,483
TOTAL							22,422

Notes: Equipment assumptions are consistent with CalEEMod. Fuel usage average of 0.05 gallons of diesel fuel per horsepower-hour is from the SCAQMD CEQA Air Quality Handbook, Table A9-3E.

Number of days accounts for weekend where construction would not occur.

Trips and VMT

Phase Name	Daily Worker Trip	Daily Vendor Trip	Daily Haul Trip	Days per Year	Total Worker Trips	Total Vendor Trips	Total Haul Trips	Worker Trip Length (miles)	Vendor Trip Length (miles)	Haul Trip Length (miles)	Total Worker Trip Length (miles)	Total Vendor Trip Length (miles)	Total Haul Trip Length (miles)	Total gallons of gasoline	Total gallons of diesel
Building Construction	31	12	0	261	8091	3132	0	16.80	6.60	20.00	135928.8	20671.2	-	4,908	3,972
TOTAL													4,908	3,972	

Notes: Consistent with CalEEMod, worker vehicles assumed to be gasoline and 50% LDA, 25% LDT1, and 25% LDT2. Vendor and haul trips are assumed to be 100% diesel Heavy-Duty Trucks (T7).

Phase 3 Construction Offroad Equipment

Phase Name	Offroad Equipment Type	Amount	Usage Hours	Horse Power	Load Factor	Number of days	Diesel Fuel Usage
Building Construction	Generator Sets	1	8.00	84	0.74	238	5,918
Building Construction	Cranes	1	6.00	231	0.29	238	4,783
Building Construction	Forklifts	1	6.00	89	0.20	238	1,271
Building Construction	Tractors/Loaders/Backhoes	1	6.00	97	0.37	238	2,563
Building Construction	Welders	3	8.00	46	0.45	238	5,912
Paving	Cement and Mortar Mixers	1	6.00	78	0.48	22	247
Paving	Pavers	1	6.00	130	0.42	22	360
Paving	Rollers	1	7.00	80	0.38	22	234
Paving	Tractors/Loaders/Backhoes	1	8.00	97	0.37	22	316
Paving	Paving Equipment	1	8.00	132	0.36	22	418
TOTAL							22,022

1,576 20,446

Notes: Equipment assumptions are consistent with CalEEMod. Fuel usage average of 0.05 gallons of diesel fuel per horsepower-hour is from the SCAQMD CEQA Air Quality Handbook, Table A9-3E.

Trips and VMT

Phase Name	Daily Worker Trip	Daily Vendor Trip	Daily Haul Trip	Days per Year	Total Worker Trips	Total Vendor Trips	Total Haul Trips	Worker Trip Length (miles)	Vendor Trip Length (miles)	Haul Trip Length (miles)	Total Worker Trip Length (miles)	Total Vendor Trip Length (miles)	Total Haul Trip Length (miles)	Total gallons of gasoline	Total gallons of diesel
Building Construction	31	12	0	238	7378	2856	0	16.80	6.60	20.00	123950.4	18849.6	-	4,475	3,622
Paving	13	0	0	73	949	0	0	16.80	6.60	20.00	15,943.20	0.00	-	576	0
TOTAL													5,051	3,622	

Notes: Consistent with CalEEMod, worker vehicles assumed to be gasoline and 50% LDA, 25% LDT1, and 25% LDT2. Vendor and haul trips are assumed to be 100% diesel Heavy-Duty Trucks (T7).

Phase 4 Construction Offroad Equipment

Phase Name	Offroad Equipment Type	Amount	Usage Hours	Horse Power	Load Factor	Number of days	Diesel Fuel Usage
Paving	Cement and Mortar Mixers	1	6.00	78	0.48	4	45
Paving	Pavers	1	6.00	130	0.42	4	66
Paving	Rollers	1	7.00	80	0.38	4	43
Paving	Tractors/Loaders/Backhoes	1	8.00	97	0.37	4	57
Paving	Paving Equipment	1	8.00	132	0.36	4	76
Architectural Coating	Air Compressors	1	6.00	78	0.48	29	326
TOTAL							612

Notes: Equipment assumptions are consistent with CalEEMod. Fuel usage average of 0.05 gallons of diesel fuel per horsepower-hour is from the SCAQMD CEQA Air Quality Handbook, Table A9-3E.

Trips and VMT

Phase Name	Daily Worker Trip	Daily Vendor Trip	Daily Haul Trip	Days per Year	Total Worker Trips	Total Vendor Trips	Total Haul Trips	Worker Trip Length (miles)	Vendor Trip Length (miles)	Haul Trip Length (miles)	Total Worker Trip Length (miles)	Total Vendor Trip Length (miles)	Total Haul Trip Length (miles)	Total gallons of gasoline	Total gallons of diesel
Paving	13	0	0	4	52	0	0	16.80	6.60	20.00	873.6	0	-	32	0
Architectural Coating	8	0	0	29	232	0	0	16.80	6.60	20.00	3,897.60	0.00	-	141	0
TOTAL													172	0	

Notes: Consistent with CalEEMod, worker vehicles assumed to be gasoline and 50% LDA, 25% LDT1, and 25% LDT2. Vendor and haul trips are assumed to be 100% diesel Heavy-Duty Trucks (T7).

EMFAC2014 (v1.0.7) Emissions Inventory

Region Type: County

Region: Sacramento

Calendar Year: 2018

Season: Annual

Vehicle Classification: EMFAC2011 Categories

Units: miles/day for VMT, trips/day for Trips, tons/day for Emissions, 1000 gallons/day for Fuel Consumption

Region	CalYr	VehClass	MdYr	Speed miles/hr	Fuel	Population vehicles	VMT miles/day	Trips trips/day	Fuel gas 1,000 gallons/day	Diesel gas 1,000 gallons/day	Miles per gallon	Gasoline miles per gallon	Diesel miles per gallon
Placer	2020	LDA	Aggregated	Aggregated	GAS	123597.5	4664456.208	581628.8323	153.8271243	0.00	30.32	27.70	5.20
Placer	2020	LDT1	Aggregated	Aggregated	GAS	16642.318	626084.2598	76034.21315	23.81591686	0.00	26.29		
Placer	2020	LDT2	Aggregated	Aggregated	GAS	57708.41	2240153.802	268117.2551	93.91602595	0.00	23.85		
Placer	2020	T7 tractor construction	Aggregated	Aggregated	DSL	212.23472	14914.88116	959.5049136	0.00	2.865558861	5.20		

Notes: Consistent with CalEEMod, worker vehicles assumed to be gasoline and 50% LDA, 25% LDT1, and 25% LDT2. Vendor trips are assumed to be 100% diesel Heavy-Duty Trucks (T7).

EMFAC2014 (v1.0.7) Emissions Inventory

Region Type: County

Region: Placer County

Calendar Year: 2023

Season: Annual

Vehicle Classification: EMFAC2007 Categories

Units: miles/day for VMT, trips/day for Trips, tons/day for Emissions, 1000 gallons/day for Fuel Consumption

Region	CalYr	VehClass	Class	MdlYr	Speed	Fuel	Population	VMT (mi/day)	Trips	Fuel_Consumption (1000 gal/day)	Fuel (gal/day)	mi/gal	CO2_RUNEX (tons/day)	CO2 (lb/day)	% of vehicle class EMFAC	% vehicle class CalEEMod	% vehicle class project	VMT by project vehicle class (mi/yr)	Gallons of fuel
Placer County	2023	HHDT	Truck	Aggregated	Aggregated	GAS	1,065,954	122,082,898	21,327,62	0.027596354	27,59635441	4.423877771	0.260362491	521	0.000265515	0.026318	6.98782E-06	3.4363866	0.776781543
Placer County	2023	HHDT	Truck	Aggregated	Aggregated	DSL	3506.046	459674.7378	37937.27	67.9383034	67938.3034	6.766061481	699.690865	1,399,382	0.999734485	0.026318	0.026311012	12938.91384	1912.325786
Placer County	2023	LDA	Passenger	Aggregated	Aggregated	GAS	132178.4	4954812.364	623632.7	150.2956601	150295.6601	32.96710204	1386.820732	2,773,641	0.963315969	0.578893	0.557656871	274237.8044	8318.529303
Placer County	2023	LDA	Passenger	Aggregated	Aggregated	DSL	1587.314	59257.12168	7426.461	1.144674712	1144.674712	51.76765161	12.84375886	25,688	0.011520786	0.578893	0.006669302	3279.749413	63.35519019
Placer County	2023	LDA	Passenger	Aggregated	Aggregated	ELEC	3080.207	129427.0631	15303.4	0	0	#DIV/0!	0	0	0.025163245	0.578893	0.014566826	7163.499042	0
Placer County	2023	LDT1	Truck	Aggregated	Aggregated	GAS	17890.71	670060.7943	82138.75	23.64089264	23640.89264	28.343295	218.17655	436,353	0.990901867	0.033999	0.033689673	16567.5029	584.5298826
Placer County	2023	LDT1	Truck	Aggregated	Aggregated	DSL	11.79198	156.6784806	38.82522	0.006258466	6.258466357	25.03464454	0.070222773	140	0.0002317	0.033999	7.87756E-06	3.873933835	0.154742913
Placer County	2023	LDT1	Truck	Aggregated	Aggregated	ELEC	136.824	5995.598065	688.729	0	0	#DIV/0!	0	0	0.008866433	0.033999	0.00030145	148.243397	0
Placer County	2023	LDT2	Truck	Aggregated	Aggregated	GAS	60986.92	2312977.096	282812.6	88.05869377	88058.69377	26.26631168	812.3637929	1,624,728	0.99239405	0.21284	0.21122115	103871.8023	3954.563686
Placer County	2023	LDT2	Truck	Aggregated	Aggregated	DSL	393.6116	17727.22017	1921.311	0.459611148	459.6111477	38.57003961	5.157041288	10,314	0.00760595	0.21284	0.00161885	796.0988079	20.64034199
Placer County	2023	LHDT1	Truck	Aggregated	Aggregated	GAS	4694.391	158360.3553	69939.43	18.77613039	18776.13039	8.434131637	175.7752688	351,551	0.446682363	0.010628	0.00474734	2334.589972	276.8026482
Placer County	2023	LHDT1	Truck	Aggregated	Aggregated	DSL	5968.202	196165.2953	75072.47	10.96152472	10961.52472	17.89580375	122.0864863	244,173	0.553317637	0.010628	0.00588066	2891.920332	161.5976779
Placer County	2023	LHDT2	Truck	Aggregated	Aggregated	GAS	623.3406	21897.12202	9286.846	2.95650149	2956.50149	7.406430233	27.69349585	55,387	0.246856666	0.004325	0.001067655	525.0386046	70.88956327
Placer County	2023	LHDT2	Truck	Aggregated	Aggregated	DSL	1906.707	66806.66846	23983.97	4.163674791	4163.674791	16.04512163	46.25707761	92,514	0.753143334	0.004325	0.003257345	1601.857995	99.83458101
Placer County	2023	MCY	Passenger	Aggregated	Aggregated	GAS	9536.966	62900.06748	19073.93	1.699545777	1699.545777	37.00992838	14.75098032	29,502	1	0.005392	0.005392	2651.613056	71.64599262
Placer County	2023	MDV	Truck	Aggregated	Aggregated	GAS	44435.89	1470908.444	202964.3	69.72914077	69729.14077	21.09460159	641.1142636	1,282,229	0.970312562	0.104491	0.10138893	49859.8313	2363.629911
Placer County	2023	MDV	Truck	Aggregated	Aggregated	DSL	1189.577	45003.54272	5668.986	1.589193773	1589.193773	28.31847411	17.83146024	35,663	0.029687438	0.104491	0.00310207	1525.498788	53.86938512
Placer County	2023	MH	Other	Aggregated	Aggregated	GAS	1136.869	9543.989561	113.7324	1.995925212	1995.925212	4.781737064	18.90591176	37,812	0.675824754	0.000566	0.000382517	188.1095269	39.33916156
Placer County	2023	MH	Other	Aggregated	Aggregated	DSL	554.596	4577.999179	55.4596	0.470994554	470.994554	9.719855868	5.284768164	10,570	0.324175246	0.000566	0.000183483	90.23116111	9.283178921
Placer County	2023	MHDT	Truck	Aggregated	Aggregated	GAS	332.1513	17609.05577	6645.683	3.564768206	3564.768206	4.939747762	33.2990667	66,598	0.064620861	0.018736	0.001210736	595.4014472	120.5327632
Placer County	2023	MHDT	Truck	Aggregated	Aggregated	DSL	3707.31	254888.9485	36021.81	24.91161314	24911.61314	10.23173197	275.9089097	551,818	0.935379139	0.018736	0.017525264	8618.363801	842.317198
Placer County	2023	OBUS	Bus	Aggregated	Aggregated	GAS	108.9212	4964.381014	2179.295	1.033235102	1033.235102	4.804696438	9.679706427	19,359	0.525076353	0.001852	0.000972441	478.2155655	99.53085937
Placer County	2023	OBUS	Bus	Aggregated	Aggregated	DSL	57.73606	4490.207796	576.2379	0.575886687	575.8866871	7.797033507	6.262566866	12,525	0.474923647	0.001852	0.000879559	432.5387705	55.47478668
Placer County	2023	SBUS	Bus	Aggregated	Aggregated	GAS	26.32923	1149.753935	105.3169	0.118990098	118.9900985	9.662601763	1.049307029	2,099	0.121668394	0.000598	7.27577E-05	35.77990852	3.702926955
Placer County	2023	SBUS	Bus	Aggregated	Aggregated	DSL	266.0477	8300.144222	3070.153	1.042043817	1042.043817	7.96525452	10.5831553	21,166	0.878331606	0.000598	0.000525242	258.2973555	32.42801029
Placer County	2023	UBUS	Bus	Aggregated	Aggregated	GAS	34.35819	2762.519854	137.4328	0.655327132	655.3271317	4.215482194	6.194782681	12,390	0.30436708	0.001362	0.000414548	203.8614225	48.36016692
Placer County	2023	UBUS	Bus	Aggregated	Aggregated	DSL	59.88331	6313.756909	239.5332	0.78822697	788.2269698	8.010074701	8.84425682	17,689	0.69563292	0.001362	0.000947452	465.9265935	58.16757157

Project VMT (mi/yr)	491,768	From CalEEMod output
Project Mobile Emissions (MT/yr)	229	From CalEEMod output

Gasoline Sum	15,953
Diesel Sum	3,309

	Gas (gal)	Diesel (gal)
Passenger	8,390	63
Truck	7,372	3,091
Bus	152	146
Other	39	9
Total	15,953	3,309

Building Energy Consumption Summary

Land Use	Electricity (MWh/year)	Natural Gas (MMBtu/year)
Health Club	86	189
Total	86	189

1. Electricity and Natural Gas Values Derived from CalEEMod Defaults.

Energy Calculations Summary

Construction Fuel Usage Summary

	Diesel	Gasoline	Diesel	Diesel
Construction Phase	Off-road Equipment (gallons)	On-road (gallons)	On-road (gallons)	Total
2020	13,017	1,867	3,709	16,726
2021	22,422	4,908	3,972	26,393
2022	22,422	4,908	3,972	26,393
2023	5,595	1,263	883	6,477
TOTAL	63,456	12,945	12,534	75,990

Total Gasoline	12,945	gallons
Total Diesel	75,990	gallons

Phase 1 Construction Offroad Equipment

Phase Name	Offroad Equipment Type	Amount	Usage Hours	Horse Power	Load Factor	Number of days	Diesel Fuel Usage
Demolition	Concrete/Industrial Saws	1	8	81	0.71	57	1,311
Demolition	Rubber Tired Dozers	1	7.00	247	0.40	57	1,971
Demolition	Tractors/Loaders/Backhoes	3	8	97	0.37	57	2,455
Site Prep	Graders	1	8	187	0.41	5	153
Site Prep	Tractors/Loaders/Backhoes	1	8	97	0.37	5	72
Site Prep	Rubber Tired Dozers	1	7.00	247	0.40	5	173
Grading	Rubber Tired Dozers	1	6.00	247	0.40	12	356
Grading	Tractors/Loaders/Backhoes	1	7.00	97	0.37	12	151
Grading	Graders	1	6.00	187	0.41	12	276
Building Construction	Generator Sets	1	8.00	84	0.74	71	1,765
Building Construction	Cranes	1	6.00	231	0.29	71	1,427
Building Construction	Forklifts	1	6.00	89	0.20	71	379
Building Construction	Tractors/Loaders/Backhoes	1	6.00	97	0.37	71	764
Building Construction	Welders	3	8.00	46	0.45	71	1,764
TOTAL							13,017

Notes: Equipment assumptions are consistent with CalEEMod. Fuel usage average of 0.05 gallons of diesel fuel per horsepower-hour is from the SCAQMD CEQA Air Quality Handbook, Table A9-3E.

Number of days accounts for weekend where construction would not occur.

Trips and VMT

Phase Name	Daily Worker Trip	Daily Vendor Trip	Daily Hauling Trip	Days per Year	Total Worker Trips	Total Vendor Trips	Total Haul Trips	Worker Trip Length (miles)	Vendor Trip Length (miles)	Haul Trip Length (miles)	Total Worker Trip Length (miles)	Total Vendor Trip Length (miles)	Total Haul Trip Length (miles)	Total gallons of gasoline	Total gallons of diesel
Demolition	13	0	12	57	741	0	684	16.80	6.60	20.00	12,449	0	13,680.00	449	2,628
Site Prep	8	0	0	5	40	0	0	16.80	6.60	20.00	672	0	-	24	0
Grading	8	0	0	12	96	0	0	16.80	6.60	20.00	1,613	0	-	58	0
Building Construction	31	12	0	71	2,201	852	0	16.80	6.60	20.00	36,977	5,623	-	1,335	1,080
TOTAL													1,867	3,709	

Notes: Consistent with CalEEMod, worker vehicles assumed to be gasoline and 50% LDA, 25% LDT1, and 25% LDT2. Vendor and haul trips are assumed to be 100% diesel Heavy-Duty Trucks (T7).

Phase 2 Construction Offroad Equipment

Phase Name	Offroad Equipment Type	Amount	Usage Hours	Horse Power	Load Factor	Number of days	Diesel Fuel Usage
Building Construction	Generator Sets	1	8.00	84	0.74	261	6,490
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TOTAL							22,422

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Phase Name	Daily Worker Trip	Daily Vendor Trip	Daily Haul Trip	Days per Year	Total Worker Trips	Total Vendor Trips	Total Haul Trips	Worker Trip Length (miles)	Vendor Trip Length (miles)	Haul Trip Length (miles)	Total Worker Trip Length (miles)	Total Vendor Trip Length (miles)	Total Haul Trip Length (miles)	Total gallons of gasoline	Total gallons of diesel
Building Construction	31	12	0	261	8091	3132	0	16.80	6.60	20.00	135928.8	20671.2	-	4,908	3,972
TOTAL													4,908	3,972	

Notes: Consistent with CalEEMod, worker vehicles assumed to be gasoline and 50% LDA, 25% LDT1, and 25% LDT2. Vendor and haul trips are assumed to be 100% diesel Heavy-Duty Trucks (T7).

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Notes: Equipment assumptions are consistent with CalEEMod. Fuel usage average of 0.05 gallons of diesel fuel per horsepower-hour is from the SCAQMD CEQA Air Quality Handbook, Table A9-3E.

Trips and VMT

Phase Name	Daily Worker Trip	Daily Vendor Trip	Daily Haul Trip	Days per Year	Total Worker Trips	Total Vendor Trips	Total Haul Trips	Worker Trip Length (miles)	Vendor Trip Length (miles)	Haul Trip Length (miles)	Total Worker Trip Length (miles)	Total Vendor Trip Length (miles)	Total Haul Trip Length (miles)	Total gallons of gasoline	Total gallons of diesel
Building Construction	31	12	0	261	8091	3132	0	16.80	6.60	20.00	135928.8	20671.2	-	4,908	3,972
TOTAL													4,908	3,972	

Notes: Consistent with CalEEMod, worker vehicles assumed to be gasoline and 50% LDA, 25% LDT1, and 25% LDT2. Vendor and haul trips are assumed to be 100% diesel Heavy-Duty Trucks (T7).

Phase 4 Construction Offroad Equipment

Phase Name	Offroad Equipment Type	Amount	Usage Hours	Horse Power	Load Factor	Number of days	Diesel Fuel Usage
Building Construction	Generator Sets	1	8.00	84	0.74	58	1,442
Building Construction	Cranes	1	6.00	231	0.29	58	1,166
Building Construction	Forklifts	1	6.00	89	0.20	58	310
Building Construction	Tractors/Loaders/Backhoes	1	6.00	97	0.37	58	624
Building Construction	Welders	3	8.00	46	0.45	58	1,441
Paving	Cement and Mortar Mixers	1	6.00	78	0.48	4	45
Paving	Pavers	1	6.00	130	0.42	4	66
Paving	Rollers	1	7.00	80	0.38	4	43
Paving	Tractors/Loaders/Backhoes	1	8.00	97	0.37	4	57
Paving	Paving Equipment	1	8.00	132	0.36	4	76
Architectural Coating	Air Compressors	1	6.00	78	0.48	29	326
TOTAL							5,595

Notes: Equipment assumptions are consistent with CalEEMod. Fuel usage average of 0.05 gallons of diesel fuel per horsepower-hour is from the SCAQMD CEQA Air Quality Handbook, Table A9-3E.

Trips and VMT

Phase Name	Daily Worker Trip	Daily Vendor Trip	Daily Haul Trip	Days per Year	Total Worker Trips	Total Vendor Trips	Total Haul Trips	Worker Trip Length (miles)	Vendor Trip Length (miles)	Haul Trip Length (miles)	Total Worker Trip Length (miles)	Total Vendor Trip Length (miles)	Total Haul Trip Length (miles)	Total gallons of gasoline	Total gallons of diesel
Building Construction	31	12	0	58	1798	696	0	16.80	6.60	20.00	30206.4	4593.6	-	1,091	883
Paving	13	0	0	4	52	0	0	16.80	6.60	20.00	873.6	0	-	32	0
Architectural Coating	8	0	0	29	232	0	0	16.80	6.60	20.00	3,897.60	0.00	-	141	0
TOTAL													1,263	883	

Notes: Consistent with CalEEMod, worker vehicles assumed to be gasoline and 50% LDA, 25% LDT1, and 25% LDT2. Vendor and haul trips are assumed to be 100% diesel Heavy-Duty Trucks (T7).

EMFAC2014 (v1.0.7) Emissions Inventory

Region Type: County

Region: Sacramento

Calendar Year: 2018

Season: Annual

Vehicle Classification: EMFAC2011 Categories

Units: miles/day for VMT, trips/day for Trips, tons/day for Emissions, 1000 gallons/day for Fuel Consumption

Region	CalYr	VehClass	Mdlyr	Speed miles/hr	Fuel	Population vehicles	VMT miles/day	Trips trips/day	Fuel gas 1,000 gallons/day	Diesel gas 1,000 gallons/day	Miles per gallon	Gasoline miles per gallon	Diesel miles per gallon
Placer	2020	LDA	Aggregated	Aggregated	GAS	123597.5	4664456.208	581628.8323	153.8271243	0.00	30.32	27.70	5.20
Placer	2020	LDT1	Aggregated	Aggregated	GAS	16642.318	626084.2598	76034.21315	23.81591686	0.00	26.29		
Placer	2020	LDT2	Aggregated	Aggregated	GAS	57708.41	2240153.802	268117.2551	93.91602595	0.00	23.85		
Placer	2020	T7 tractor construction	Aggregated	Aggregated	DSL	212.23472	14914.88116	959.5049136	0.00	2.865558861	5.20		

Notes: Consistent with CalEEMod, worker vehicles assumed to be gasoline and 50% LDA, 25% LDT1, and 25% LDT2. Vendor trips are assumed to be 100% diesel Heavy-Duty Trucks (T7).