

Appendix C
Air Quality and GHG Emissions Analysis

Hotel project Sonoma RDEIR. Detailed Report

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1. Basic Project Information

1.1. Basic Project Information

Data Field	Value
Project Name	Hotel project Sonoma RDEIR.
Construction Start Date	1/2/2024
Operational Year	2025
Lead Agency	—
Land Use Scale	Project/site
Analysis Level for Defaults	County
Windspeed (m/s)	3.60
Precipitation (days)	40.4
Location	153 W Napa St, Sonoma, CA 95476, USA
County	Sonoma-San Francisco
City	Sonoma
Air District	Bay Area AQMD
Air Basin	San Francisco Bay Area
TAZ	981
EDFZ	2
Electric Utility	Pacific Gas & Electric Company
Gas Utility	Pacific Gas & Electric
App Version	2022.1.1.8

1.2. Land Use Types

Land Use Subtype	Size	Unit	Lot Acreage	Building Area (sq ft)	Landscape Area (sq ft)	Special Landscape Area (sq ft)	Population	Description
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Apartments Mid Rise	8.00	Dwelling Unit	0.00	12,963	0.00	—	20.0	—
Parking Lot	17.0	Space	0.27	0.00	0.00	—	—	—
Enclosed Parking with Elevator	113	Space	0.01	52,110	0.00	—	—	—
Other Non-Asphalt Surfaces	0.43	Acre	0.43	0.00	0.00	—	—	—
Hotel	62.0	Room	0.55	58,445	2,150	—	—	—
High Turnover (Sit Down Restaurant)	7.00	1000sqft	0.00	7,161	0.00	—	—	—

1.3. User-Selected Emission Reduction Measures by Emissions Sector

No measures selected

2. Emissions Summary

2.1. Construction Emissions Compared Against Thresholds

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Un/Mit.	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unmit.	10.1	20.3	72.8	81.2	0.14	3.00	3.55	6.56	2.76	1.53	4.29	—	14,468	14,468	0.60	0.23	4.46	14,555
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unmit.	11.7	15.7	99.7	90.5	0.19	4.23	6.66	10.9	3.89	2.90	6.79	—	19,335	19,335	1.01	1.03	0.30	19,669
Average Daily (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unmit.	2.20	3.85	16.1	17.3	0.03	0.66	0.78	1.45	0.61	0.28	0.89	—	3,353	3,353	0.15	0.11	1.10	3,390

Annual (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unmit.	0.40	0.70	2.94	3.17	0.01	0.12	0.14	0.26	0.11	0.05	0.16	—	555	555	0.02	0.02	0.18	561

2.2. Construction Emissions by Year, Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Year	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily - Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
2024	2.05	1.71	12.9	16.5	0.03	0.46	0.62	1.08	0.43	0.15	0.58	—	3,306	3,306	0.14	0.12	3.73	3,350
2025	10.1	20.3	72.8	81.2	0.14	3.00	3.55	6.56	2.76	1.53	4.29	—	14,468	14,468	0.60	0.23	4.46	14,555
Daily - Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
2024	11.7	9.51	99.7	90.5	0.19	4.23	6.66	10.9	3.89	2.90	6.79	—	19,335	19,335	1.01	1.03	0.30	19,669
2025	4.64	15.7	30.5	36.7	0.07	1.07	0.69	1.76	0.99	0.17	1.16	—	6,901	6,901	0.28	0.15	0.10	6,953
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
2024	2.20	1.82	16.1	17.3	0.03	0.66	0.78	1.45	0.61	0.28	0.89	—	3,353	3,353	0.15	0.11	1.10	3,390
2025	1.74	3.85	11.7	13.9	0.03	0.42	0.28	0.70	0.39	0.08	0.46	—	2,635	2,635	0.11	0.06	0.60	2,655
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
2024	0.40	0.33	2.94	3.17	0.01	0.12	0.14	0.26	0.11	0.05	0.16	—	555	555	0.02	0.02	0.18	561
2025	0.32	0.70	2.13	2.53	< 0.005	0.08	0.05	0.13	0.07	0.01	0.08	—	436	436	0.02	0.01	0.10	440

2.4. Operations Emissions Compared Against Thresholds

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Un/Mit.	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
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Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unmit.	4.60	5.94	8.78	39.7	0.10	0.36	2.88	3.25	0.36	0.52	0.88	73.9	12,245	12,319	7.99	0.42	138	12,782
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unmit.	4.53	5.85	9.43	36.6	0.10	0.36	2.88	3.25	0.36	0.52	0.88	73.9	11,818	11,892	8.01	0.45	104	12,330
Average Daily (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unmit.	3.47	4.92	6.72	30.7	0.08	0.25	2.55	2.80	0.25	0.46	0.71	73.9	10,468	10,542	7.96	0.39	116	10,973
Annual (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unmit.	0.63	0.90	1.23	5.60	0.02	0.05	0.46	0.51	0.05	0.08	0.13	12.2	1,733	1,745	1.32	0.06	19.3	1,817

2.5. Operations Emissions by Sector, Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Sector	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Mobile	3.50	3.12	4.40	36.2	0.08	0.08	2.88	2.96	0.07	0.52	0.60	—	8,607	8,607	0.31	0.38	35.8	8,764
Area	0.09	1.97	0.79	0.33	0.01	0.06	—	0.06	0.06	—	0.06	0.00	999	999	0.02	< 0.005	—	1,000
Energy	0.16	0.08	1.44	1.20	0.01	0.11	—	0.11	0.11	—	0.11	—	2,235	2,235	0.24	0.01	—	2,245
Water	—	—	—	—	—	—	—	—	—	—	—	7.58	9.88	17.5	0.78	0.02	—	42.5
Waste	—	—	—	—	—	—	—	—	—	—	—	66.3	0.00	66.3	6.63	0.00	—	232
Refrig.	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	103	103
Stationary	0.85	0.77	2.16	1.97	< 0.005	0.11	—	0.11	0.11	—	0.11	—	395	395	0.02	< 0.005	—	396
Total	4.60	5.94	8.78	39.7	0.10	0.36	2.88	3.25	0.36	0.52	0.88	73.9	12,245	12,319	7.99	0.42	138	12,782

Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Mobile	3.43	3.03	5.04	33.1	0.08	0.08	2.88	2.96	0.07	0.52	0.60	—	8,180	8,180	0.34	0.41	0.93	8,312
Area	0.09	1.97	0.79	0.33	0.01	0.06	—	0.06	0.06	—	0.06	0.00	999	999	0.02	< 0.005	—	1,000
Energy	0.16	0.08	1.44	1.20	0.01	0.11	—	0.11	0.11	—	0.11	—	2,235	2,235	0.24	0.01	—	2,245
Water	—	—	—	—	—	—	—	—	—	—	—	7.58	9.88	17.5	0.78	0.02	—	42.5
Waste	—	—	—	—	—	—	—	—	—	—	—	66.3	0.00	66.3	6.63	0.00	—	232
Refrig.	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	103	103
Stationary	0.85	0.77	2.16	1.97	< 0.005	0.11	—	0.11	0.11	—	0.11	—	395	395	0.02	< 0.005	—	396
Total	4.53	5.85	9.43	36.6	0.10	0.36	2.88	3.25	0.36	0.52	0.88	73.9	11,818	11,892	8.01	0.45	104	12,330
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Mobile	3.11	2.77	4.27	28.9	0.07	0.07	2.55	2.62	0.06	0.46	0.53	—	7,268	7,268	0.30	0.36	13.7	7,395
Area	0.08	1.97	0.71	0.30	< 0.005	0.06	—	0.06	0.06	—	0.06	0.00	901	901	0.02	< 0.005	—	902
Energy	0.16	0.08	1.44	1.20	0.01	0.11	—	0.11	0.11	—	0.11	—	2,235	2,235	0.24	0.01	—	2,245
Water	—	—	—	—	—	—	—	—	—	—	—	7.58	9.88	17.5	0.78	0.02	—	42.5
Waste	—	—	—	—	—	—	—	—	—	—	—	66.3	0.00	66.3	6.63	0.00	—	232
Refrig.	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	103	103
Stationary	0.12	0.11	0.30	0.27	< 0.005	0.02	—	0.02	0.02	—	0.02	—	54.1	54.1	< 0.005	< 0.005	—	54.2
Total	3.47	4.92	6.72	30.7	0.08	0.25	2.55	2.80	0.25	0.46	0.71	73.9	10,468	10,542	7.96	0.39	116	10,973
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Mobile	0.57	0.50	0.78	5.27	0.01	0.01	0.46	0.48	0.01	0.08	0.10	—	1,203	1,203	0.05	0.06	2.26	1,224
Area	0.02	0.36	0.13	0.06	< 0.005	0.01	—	0.01	0.01	—	0.01	0.00	149	149	< 0.005	< 0.005	—	149
Energy	0.03	0.01	0.26	0.22	< 0.005	0.02	—	0.02	0.02	—	0.02	—	370	370	0.04	< 0.005	—	372
Water	—	—	—	—	—	—	—	—	—	—	—	1.25	1.64	2.89	0.13	< 0.005	—	7.03
Waste	—	—	—	—	—	—	—	—	—	—	—	11.0	0.00	11.0	1.10	0.00	—	38.4

Refrig.	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	17.0	17.0
Stationary	0.02	0.02	0.05	0.05	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	8.95	8.95	< 0.005	< 0.005	—	8.98
Total	0.63	0.90	1.23	5.60	0.02	0.05	0.46	0.51	0.05	0.08	0.13	12.2	1,733	1,745	1.32	0.06	19.3	1,817

3. Construction Emissions Details

3.1. Demolition (2024) - Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Location	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Onsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	5.76	4.83	46.7	48.1	0.07	2.02	—	2.02	1.85	—	1.85	—	7,481	7,481	0.30	0.06	—	7,507
Demolition	—	—	—	—	—	—	0.22	0.22	—	0.03	0.03	—	—	—	—	—	—	—
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.38	0.32	3.07	3.16	< 0.005	0.13	—	0.13	0.12	—	0.12	—	492	492	0.02	< 0.005	—	494
Demolition	—	—	—	—	—	—	0.01	0.01	—	< 0.005	< 0.005	—	—	—	—	—	—	—
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Off-Road Equipment	0.07	0.06	0.56	0.58	< 0.005	0.02	—	0.02	0.02	—	0.02	—	81.4	81.4	< 0.005	< 0.005	—	81.7
Demolition	—	—	—	—	—	—	< 0.005	< 0.005	—	< 0.005	< 0.005	—	—	—	—	—	—	—
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.06	0.05	0.05	0.58	0.00	0.00	0.10	0.10	0.00	0.02	0.02	—	103	103	0.01	< 0.005	0.01	105
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.02	< 0.005	0.28	0.11	< 0.005	< 0.005	0.04	0.04	< 0.005	0.01	0.01	—	175	175	0.01	0.03	0.01	183
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	0.04	0.00	0.00	0.01	0.01	0.00	< 0.005	< 0.005	—	6.85	6.85	< 0.005	< 0.005	0.01	6.96
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	< 0.005	< 0.005	0.02	0.01	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	11.5	11.5	< 0.005	< 0.005	0.01	12.1
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	0.01	0.00	0.00	< 0.005	< 0.005	0.00	< 0.005	< 0.005	—	1.13	1.13	< 0.005	< 0.005	< 0.005	1.15
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	1.90	1.90	< 0.005	< 0.005	< 0.005	2.00

3.3. Site Preparation (2024) - Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Location	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Onsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	5.10	4.29	41.1	38.8	0.06	1.94	—	1.94	1.78	—	1.78	—	6,191	6,191	0.25	0.05	—	6,212
Dust From Material Movement	—	—	—	—	—	—	2.52	2.52	—	1.18	1.18	—	—	—	—	—	—	—
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.14	0.12	1.12	1.06	< 0.005	0.05	—	0.05	0.05	—	0.05	—	170	170	0.01	< 0.005	—	170
Dust From Material Movement	—	—	—	—	—	—	0.07	0.07	—	0.03	0.03	—	—	—	—	—	—	—
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.03	0.02	0.21	0.19	< 0.005	0.01	—	0.01	0.01	—	0.01	—	28.1	28.1	< 0.005	< 0.005	—	28.2
Dust From Material Movement	—	—	—	—	—	—	0.01	0.01	—	0.01	0.01	—	—	—	—	—	—	—
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.04	0.03	0.03	0.35	0.00	0.00	0.06	0.06	0.00	0.01	0.01	—	62.1	62.1	< 0.005	< 0.005	0.01	62.9
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.66	0.19	10.9	4.71	0.07	0.07	1.25	1.31	0.06	0.35	0.41	—	5,653	5,653	0.45	0.92	0.28	5,938
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	0.01	0.00	0.00	< 0.005	< 0.005	0.00	< 0.005	< 0.005	—	1.71	1.71	< 0.005	< 0.005	< 0.005	1.74
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.02	0.01	0.30	0.13	< 0.005	< 0.005	0.03	0.04	< 0.005	0.01	0.01	—	155	155	0.01	0.03	0.13	163
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	< 0.005	0.00	0.00	< 0.005	< 0.005	0.00	< 0.005	< 0.005	—	0.28	0.28	< 0.005	< 0.005	< 0.005	0.29
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	< 0.005	< 0.005	0.05	0.02	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	< 0.005	—	25.6	25.6	< 0.005	< 0.005	0.02	26.9

3.5. Grading (2024) - Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Location	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Onsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	5.89	4.95	47.7	46.3	0.07	2.23	—	2.23	2.05	—	2.05	—	7,361	7,361	0.30	0.06	—	7,386

Dust From Material Movement:	—	—	—	—	—	—	2.76	2.76	—	1.34	1.34	—	—	—	—	—	—	—
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.65	0.54	5.22	5.07	0.01	0.24	—	0.24	0.22	—	0.22	—	807	807	0.03	0.01	—	809
Dust From Material Movement:	—	—	—	—	—	—	0.30	0.30	—	0.15	0.15	—	—	—	—	—	—	—
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.12	0.10	0.95	0.93	< 0.005	0.04	—	0.04	0.04	—	0.04	—	134	134	0.01	< 0.005	—	134
Dust From Material Movement:	—	—	—	—	—	—	0.06	0.06	—	0.03	0.03	—	—	—	—	—	—	—
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.05	0.04	0.04	0.41	0.00	0.00	0.07	0.07	0.00	0.02	0.02	—	68.9	68.9	< 0.005	< 0.005	0.01	69.9
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00

Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	0.04	0.00	0.00	0.01	0.01	0.00	< 0.005	< 0.005	—	7.61	7.61	< 0.005	< 0.005	0.02	7.74
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	0.01	0.00	0.00	< 0.005	< 0.005	0.00	< 0.005	< 0.005	—	1.26	1.26	< 0.005	< 0.005	< 0.005	1.28
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00

3.7. Grading (2025) - Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Location	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Onsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	5.40	4.53	42.2	43.5	0.07	1.93	—	1.93	1.78	—	1.78	—	7,364	7,364	0.30	0.06	—	7,389
Dust From Material Movement	—	—	—	—	—	—	2.76	2.76	—	1.34	1.34	—	—	—	—	—	—	—
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.07	0.06	0.58	0.60	< 0.005	0.03	—	0.03	0.02	—	0.02	—	101	101	< 0.005	< 0.005	—	101

Dust From Material Movement:	—	—	—	—	—	—	0.04	0.04	—	0.02	0.02	—	—	—	—	—	—	—
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.01	0.01	0.11	0.11	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	16.7	16.7	< 0.005	< 0.005	—	16.8
Dust From Material Movement:	—	—	—	—	—	—	0.01	0.01	—	< 0.005	< 0.005	—	—	—	—	—	—	—
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.04	0.04	0.03	0.49	0.00	0.00	0.08	0.08	0.00	0.02	0.02	—	87.1	87.1	< 0.005	< 0.005	0.37	88.6
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.01	< 0.005	0.14	0.06	< 0.005	< 0.005	0.02	0.02	< 0.005	< 0.005	0.01	—	76.5	76.5	0.01	0.01	0.15	80.5
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	0.01	0.00	0.00	< 0.005	< 0.005	0.00	< 0.005	< 0.005	—	1.12	1.12	< 0.005	< 0.005	< 0.005	1.14
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	1.05	1.05	< 0.005	< 0.005	< 0.005	1.10
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	< 0.005	0.00	0.00	< 0.005	< 0.005	0.00	< 0.005	< 0.005	—	0.19	0.19	< 0.005	< 0.005	< 0.005	0.19
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00

Hauling	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.17	0.17	< 0.005	< 0.005	< 0.005	0.18
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3.9. Building Construction (2024) - Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Location	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Onsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	1.36	1.13	9.44	10.1	0.02	0.37	—	0.37	0.34	—	0.34	—	1,801	1,801	0.07	0.01	—	1,807
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	1.36	1.13	9.44	10.1	0.02	0.37	—	0.37	0.34	—	0.34	—	1,801	1,801	0.07	0.01	—	1,807
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.81	0.67	5.60	5.99	0.01	0.22	—	0.22	0.20	—	0.20	—	1,068	1,068	0.04	0.01	—	1,072
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.15	0.12	1.02	1.09	< 0.005	0.04	—	0.04	0.04	—	0.04	—	177	177	0.01	< 0.005	—	177
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.27	0.25	0.18	2.90	0.00	0.00	0.46	0.46	0.00	0.11	0.11	—	490	490	0.03	0.02	2.18	499
Vendor	0.05	0.02	0.78	0.31	< 0.005	0.01	0.14	0.15	0.01	0.04	0.05	—	567	567	0.03	0.09	1.45	595
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.26	0.22	0.24	2.57	0.00	0.00	0.46	0.46	0.00	0.11	0.11	—	457	457	0.03	0.02	0.06	463
Vendor	0.04	0.02	0.82	0.32	< 0.005	0.01	0.14	0.15	0.01	0.04	0.05	—	568	568	0.03	0.09	0.04	594
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.15	0.13	0.13	1.48	0.00	0.00	0.26	0.26	0.00	0.06	0.06	—	273	273	0.02	0.01	0.56	277
Vendor	0.03	0.01	0.48	0.19	< 0.005	< 0.005	0.08	0.09	< 0.005	0.02	0.03	—	336	336	0.02	0.05	0.37	352
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.03	0.02	0.02	0.27	0.00	0.00	0.05	0.05	0.00	0.01	0.01	—	45.2	45.2	< 0.005	< 0.005	0.09	45.9
Vendor	< 0.005	< 0.005	0.09	0.03	< 0.005	< 0.005	0.02	0.02	< 0.005	< 0.005	< 0.005	—	55.7	55.7	< 0.005	0.01	0.06	58.3
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00

3.11. Building Construction (2025) - Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Location	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Onsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Off-Road Equipment	3.85	3.20	26.8	30.1	0.06	0.98	—	0.98	0.91	—	0.91	—	5,404	5,404	0.22	0.04	—	5,422
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	3.85	3.20	26.8	30.1	0.06	0.98	—	0.98	0.91	—	0.91	—	5,404	5,404	0.22	0.04	—	5,422
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	1.42	1.18	9.93	11.1	0.02	0.36	—	0.36	0.34	—	0.34	—	1,999	1,999	0.08	0.02	—	2,005
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.26	0.22	1.81	2.03	< 0.005	0.07	—	0.07	0.06	—	0.06	—	331	331	0.01	< 0.005	—	332
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.24	0.23	0.17	2.70	0.00	0.00	0.46	0.46	0.00	0.11	0.11	—	481	481	0.02	0.02	2.02	489
Vendor	0.04	0.02	0.74	0.30	< 0.005	0.01	0.14	0.15	0.01	0.04	0.05	—	559	559	0.03	0.08	1.44	585
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.24	0.22	0.22	2.39	0.00	0.00	0.46	0.46	0.00	0.11	0.11	—	448	448	0.01	0.02	0.05	454

Vendor	0.04	0.01	0.78	0.31	< 0.005	0.01	0.14	0.15	0.01	0.04	0.05	—	559	559	0.03	0.08	0.04	584
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.09	0.08	0.07	0.86	0.00	0.00	0.16	0.16	0.00	0.04	0.04	—	167	167	0.01	0.01	0.32	170
Vendor	0.02	0.01	0.28	0.11	< 0.005	< 0.005	0.05	0.05	< 0.005	0.01	0.02	—	207	207	0.01	0.03	0.23	216
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.02	0.01	0.01	0.16	0.00	0.00	0.03	0.03	0.00	0.01	0.01	—	27.7	27.7	< 0.005	< 0.005	0.05	28.1
Vendor	< 0.005	< 0.005	0.05	0.02	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	< 0.005	—	34.2	34.2	< 0.005	< 0.005	0.04	35.8
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00

3.13. Paving (2025) - Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Location	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Onsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	1.77	1.48	13.9	19.5	0.03	0.61	—	0.61	0.56	—	0.56	—	2,975	2,975	0.12	0.02	—	2,985
Paving	—	0.10	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Off-Road Equipment	0.03	0.03	0.27	0.37	< 0.005	0.01	—	0.01	0.01	—	0.01	—	57.1	57.1	< 0.005	< 0.005	—	57.3
Paving	—	< 0.005	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.01	0.01	0.05	0.07	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	9.45	9.45	< 0.005	< 0.005	—	9.48
Paving	—	< 0.005	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.06	0.05	0.04	0.61	0.00	0.00	0.10	0.10	0.00	0.02	0.02	—	109	109	0.01	< 0.005	0.46	111
Vendor	< 0.005	< 0.005	0.07	0.03	< 0.005	< 0.005	0.01	0.01	< 0.005	< 0.005	< 0.005	—	55.5	55.5	< 0.005	0.01	0.14	58.1
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	0.01	0.00	0.00	< 0.005	< 0.005	0.00	< 0.005	< 0.005	—	1.96	1.96	< 0.005	< 0.005	< 0.005	1.99
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	1.06	1.06	< 0.005	< 0.005	< 0.005	1.11
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	< 0.005	0.00	0.00	< 0.005	< 0.005	0.00	< 0.005	< 0.005	—	0.32	0.32	< 0.005	< 0.005	< 0.005	0.33
Vendor	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	0.18	0.18	< 0.005	< 0.005	< 0.005	0.18
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00

3.15. Architectural Coating (2025) - Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Location	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Onsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.46	0.38	2.65	3.42	0.01	0.08	—	0.08	0.08	—	0.08	—	401	401	0.02	< 0.005	—	402
Architect ural Coatings	—	11.8	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.46	0.38	2.65	3.42	0.01	0.08	—	0.08	0.08	—	0.08	—	401	401	0.02	< 0.005	—	402
Architect ural Coatings	—	11.8	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.09	0.08	0.54	0.69	< 0.005	0.02	—	0.02	0.02	—	0.02	—	81.2	81.2	< 0.005	< 0.005	—	81.5
Architect ural Coatings	—	2.40	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00

Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.02	0.01	0.10	0.13	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	13.4	13.4	< 0.005	< 0.005	—	13.5
Architectural Coatings	—	0.44	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.05	0.05	0.03	0.54	0.00	0.00	0.09	0.09	0.00	0.02	0.02	—	96.2	96.2	< 0.005	< 0.005	0.40	97.9
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.05	0.04	0.04	0.48	0.00	0.00	0.09	0.09	0.00	0.02	0.02	—	89.6	89.6	< 0.005	< 0.005	0.01	90.9
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.01	0.01	0.01	0.09	0.00	0.00	0.02	0.02	0.00	< 0.005	< 0.005	—	18.3	18.3	< 0.005	< 0.005	0.04	18.6
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	0.02	0.00	0.00	< 0.005	< 0.005	0.00	< 0.005	< 0.005	—	3.03	3.03	< 0.005	< 0.005	0.01	3.08
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00

3.17. Trenching (2024) - Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Location	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Onsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.36	0.30	2.53	3.04	< 0.005	0.09	—	0.09	0.08	—	0.08	—	425	425	0.02	< 0.005	—	427
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	0.02	0.02	0.14	0.17	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	23.3	23.3	< 0.005	< 0.005	—	23.4
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Off-Road Equipment	< 0.005	< 0.005	0.03	0.03	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	3.86	3.86	< 0.005	< 0.005	—	3.87
Onsite truck	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Offsite	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	0.01	0.01	0.01	0.13	0.00	0.00	0.02	0.02	0.00	< 0.005	< 0.005	—	22.2	22.2	< 0.005	< 0.005	0.10	22.6
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00

Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	0.01	0.00	0.00	< 0.005	< 0.005	0.00	< 0.005	< 0.005	—	1.14	1.14	< 0.005	< 0.005	< 0.005	1.16
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Worker	< 0.005	< 0.005	< 0.005	< 0.005	0.00	0.00	< 0.005	< 0.005	0.00	< 0.005	< 0.005	—	0.19	0.19	< 0.005	< 0.005	< 0.005	0.19
Vendor	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00
Hauling	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	0.00	0.00	0.00	0.00

4. Operations Emissions Details

4.1. Mobile Emissions by Land Use

4.1.1. Unmitigated

Mobile source emissions results are presented in Sections 2.6. No further detailed breakdown of emissions is available.

4.2. Energy

4.2.1. Electricity Emissions By Land Use - Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Land Use	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Apartments Mid Rise	—	—	—	—	—	—	—	—	—	—	—	—	14.3	14.3	< 0.005	< 0.005	—	14.4
Parking Lot	—	—	—	—	—	—	—	—	—	—	—	—	5.76	5.76	< 0.005	< 0.005	—	5.81
Enclosed Parking with Elevator	—	—	—	—	—	—	—	—	—	—	—	—	108	108	0.02	< 0.005	—	109
Other Non-Asphalt Surfaces	—	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	—	0.00
Hotel	—	—	—	—	—	—	—	—	—	—	—	—	209	209	0.03	< 0.005	—	212
High Turnover (Sit Down Restaurart)	—	—	—	—	—	—	—	—	—	—	—	—	176	176	0.03	< 0.005	—	178
Total	—	—	—	—	—	—	—	—	—	—	—	—	513	513	0.08	0.01	—	518
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Apartments Mid Rise	—	—	—	—	—	—	—	—	—	—	—	—	14.3	14.3	< 0.005	< 0.005	—	14.4
Parking Lot	—	—	—	—	—	—	—	—	—	—	—	—	5.76	5.76	< 0.005	< 0.005	—	5.81
Enclosed Parking with Elevator	—	—	—	—	—	—	—	—	—	—	—	—	108	108	0.02	< 0.005	—	109
Other Non-Asphalt Surfaces	—	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	—	0.00
Hotel	—	—	—	—	—	—	—	—	—	—	—	—	209	209	0.03	< 0.005	—	212

High Turnover (Sit Down Restaurant)	—	—	—	—	—	—	—	—	—	—	—	—	—	176	176	0.03	< 0.005	—	178
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	513	513	0.08	0.01	—	518
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Apartments Mid Rise	—	—	—	—	—	—	—	—	—	—	—	—	—	2.36	2.36	< 0.005	< 0.005	—	2.39
Parking Lot	—	—	—	—	—	—	—	—	—	—	—	—	—	0.95	0.95	< 0.005	< 0.005	—	0.96
Enclosed Parking with Elevator	—	—	—	—	—	—	—	—	—	—	—	—	—	17.8	17.8	< 0.005	< 0.005	—	18.0
Other Non-Asphalt Surfaces	—	—	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	—	0.00
Hotel	—	—	—	—	—	—	—	—	—	—	—	—	—	34.7	34.7	0.01	< 0.005	—	35.0
High Turnover (Sit Down Restaurant)	—	—	—	—	—	—	—	—	—	—	—	—	—	29.1	29.1	< 0.005	< 0.005	—	29.4
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	84.9	84.9	0.01	< 0.005	—	85.8

4.2.3. Natural Gas Emissions By Land Use - Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Land Use	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Apartments Mid Rise	< 0.005	< 0.005	0.02	0.01	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	28.8	28.8	< 0.005	< 0.005	—	28.9
Parking Lot	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	0.00	0.00	0.00	—	0.00
Enclosed Parking with Elevator	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	0.00	0.00	0.00	—	0.00
Other Non-Asphalt Surfaces	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	0.00	0.00	0.00	—	0.00
Hotel	0.10	0.05	0.91	0.76	0.01	0.07	—	0.07	0.07	—	0.07	—	1,085	1,085	0.10	< 0.005	—	1,088
High Turnover (Sit Down Restaurant)	0.06	0.03	0.51	0.43	< 0.005	0.04	—	0.04	0.04	—	0.04	—	608	608	0.05	< 0.005	—	610
Total	0.16	0.08	1.44	1.20	0.01	0.11	—	0.11	0.11	—	0.11	—	1,722	1,722	0.15	< 0.005	—	1,727
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Apartments Mid Rise	< 0.005	< 0.005	0.02	0.01	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	28.8	28.8	< 0.005	< 0.005	—	28.9
Parking Lot	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	0.00	0.00	0.00	—	0.00
Enclosed Parking with Elevator	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	0.00	0.00	0.00	—	0.00
Other Non-Asphalt Surfaces	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	0.00	0.00	0.00	—	0.00
Hotel	0.10	0.05	0.91	0.76	0.01	0.07	—	0.07	0.07	—	0.07	—	1,085	1,085	0.10	< 0.005	—	1,088

High Turnover (Sit Down Restaurant)	0.06	0.03	0.51	0.43	< 0.005	0.04	—	0.04	0.04	—	0.04	—	608	608	0.05	< 0.005	—	610
Total	0.16	0.08	1.44	1.20	0.01	0.11	—	0.11	0.11	—	0.11	—	1,722	1,722	0.15	< 0.005	—	1,727
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Apartments Mid Rise	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	4.77	4.77	< 0.005	< 0.005	—	4.78
Parking Lot	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	0.00	0.00	0.00	—	0.00
Enclosed Parking with Elevator	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	0.00	0.00	0.00	—	0.00
Other Non-Asphalt Surfaces	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	0.00	0.00	0.00	—	0.00
Hotel	0.02	0.01	0.17	0.14	< 0.005	0.01	—	0.01	0.01	—	0.01	—	180	180	0.02	< 0.005	—	180
High Turnover (Sit Down Restaurant)	0.01	0.01	0.09	0.08	< 0.005	0.01	—	0.01	0.01	—	0.01	—	101	101	0.01	< 0.005	—	101
Total	0.03	0.01	0.26	0.22	< 0.005	0.02	—	0.02	0.02	—	0.02	—	285	285	0.03	< 0.005	—	286

4.3. Area Emissions by Source

4.3.2. Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Source	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Hearths	0.09	0.05	0.79	0.33	0.01	0.06	—	0.06	0.06	—	0.06	0.00	999	999	0.02	< 0.005	—	1,000
Consumer Products	—	1.68	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Architectural Coatings	—	0.24	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Total	0.09	1.97	0.79	0.33	0.01	0.06	—	0.06	0.06	—	0.06	0.00	999	999	0.02	< 0.005	—	1,000
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Hearths	0.09	0.05	0.79	0.33	0.01	0.06	—	0.06	0.06	—	0.06	0.00	999	999	0.02	< 0.005	—	1,000
Consumer Products	—	1.68	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Architectural Coatings	—	0.24	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Total	0.09	1.97	0.79	0.33	0.01	0.06	—	0.06	0.06	—	0.06	0.00	999	999	0.02	< 0.005	—	1,000
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Hearths	0.02	0.01	0.13	0.06	< 0.005	0.01	—	0.01	0.01	—	0.01	0.00	149	149	< 0.005	< 0.005	—	149
Consumer Products	—	0.31	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Architectural Coatings	—	0.04	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Total	0.02	0.36	0.13	0.06	< 0.005	0.01	—	0.01	0.01	—	0.01	0.00	149	149	< 0.005	< 0.005	—	149

4.4. Water Emissions by Land Use

4.4.2. Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Land Use	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Apartments Mid Rise	—	—	—	—	—	—	—	—	—	—	—	0.49	0.64	1.14	0.05	< 0.005	—	2.77
Parking Lot	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Enclosed Parking with Elevator	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Other Non-Asphalt Surfaces	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Hotel	—	—	—	—	—	—	—	—	—	—	—	3.01	3.95	6.96	0.31	0.01	—	16.9
High Turnover (Sit Down Restaurant)	—	—	—	—	—	—	—	—	—	—	—	4.07	5.29	9.36	0.42	0.01	—	22.8
Total	—	—	—	—	—	—	—	—	—	—	—	7.58	9.88	17.5	0.78	0.02	—	42.5
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Apartments Mid Rise	—	—	—	—	—	—	—	—	—	—	—	0.49	0.64	1.14	0.05	< 0.005	—	2.77
Parking Lot	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Enclosed Parking with Elevator	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00

Other Non-Asphalt Surfaces	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Hotel	—	—	—	—	—	—	—	—	—	—	—	3.01	3.95	6.96	0.31	0.01	—	16.9
High Turnover (Sit Down Restaurant)	—	—	—	—	—	—	—	—	—	—	—	4.07	5.29	9.36	0.42	0.01	—	22.8
Total	—	—	—	—	—	—	—	—	—	—	—	7.58	9.88	17.5	0.78	0.02	—	42.5
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Apartments Mid Rise	—	—	—	—	—	—	—	—	—	—	—	0.08	0.11	0.19	0.01	< 0.005	—	0.46
Parking Lot	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Enclosed Parking with Elevator	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Other Non-Asphalt Surfaces	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Hotel	—	—	—	—	—	—	—	—	—	—	—	0.50	0.65	1.15	0.05	< 0.005	—	2.80
High Turnover (Sit Down Restaurant)	—	—	—	—	—	—	—	—	—	—	—	0.67	0.88	1.55	0.07	< 0.005	—	3.78
Total	—	—	—	—	—	—	—	—	—	—	—	1.25	1.64	2.89	0.13	< 0.005	—	7.03

4.5. Waste Emissions by Land Use

4.5.2. Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Land Use	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Apartments Mid Rise	—	—	—	—	—	—	—	—	—	—	—	3.11	0.00	3.11	0.31	0.00	—	10.9
Parking Lot	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Enclosed Parking with Elevator	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Other Non-Asphalt Surfaces	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Hotel	—	—	—	—	—	—	—	—	—	—	—	18.3	0.00	18.3	1.83	0.00	—	64.0
High Turnover (Sit Down Restaurant)	—	—	—	—	—	—	—	—	—	—	—	44.9	0.00	44.9	4.49	0.00	—	157
Total	—	—	—	—	—	—	—	—	—	—	—	66.3	0.00	66.3	6.63	0.00	—	232
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Apartments Mid Rise	—	—	—	—	—	—	—	—	—	—	—	3.11	0.00	3.11	0.31	0.00	—	10.9
Parking Lot	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Enclosed Parking with Elevator	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00

Other Non-Asphalt Surfaces	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Hotel	—	—	—	—	—	—	—	—	—	—	—	18.3	0.00	18.3	1.83	0.00	—	64.0
High Turnover (Sit Down Restaurant)	—	—	—	—	—	—	—	—	—	—	—	44.9	0.00	44.9	4.49	0.00	—	157
Total	—	—	—	—	—	—	—	—	—	—	—	66.3	0.00	66.3	6.63	0.00	—	232
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Apartments Mid Rise	—	—	—	—	—	—	—	—	—	—	—	0.52	0.00	0.52	0.05	0.00	—	1.80
Parking Lot	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Enclosed Parking with Elevator	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Other Non-Asphalt Surfaces	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Hotel	—	—	—	—	—	—	—	—	—	—	—	3.03	0.00	3.03	0.30	0.00	—	10.6
High Turnover (Sit Down Restaurant)	—	—	—	—	—	—	—	—	—	—	—	7.43	0.00	7.43	0.74	0.00	—	26.0
Total	—	—	—	—	—	—	—	—	—	—	—	11.0	0.00	11.0	1.10	0.00	—	38.4

4.6. Refrigerant Emissions by Land Use

4.6.1. Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Land Use	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Apartments Mid Rise	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	0.09	0.09
Hotel	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	91.4	91.4
High Turnover (Sit Down Restaurant)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	11.2	11.2
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	103	103
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Apartments Mid Rise	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	0.09	0.09
Hotel	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	91.4	91.4
High Turnover (Sit Down Restaurant)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	11.2	11.2
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	103	103
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Apartments Mid Rise	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	0.02	0.02
Hotel	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	15.1	15.1
High Turnover (Sit Down Restaurant)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	1.85	1.85

Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	17.0	17.0
-------	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	------	------

4.7. Offroad Emissions By Equipment Type

4.7.1. Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Equipment Type	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e	
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

4.8. Stationary Emissions By Equipment Type

4.8.1. Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Equipment Type	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e	
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Emergency Generator	0.85	0.77	2.16	1.97	< 0.005	0.11	—	0.11	0.11	—	0.11	—	395	395	0.02	< 0.005	—	396
Total	0.85	0.77	2.16	1.97	< 0.005	0.11	—	0.11	0.11	—	0.11	—	395	395	0.02	< 0.005	—	396
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Emergency Generator	0.85	0.77	2.16	1.97	< 0.005	0.11	—	0.11	0.11	—	0.11	—	395	395	0.02	< 0.005	—	396
Total	0.85	0.77	2.16	1.97	< 0.005	0.11	—	0.11	0.11	—	0.11	—	395	395	0.02	< 0.005	—	396
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Emergency Generator	0.02	0.02	0.05	0.05	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	8.95	8.95	< 0.005	< 0.005	—	8.98
Total	0.02	0.02	0.05	0.05	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	8.95	8.95	< 0.005	< 0.005	—	8.98

4.9. User Defined Emissions By Equipment Type

4.9.1. Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Equipment Type	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

4.10. Soil Carbon Accumulation By Vegetation Type

4.10.1. Soil Carbon Accumulation By Vegetation Type - Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Vegetation	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

4.10.2. Above and Belowground Carbon Accumulation by Land Use Type - Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Land Use	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

4.10.3. Avoided and Sequestered Emissions by Species - Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Species	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Avoided	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Sequestered	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Removed	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Avoided	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Sequestered	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Remove d	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Avoided	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Sequest ered	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Remove d	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

5. Activity Data

5.1. Construction Schedule

Phase Name	Phase Type	Start Date	End Date	Days Per Week	Work Days per Phase	Phase Description
Demolition	Demolition	1/2/2024	2/2/2024	5.00	24.0	—
Site Preparation	Site Preparation	2/3/2024	2/16/2024	5.00	10.0	—
Rough Grading	Grading	2/3/2024	3/29/2024	5.00	40.0	—
Fine Grading	Grading	4/23/2025	4/29/2025	5.00	5.00	—
Building Construction	Building Construction	3/4/2024	7/8/2025	5.00	352	—
Paving	Paving	5/5/2025	5/13/2025	5.00	7.00	—
Architectural Coating	Architectural Coating	3/27/2025	7/8/2025	5.00	74.0	—
Trenching	Trenching	6/17/2024	7/12/2024	5.00	20.0	—

5.2. Off-Road Equipment

5.2.1. Unmitigated

Phase Name	Equipment Type	Fuel Type	Engine Tier	Number per Day	Hours Per Day	Horsepower	Load Factor
Demolition	Tractors/Loaders/Backhoes	Diesel	Average	3.00	8.00	84.0	0.37
Demolition	Rubber Tired Dozers	Diesel	Average	1.00	8.00	367	0.40
Demolition	Concrete/Industrial Saws	Diesel	Average	1.00	8.00	33.0	0.73
Site Preparation	Graders	Diesel	Average	1.00	8.00	148	0.41
Site Preparation	Rubber Tired Dozers	Diesel	Average	1.00	7.00	367	0.40
Site Preparation	Tractors/Loaders/Backhoes	Diesel	Average	1.00	8.00	84.0	0.37
Rough Grading	Graders	Diesel	Average	1.00	8.00	148	0.41
Rough Grading	Tractors/Loaders/Backhoes	Diesel	Average	2.00	7.00	84.0	0.37
Rough Grading	Rubber Tired Dozers	Diesel	Average	1.00	8.00	367	0.40
Building Construction	Cranes	Diesel	Average	1.00	6.00	367	0.29
Building Construction	Forklifts	Diesel	Average	1.00	6.00	82.0	0.20
Building Construction	Generator Sets	Diesel	Average	1.00	8.00	14.0	0.74
Building Construction	Tractors/Loaders/Backhoes	Diesel	Average	1.00	6.00	84.0	0.37
Building Construction	Welders	Diesel	Average	3.00	8.00	46.0	0.45
Paving	Tractors/Loaders/Backhoes	Diesel	Average	1.00	8.00	84.0	0.37
Paving	Pavers	Diesel	Average	1.00	6.00	81.0	0.42
Paving	Paving Equipment	Diesel	Average	1.00	8.00	89.0	0.36
Paving	Rollers	Diesel	Average	1.00	7.00	36.0	0.38
Paving	Cement and Mortar Mixers	Diesel	Average	1.00	6.00	10.0	0.56

Architectural Coating	Air Compressors	Diesel	Average	1.00	6.00	37.0	0.48
Fine Grading	Graders	Diesel	Average	1.00	8.00	148	0.41
Fine Grading	Tractors/Loaders/Backhoes	Diesel	Average	2.00	7.00	84.0	0.37
Fine Grading	Rubber Tired Dozers	Diesel	Average	1.00	8.00	367	0.40
Trenching	Excavators	Diesel	Average	1.00	8.00	36.0	0.38

5.3. Construction Vehicles

5.3.1. Unmitigated

Phase Name	Trip Type	One-Way Trips per Day	Miles per Trip	Vehicle Mix
Demolition	—	—	—	—
Demolition	Worker	12.5	11.7	LDA,LDT1,LDT2
Demolition	Vendor	—	8.40	HHDT,MHDT
Demolition	Hauling	3.83	11.6	HHDT
Demolition	Onsite truck	0.00	0.00	HHDT
Site Preparation	—	—	—	—
Site Preparation	Worker	7.50	11.7	LDA,LDT1,LDT2
Site Preparation	Vendor	—	8.40	HHDT,MHDT
Site Preparation	Hauling	276	5.00	HHDT
Site Preparation	Onsite truck	0.00	0.00	HHDT
Rough Grading	—	—	—	—
Rough Grading	Worker	10.0	9.70	LDA,LDT1,LDT2
Rough Grading	Vendor	—	8.40	HHDT,MHDT
Rough Grading	Hauling	0.00	20.0	HHDT
Rough Grading	Onsite truck	0.00	0.00	HHDT
Building Construction	—	—	—	—
Building Construction	Worker	55.2	11.7	LDA,LDT1,LDT2

Building Construction	Vendor	20.1	8.40	HHDT,MHDT
Building Construction	Hauling	0.00	20.0	HHDT
Building Construction	Onsite truck	—	—	HHDT
Paving	—	—	—	—
Paving	Worker	12.5	11.7	LDA,LDT1,LDT2
Paving	Vendor	2.00	8.40	HHDT,MHDT
Paving	Hauling	0.00	20.0	HHDT
Paving	Onsite truck	—	—	HHDT
Architectural Coating	—	—	—	—
Architectural Coating	Worker	11.0	11.7	LDA,LDT1,LDT2
Architectural Coating	Vendor	—	8.40	HHDT,MHDT
Architectural Coating	Hauling	0.00	20.0	HHDT
Architectural Coating	Onsite truck	—	—	HHDT
Fine Grading	—	—	—	—
Fine Grading	Worker	10.0	11.7	LDA,LDT1,LDT2
Fine Grading	Vendor	0.00	8.40	HHDT,MHDT
Fine Grading	Hauling	3.80	5.00	HHDT
Fine Grading	Onsite truck	0.00	0.00	HHDT
Trenching	—	—	—	—
Trenching	Worker	2.50	11.7	LDA,LDT1,LDT2
Trenching	Vendor	—	8.40	HHDT,MHDT
Trenching	Hauling	0.00	20.0	HHDT
Trenching	Onsite truck	—	—	HHDT

5.4. Vehicles

5.4.1. Construction Vehicle Control Strategies

Non-applicable. No control strategies activated by user.

5.5. Architectural Coatings

Phase Name	Residential Interior Area Coated (sq ft)	Residential Exterior Area Coated (sq ft)	Non-Residential Interior Area Coated (sq ft)	Non-Residential Exterior Area Coated (sq ft)	Parking Area Coated (sq ft)
Architectural Coating	26,250	8,750	98,429	32,805	1,856

5.6. Dust Mitigation

5.6.1. Construction Earthmoving Activities

Phase Name	Material Imported (Cubic Yards)	Material Exported (Cubic Yards)	Acres Graded (acres)	Material Demolished (Ton of Debris)	Acres Paved (acres)
Demolition	0.00	0.00	0.00	367	—
Site Preparation	0.00	22,057	9.38	0.00	—
Rough Grading	0.00	0.00	40.0	0.00	—
Fine Grading	0.00	148	5.00	0.00	—
Paving	0.00	0.00	0.00	0.00	0.71

5.6.2. Construction Earthmoving Control Strategies

Control Strategies Applied	Frequency (per day)	PM10 Reduction	PM2.5 Reduction
Water Exposed Area	2	61%	61%
Water Demolished Area	2	36%	36%

5.7. Construction Paving

Land Use	Area Paved (acres)	% Asphalt
Apartments Mid Rise	—	0%
Parking Lot	0.27	100%
Enclosed Parking with Elevator	0.01	100%

Other Non-Asphalt Surfaces	0.43	0%
Hotel	0.00	0%
High Turnover (Sit Down Restaurant)	0.00	0%

5.8. Construction Electricity Consumption and Emissions Factors

kWh per Year and Emission Factor (lb/MWh)

Year	kWh per Year	CO2	CH4	N2O
2024	0.00	204	0.03	< 0.005
2025	0.00	204	0.03	< 0.005
2025	0.00	204	0.03	< 0.005
2025	0.00	204	0.03	< 0.005

5.9. Operational Mobile Sources

5.9.1. Unmitigated

Land Use Type	Trips/Weekday	Trips/Saturday	Trips/Sunday	Trips/Year	VMT/Weekday	VMT/Saturday	VMT/Sunday	VMT/Year
Total all Land Uses	512	517	394	180,967	9,023	10,181	7,610	3,279,961

5.10. Operational Area Sources

5.10.1. Hearths

5.10.1.1. Unmitigated

Hearth Type	Unmitigated (number)
Apartments Mid Rise	—
Wood Fireplaces	0
Gas Fireplaces	4

Propane Fireplaces	0
Electric Fireplaces	0
No Fireplaces	4
Conventional Wood Stoves	0
Catalytic Wood Stoves	0
Non-Catalytic Wood Stoves	0
Pellet Wood Stoves	0
Hotel	—
Wood Fireplaces	0
Gas Fireplaces	64
Propane Fireplaces	0
Electric Fireplaces	0
No Fireplaces	0

5.10.2. Architectural Coatings

Residential Interior Area Coated (sq ft)	Residential Exterior Area Coated (sq ft)	Non-Residential Interior Area Coated (sq ft)	Non-Residential Exterior Area Coated (sq ft)	Parking Area Coated (sq ft)
26250.074999999997	8,750	98,429	32,805	1,856

5.10.3. Landscape Equipment

Season	Unit	Value
Snow Days	day/yr	0.00
Summer Days	day/yr	180

5.11. Operational Energy Consumption

5.11.1. Unmitigated

Electricity (kWh/yr) and CO2 and CH4 and N2O and Natural Gas (kBTU/yr)

Land Use	Electricity (kWh/yr)	CO2	CH4	N2O	Natural Gas (kBTU/yr)
Apartments Mid Rise	25,542	204	0.0330	0.0040	89,849
Parking Lot	10,303	204	0.0330	0.0040	0.00
Enclosed Parking with Elevator	192,360	204	0.0330	0.0040	0.00
Other Non-Asphalt Surfaces	0.00	204	0.0330	0.0040	0.00
Hotel	374,860	204	0.0330	0.0040	1,692,801
High Turnover (Sit Down Restaurant)	314,829	204	0.0330	0.0040	949,168

5.12. Operational Water and Wastewater Consumption

5.12.1. Unmitigated

Land Use	Indoor Water (gal/year)	Outdoor Water (gal/year)
Apartments Mid Rise	257,894	0.00
Parking Lot	0.00	0.00
Enclosed Parking with Elevator	0.00	0.00
Other Non-Asphalt Surfaces	0.00	0.00
Hotel	1,572,740	19,260
High Turnover (Sit Down Restaurant)	2,124,736	0.00

5.13. Operational Waste Generation

5.13.1. Unmitigated

Land Use	Waste (ton/year)	Cogeneration (kWh/year)
Apartments Mid Rise	5.78	0.00
Parking Lot	0.00	0.00
Enclosed Parking with Elevator	0.00	0.00

Other Non-Asphalt Surfaces	0.00	0.00
Hotel	33.95	0.00
High Turnover (Sit Down Restaurant)	83.30	0.00

5.14. Operational Refrigeration and Air Conditioning Equipment

5.14.1. Unmitigated

Land Use Type	Equipment Type	Refrigerant	GWP	Quantity (kg)	Operations Leak Rate	Service Leak Rate	Times Serviced
Apartments Mid Rise	Average room A/C & Other residential A/C and heat pumps	R-410A	2,088	< 0.005	2.50	2.50	10.0
Apartments Mid Rise	Household refrigerators and/or freezers	R-134a	1,430	0.12	0.60	0.00	1.00
Hotel	Household refrigerators and/or freezers	R-134a	1,430	0.00	0.60	0.00	1.00
Hotel	Other commercial A/C and heat pumps	R-410A	2,088	1.80	4.00	4.00	18.0
Hotel	Walk-in refrigerators and freezers	R-404A	3,922	< 0.005	7.50	7.50	20.0
High Turnover (Sit Down Restaurant)	Household refrigerators and/or freezers	R-134a	1,430	0.00	0.60	0.00	1.00
High Turnover (Sit Down Restaurant)	Other commercial A/C and heat pumps	R-410A	2,088	1.80	4.00	4.00	18.0
High Turnover (Sit Down Restaurant)	Walk-in refrigerators and freezers	R-404A	3,922	< 0.005	7.50	7.50	20.0

5.15. Operational Off-Road Equipment

5.15.1. Unmitigated

Equipment Type	Fuel Type	Engine Tier	Number per Day	Hours Per Day	Horsepower	Load Factor
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5.16. Stationary Sources

5.16.1. Emergency Generators and Fire Pumps

Equipment Type	Fuel Type	Number per Day	Hours per Day	Hours per Year	Horsepower	Load Factor
Emergency Generator	Diesel	1.00	1.00	50.0	470	0.73

5.16.2. Process Boilers

Equipment Type	Fuel Type	Number	Boiler Rating (MMBtu/hr)	Daily Heat Input (MMBtu/day)	Annual Heat Input (MMBtu/yr)
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5.17. User Defined

Equipment Type	Fuel Type
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5.18. Vegetation

5.18.1. Land Use Change

5.18.1.1. Unmitigated

Vegetation Land Use Type	Vegetation Soil Type	Initial Acres	Final Acres
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5.18.1. Biomass Cover Type

5.18.1.1. Unmitigated

Biomass Cover Type	Initial Acres	Final Acres
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5.18.2. Sequestration

5.18.2.1. Unmitigated

Tree Type	Number	Electricity Saved (kWh/year)	Natural Gas Saved (btu/year)
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6. Climate Risk Detailed Report

6.1. Climate Risk Summary

Cal-Adapt midcentury 2040–2059 average projections for four hazards are reported below for your project location. These are under Representation Concentration Pathway (RCP) 8.5 which assumes GHG emissions will continue to rise strongly through 2050 and then plateau around 2100.

Climate Hazard	Result for Project Location	Unit
Temperature and Extreme Heat	11.3	annual days of extreme heat
Extreme Precipitation	9.95	annual days with precipitation above 20 mm
Sea Level Rise	0.00	meters of inundation depth
Wildfire	9.64	annual hectares burned

Temperature and Extreme Heat data are for grid cell in which your project are located. The projection is based on the 98th historical percentile of daily maximum/minimum temperatures from observed historical data (32 climate model ensemble from Cal-Adapt, 2040–2059 average under RCP 8.5). Each grid cell is 6 kilometers (km) by 6 km, or 3.7 miles (mi) by 3.7 mi.

Extreme Precipitation data are for the grid cell in which your project are located. The threshold of 20 mm is equivalent to about ¾ an inch of rain, which would be light to moderate rainfall if received over a full day or heavy rain if received over a period of 2 to 4 hours. Each grid cell is 6 kilometers (km) by 6 km, or 3.7 miles (mi) by 3.7 mi.

Sea Level Rise data are for the grid cell in which your project are located. The projections are from Radke et al. (2017), as reported in Cal-Adapt (2040–2059 average under RCP 8.5), and consider different increments of sea level rise coupled with extreme storm events. Users may select from four model simulations to view the range in potential inundation depth for the grid cell. The four simulations make different assumptions about expected rainfall and temperature are: Warmer/drier (HadGEM2-ES), Cooler/wetter (CNRM-CM5), Average conditions (CanESM2), Range of different rainfall and temperature possibilities (MIROC5). Each grid cell is 50 meters (m) by 50 m, or about 164 feet (ft) by 164 ft.

Wildfire data are for the grid cell in which your project are located. The projections are from UC Davis, as reported in Cal-Adapt (2040–2059 average under RCP 8.5), and consider historical data of climate, vegetation, population density, and large (> 400 ha) fire history. Users may select from four model simulations to view the range in potential wildfire probabilities for the grid cell. The four simulations make different assumptions about expected rainfall and temperature are: Warmer/drier (HadGEM2-ES), Cooler/wetter (CNRM-CM5), Average conditions (CanESM2), Range of different rainfall and temperature possibilities (MIROC5). Each grid cell is 6 kilometers (km) by 6 km, or 3.7 miles (mi) by 3.7 mi.

6.2. Initial Climate Risk Scores

Climate Hazard	Exposure Score	Sensitivity Score	Adaptive Capacity Score	Vulnerability Score
Temperature and Extreme Heat	N/A	N/A	N/A	N/A
Extreme Precipitation	N/A	N/A	N/A	N/A
Sea Level Rise	N/A	N/A	N/A	N/A

Wildfire	N/A	N/A	N/A	N/A
Flooding	N/A	N/A	N/A	N/A
Drought	N/A	N/A	N/A	N/A
Snowpack Reduction	N/A	N/A	N/A	N/A
Air Quality Degradation	N/A	N/A	N/A	N/A

The sensitivity score reflects the extent to which a project would be adversely affected by exposure to a climate hazard. Exposure is rated on a scale of 1 to 5, with a score of 5 representing the greatest exposure.

The adaptive capacity of a project refers to its ability to manage and reduce vulnerabilities from projected climate hazards. Adaptive capacity is rated on a scale of 1 to 5, with a score of 5 representing the greatest ability to adapt.

The overall vulnerability scores are calculated based on the potential impacts and adaptive capacity assessments for each hazard. Scores do not include implementation of climate risk reduction measures.

6.3. Adjusted Climate Risk Scores

Climate Hazard	Exposure Score	Sensitivity Score	Adaptive Capacity Score	Vulnerability Score
Temperature and Extreme Heat	N/A	N/A	N/A	N/A
Extreme Precipitation	N/A	N/A	N/A	N/A
Sea Level Rise	N/A	N/A	N/A	N/A
Wildfire	N/A	N/A	N/A	N/A
Flooding	N/A	N/A	N/A	N/A
Drought	N/A	N/A	N/A	N/A
Snowpack Reduction	N/A	N/A	N/A	N/A
Air Quality Degradation	N/A	N/A	N/A	N/A

The sensitivity score reflects the extent to which a project would be adversely affected by exposure to a climate hazard. Exposure is rated on a scale of 1 to 5, with a score of 5 representing the greatest exposure.

The adaptive capacity of a project refers to its ability to manage and reduce vulnerabilities from projected climate hazards. Adaptive capacity is rated on a scale of 1 to 5, with a score of 5 representing the greatest ability to adapt.

The overall vulnerability scores are calculated based on the potential impacts and adaptive capacity assessments for each hazard. Scores include implementation of climate risk reduction measures.

6.4. Climate Risk Reduction Measures

7. Health and Equity Details

7.1. CalEnviroScreen 4.0 Scores

The maximum CalEnviroScreen score is 100. A high score (i.e., greater than 50) reflects a higher pollution burden compared to other census tracts in the state.

Indicator	Result for Project Census Tract
Exposure Indicators	—
AQ-Ozone	13.6
AQ-PM	15.2
AQ-DPM	30.5
Drinking Water	36.2
Lead Risk Housing	51.1
Pesticides	66.0
Toxic Releases	45.8
Traffic	10.5
Effect Indicators	—
CleanUp Sites	0.00
Groundwater	47.4
Haz Waste Facilities/Generators	37.7
Impaired Water Bodies	23.9
Solid Waste	0.00
Sensitive Population	—
Asthma	24.8
Cardio-vascular	22.6
Low Birth Weights	2.53
Socioeconomic Factor Indicators	—
Education	26.9
Housing	59.7
Linguistic	2.81
Poverty	35.9

Unemployment	33.6
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7.2. Healthy Places Index Scores

The maximum Health Places Index score is 100. A high score (i.e., greater than 50) reflects healthier community conditions compared to other census tracts in the state.

Indicator	Result for Project Census Tract
Economic	—
Above Poverty	66.072116
Employed	70.51199795
Median HI	—
Education	—
Bachelor's or higher	71.62838445
High school enrollment	100
Preschool enrollment	73.48902862
Transportation	—
Auto Access	68.11240857
Active commuting	74.01514179
Social	—
2-parent households	26.5622995
Voting	99.34556653
Neighborhood	—
Alcohol availability	11.86962659
Park access	60.70832799
Retail density	59.18131657
Supermarket access	38.79122289
Tree canopy	82.47144874
Housing	—
Homeownership	44.41165148

Housing habitability	82.49711279
Low-inc homeowner severe housing cost burden	91.94148595
Low-inc renter severe housing cost burden	71.76953676
Uncrowded housing	80.21301168
Health Outcomes	—
Insured adults	74.11779802
Arthritis	0.0
Asthma ER Admissions	83.4
High Blood Pressure	0.0
Cancer (excluding skin)	0.0
Asthma	0.0
Coronary Heart Disease	0.0
Chronic Obstructive Pulmonary Disease	0.0
Diagnosed Diabetes	0.0
Life Expectancy at Birth	61.1
Cognitively Disabled	60.3
Physically Disabled	93.4
Heart Attack ER Admissions	56.5
Mental Health Not Good	0.0
Chronic Kidney Disease	0.0
Obesity	0.0
Pedestrian Injuries	19.6
Physical Health Not Good	0.0
Stroke	0.0
Health Risk Behaviors	—
Binge Drinking	0.0
Current Smoker	0.0

No Leisure Time for Physical Activity	0.0
Climate Change Exposures	—
Wildfire Risk	0.0
SLR Inundation Area	0.0
Children	69.7
Elderly	4.4
English Speaking	95.4
Foreign-born	13.7
Outdoor Workers	62.4
Climate Change Adaptive Capacity	—
Impervious Surface Cover	71.7
Traffic Density	13.2
Traffic Access	23.0
Other Indices	—
Hardship	30.1
Other Decision Support	—
2016 Voting	99.7

7.3. Overall Health & Equity Scores

Metric	Result for Project Census Tract
CalEnviroScreen 4.0 Score for Project Location (a)	11.0
Healthy Places Index Score for Project Location (b)	77.0
Project Located in a Designated Disadvantaged Community (Senate Bill 535)	No
Project Located in a Low-Income Community (Assembly Bill 1550)	No
Project Located in a Community Air Protection Program Community (Assembly Bill 617)	No

a: The maximum CalEnviroScreen score is 100. A high score (i.e., greater than 50) reflects a higher pollution burden compared to other census tracts in the state.

b: The maximum Health Places Index score is 100. A high score (i.e., greater than 50) reflects healthier community conditions compared to other census tracts in the state.

7.4. Health & Equity Measures

No Health & Equity Measures selected.

7.5. Evaluation Scorecard

Health & Equity Evaluation Scorecard not completed.

7.6. Health & Equity Custom Measures

No Health & Equity Custom Measures created.

8. User Changes to Default Data

Screen	Justification
Land Use	Per project site plan. Parking garage is below hotel, including underground, and acreage is accounted for with hotel. Landscaped area accounted for with hotel land use. Parking lot includes hotel surface parking and residential parking lot. Residential acreage accounted for with parking as ground level below 8 residential units.
Construction: Construction Phases	Basis of design project-specific construction schedule, adjusted for construction start in 2024.
Construction: Off-Road Equipment	CalEEMod default construction equipment, except added equipment for trenching phases, which is not included in CalEEMod defaults.
Construction: Trips and VMT	Haul distances per project basis of design report.
Operations: Hearths	Accounted for hotel room fireplaces and two in the lobby (electric-powered to minimize natural gas use, per mitigation).
Operations: Energy Use	Mitigation to require no natural gas use in the residential and hotel land uses; minimized natural gas use in restaurant use is not quantified here.

Hotel project Sonoma RDEIR 2025 Mitigated Detailed Report

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8. User Changes to Default Data

1. Basic Project Information

1.1. Basic Project Information

Data Field	Value
Project Name	Hotel project Sonoma RDEIR 2025 Mitigated
Operational Year	2025
Lead Agency	—
Land Use Scale	Project/site
Analysis Level for Defaults	County
Windspeed (m/s)	3.60
Precipitation (days)	40.4
Location	153 W Napa St, Sonoma, CA 95476, USA
County	Sonoma-San Francisco
City	Sonoma
Air District	Bay Area AQMD
Air Basin	San Francisco Bay Area
TAZ	981
EDFZ	2
Electric Utility	Pacific Gas & Electric Company
Gas Utility	Pacific Gas & Electric
App Version	2022.1.1.8

1.2. Land Use Types

Land Use Subtype	Size	Unit	Lot Acreage	Building Area (sq ft)	Landscape Area (sq ft)	Special Landscape Area (sq ft)	Population	Description
Apartments Mid Rise	8.00	Dwelling Unit	0.00	12,963	0.00	—	20.0	—

Parking Lot	17.0	Space	0.27	0.00	0.00	—	—	—
Enclosed Parking with Elevator	113	Space	0.01	52,110	0.00	—	—	—
Other Non-Asphalt Surfaces	0.43	Acre	0.43	0.00	0.00	—	—	—
Hotel	62.0	Room	0.55	58,445	2,150	—	—	—
High Turnover (Sit Down Restaurant)	7.00	1000sqft	0.00	7,161	0.00	—	—	—

1.3. User-Selected Emission Reduction Measures by Emissions Sector

No measures selected

2. Emissions Summary

2.4. Operations Emissions Compared Against Thresholds

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Un/Mit.	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unmit.	4.41	5.84	7.06	38.6	0.09	0.23	2.88	3.12	0.23	0.52	0.75	73.9	10,457	10,531	7.92	0.42	138	10,993
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unmit.	4.33	5.76	7.71	35.5	0.09	0.23	2.88	3.12	0.23	0.52	0.75	73.9	10,030	10,104	7.95	0.45	104	10,541
Average Daily (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unmit.	3.28	4.82	5.08	29.6	0.07	0.12	2.55	2.67	0.12	0.46	0.58	73.9	8,753	8,827	7.89	0.39	116	9,258
Annual (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Unmit.	0.60	0.88	0.93	5.40	0.01	0.02	0.46	0.49	0.02	0.08	0.11	12.2	1,449	1,461	1.31	0.07	19.3	1,533
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2.5. Operations Emissions by Sector, Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Sector	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Mobile	3.50	3.12	4.40	36.2	0.08	0.08	2.88	2.96	0.07	0.52	0.60	—	8,607	8,607	0.31	0.38	35.8	8,764
Area	0.00	1.92	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	0.00	34.7	34.7	0.01	< 0.005	—	35.1
Energy	0.06	0.03	0.51	0.43	< 0.005	0.04	—	0.04	0.04	—	0.04	—	1,411	1,411	0.18	0.02	—	1,421
Water	—	—	—	—	—	—	—	—	—	—	—	7.58	9.88	17.5	0.78	0.02	—	42.5
Waste	—	—	—	—	—	—	—	—	—	—	—	66.3	0.00	66.3	6.63	0.00	—	232
Refrig.	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	103	103
Stationary	0.85	0.77	2.16	1.97	< 0.005	0.11	—	0.11	0.11	—	0.11	—	395	395	0.02	< 0.005	—	396
Total	4.41	5.84	7.06	38.6	0.09	0.23	2.88	3.12	0.23	0.52	0.75	73.9	10,457	10,531	7.92	0.42	138	10,993
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Mobile	3.43	3.03	5.04	33.1	0.08	0.08	2.88	2.96	0.07	0.52	0.60	—	8,180	8,180	0.34	0.41	0.93	8,312
Area	0.00	1.92	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	0.00	34.7	34.7	0.01	< 0.005	—	35.1
Energy	0.06	0.03	0.51	0.43	< 0.005	0.04	—	0.04	0.04	—	0.04	—	1,411	1,411	0.18	0.02	—	1,421
Water	—	—	—	—	—	—	—	—	—	—	—	7.58	9.88	17.5	0.78	0.02	—	42.5
Waste	—	—	—	—	—	—	—	—	—	—	—	66.3	0.00	66.3	6.63	0.00	—	232
Refrig.	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	103	103
Stationary	0.85	0.77	2.16	1.97	< 0.005	0.11	—	0.11	0.11	—	0.11	—	395	395	0.02	< 0.005	—	396
Total	4.33	5.76	7.71	35.5	0.09	0.23	2.88	3.12	0.23	0.52	0.75	73.9	10,030	10,104	7.95	0.45	104	10,541

Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Mobile	3.11	2.77	4.27	28.9	0.07	0.07	2.55	2.62	0.06	0.46	0.53	—	7,268	7,268	0.30	0.36	13.7	7,395
Area	0.00	1.92	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	0.00	10.3	10.3	< 0.005	< 0.005	—	10.4
Energy	0.06	0.03	0.51	0.43	< 0.005	0.04	—	0.04	0.04	—	0.04	—	1,411	1,411	0.18	0.02	—	1,421
Water	—	—	—	—	—	—	—	—	—	—	—	7.58	9.88	17.5	0.78	0.02	—	42.5
Waste	—	—	—	—	—	—	—	—	—	—	—	66.3	0.00	66.3	6.63	0.00	—	232
Refrig.	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	103	103
Stationary	0.12	0.11	0.30	0.27	< 0.005	0.02	—	0.02	0.02	—	0.02	—	54.1	54.1	< 0.005	< 0.005	—	54.2
Total	3.28	4.82	5.08	29.6	0.07	0.12	2.55	2.67	0.12	0.46	0.58	73.9	8,753	8,827	7.89	0.39	116	9,258
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Mobile	0.57	0.50	0.78	5.27	0.01	0.01	0.46	0.48	0.01	0.08	0.10	—	1,203	1,203	0.05	0.06	2.26	1,224
Area	0.00	0.35	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	0.00	1.71	1.71	< 0.005	< 0.005	—	1.72
Energy	0.01	0.01	0.09	0.08	< 0.005	0.01	—	0.01	0.01	—	0.01	—	234	234	0.03	< 0.005	—	235
Water	—	—	—	—	—	—	—	—	—	—	—	1.25	1.64	2.89	0.13	< 0.005	—	7.03
Waste	—	—	—	—	—	—	—	—	—	—	—	11.0	0.00	11.0	1.10	0.00	—	38.4
Refrig.	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	17.0	17.0
Stationary	0.02	0.02	0.05	0.05	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	8.95	8.95	< 0.005	< 0.005	—	8.98
Total	0.60	0.88	0.93	5.40	0.01	0.02	0.46	0.49	0.02	0.08	0.11	12.2	1,449	1,461	1.31	0.07	19.3	1,533

4. Operations Emissions Details

4.1. Mobile Emissions by Land Use

4.1.1. Unmitigated

Mobile source emissions results are presented in Sections 2.6. No further detailed breakdown of emissions is available.

4.2. Energy

4.2.1. Electricity Emissions By Land Use - Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Land Use	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Apartments Mid Rise	—	—	—	—	—	—	—	—	—	—	—	—	29.0	29.0	< 0.005	< 0.005	—	29.3
Parking Lot	—	—	—	—	—	—	—	—	—	—	—	—	5.76	5.76	< 0.005	< 0.005	—	5.81
Enclosed Parking with Elevator	—	—	—	—	—	—	—	—	—	—	—	—	108	108	0.02	< 0.005	—	109
Other Non-Asphalt Surfaces	—	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	—	0.00
Hotel	—	—	—	—	—	—	—	—	—	—	—	—	484	484	0.08	0.01	—	489
High Turnover (Sit Down Restaurant)	—	—	—	—	—	—	—	—	—	—	—	—	176	176	0.03	< 0.005	—	178
Total	—	—	—	—	—	—	—	—	—	—	—	—	803	803	0.13	0.02	—	811
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Apartments Mid Rise	—	—	—	—	—	—	—	—	—	—	—	—	29.0	29.0	< 0.005	< 0.005	—	29.3

Parking Lot	—	—	—	—	—	—	—	—	—	—	—	—	5.76	5.76	< 0.005	< 0.005	—	5.81
Enclosed Parking with Elevator	—	—	—	—	—	—	—	—	—	—	—	—	108	108	0.02	< 0.005	—	109
Other Non-Asphalt Surfaces	—	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	—	0.00
Hotel	—	—	—	—	—	—	—	—	—	—	—	—	484	484	0.08	0.01	—	489
High Turnover (Sit Down Restaurant)	—	—	—	—	—	—	—	—	—	—	—	—	176	176	0.03	< 0.005	—	178
Total	—	—	—	—	—	—	—	—	—	—	—	—	803	803	0.13	0.02	—	811
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Apartments Mid Rise	—	—	—	—	—	—	—	—	—	—	—	—	4.80	4.80	< 0.005	< 0.005	—	4.85
Parking Lot	—	—	—	—	—	—	—	—	—	—	—	—	0.95	0.95	< 0.005	< 0.005	—	0.96
Enclosed Parking with Elevator	—	—	—	—	—	—	—	—	—	—	—	—	17.8	17.8	< 0.005	< 0.005	—	18.0
Other Non-Asphalt Surfaces	—	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	—	0.00
Hotel	—	—	—	—	—	—	—	—	—	—	—	—	80.2	80.2	0.01	< 0.005	—	81.0
High Turnover (Sit Down Restaurant)	—	—	—	—	—	—	—	—	—	—	—	—	29.1	29.1	< 0.005	< 0.005	—	29.4
Total	—	—	—	—	—	—	—	—	—	—	—	—	133	133	0.02	< 0.005	—	134

4.2.3. Natural Gas Emissions By Land Use - Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Land Use	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Apartments Mid Rise	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	0.00	0.00	0.00	—	0.00
Parking Lot	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	0.00	0.00	0.00	—	0.00
Enclosed Parking with Elevator	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	0.00	0.00	0.00	—	0.00
Other Non-Asphalt Surfaces	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	0.00	0.00	0.00	—	0.00
Hotel	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	0.00	0.00	0.00	—	0.00
High Turnover (Sit Down Restaurant)	0.06	0.03	0.51	0.43	< 0.005	0.04	—	0.04	0.04	—	0.04	—	608	608	0.05	< 0.005	—	610
Total	0.06	0.03	0.51	0.43	< 0.005	0.04	—	0.04	0.04	—	0.04	—	608	608	0.05	< 0.005	—	610
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Apartments Mid Rise	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	0.00	0.00	0.00	—	0.00
Parking Lot	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	0.00	0.00	0.00	—	0.00

Enclosed Parking with Elevator	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	0.00	0.00	0.00	—	0.00
Other Non-Asphalt Surfaces	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	0.00	0.00	0.00	—	0.00
Hotel	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	0.00	0.00	0.00	—	0.00
High Turnover (Sit Down Restaurant)	0.06	0.03	0.51	0.43	< 0.005	0.04	—	0.04	0.04	—	0.04	—	608	608	0.05	< 0.005	—	610
Total	0.06	0.03	0.51	0.43	< 0.005	0.04	—	0.04	0.04	—	0.04	—	608	608	0.05	< 0.005	—	610
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Apartments Mid Rise	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	0.00	0.00	0.00	—	0.00
Parking Lot	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	0.00	0.00	0.00	—	0.00
Enclosed Parking with Elevator	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	0.00	0.00	0.00	—	0.00
Other Non-Asphalt Surfaces	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	0.00	0.00	0.00	—	0.00
Hotel	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	0.00	0.00	0.00	—	0.00
High Turnover (Sit Down Restaurant)	0.01	0.01	0.09	0.08	< 0.005	0.01	—	0.01	0.01	—	0.01	—	101	101	0.01	< 0.005	—	101
Total	0.01	0.01	0.09	0.08	< 0.005	0.01	—	0.01	0.01	—	0.01	—	101	101	0.01	< 0.005	—	101

4.3. Area Emissions by Source

4.3.2. Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Source	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Hearths	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	0.00	34.7	34.7	0.01	< 0.005	—	35.1
Consumer Products	—	1.68	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Architectural Coatings	—	0.24	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Total	0.00	1.92	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	0.00	34.7	34.7	0.01	< 0.005	—	35.1
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Hearths	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	0.00	34.7	34.7	0.01	< 0.005	—	35.1
Consumer Products	—	1.68	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Architectural Coatings	—	0.24	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Total	0.00	1.92	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	0.00	34.7	34.7	0.01	< 0.005	—	35.1
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Hearths	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	0.00	1.71	1.71	< 0.005	< 0.005	—	1.72
Consumer Products	—	0.31	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Architectural Coatings	—	0.04	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Total	0.00	0.35	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	0.00	1.71	1.71	< 0.005	< 0.005	—	1.72
-------	------	------	------	------	------	------	---	------	------	---	------	------	------	------	---------	---------	---	------

4.4. Water Emissions by Land Use

4.4.2. Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Land Use	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Apartments Mid Rise	—	—	—	—	—	—	—	—	—	—	—	0.49	0.64	1.14	0.05	< 0.005	—	2.77
Parking Lot	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Enclosed Parking with Elevator	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Other Non-Asphalt Surfaces	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Hotel	—	—	—	—	—	—	—	—	—	—	—	3.01	3.95	6.96	0.31	0.01	—	16.9
High Turnover (Sit Down Restaurant)	—	—	—	—	—	—	—	—	—	—	—	4.07	5.29	9.36	0.42	0.01	—	22.8
Total	—	—	—	—	—	—	—	—	—	—	—	7.58	9.88	17.5	0.78	0.02	—	42.5
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Apartments Mid Rise	—	—	—	—	—	—	—	—	—	—	—	0.49	0.64	1.14	0.05	< 0.005	—	2.77
Parking Lot	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Enclosed Parking with Elevator	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Other Non-Asphalt Surfaces	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Hotel	—	—	—	—	—	—	—	—	—	—	—	3.01	3.95	6.96	0.31	0.01	—	16.9
High Turnover (Sit Down Restaurart)	—	—	—	—	—	—	—	—	—	—	—	4.07	5.29	9.36	0.42	0.01	—	22.8
Total	—	—	—	—	—	—	—	—	—	—	—	7.58	9.88	17.5	0.78	0.02	—	42.5
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Apartments Mid Rise	—	—	—	—	—	—	—	—	—	—	—	0.08	0.11	0.19	0.01	< 0.005	—	0.46
Parking Lot	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Enclosed Parking with Elevator	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Other Non-Asphalt Surfaces	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Hotel	—	—	—	—	—	—	—	—	—	—	—	0.50	0.65	1.15	0.05	< 0.005	—	2.80
High Turnover (Sit Down Restaurart)	—	—	—	—	—	—	—	—	—	—	—	0.67	0.88	1.55	0.07	< 0.005	—	3.78

Total	—	—	—	—	—	—	—	—	—	—	—	1.25	1.64	2.89	0.13	< 0.005	—	7.03
-------	---	---	---	---	---	---	---	---	---	---	---	------	------	------	------	---------	---	------

4.5. Waste Emissions by Land Use

4.5.2. Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Land Use	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Apartments Mid Rise	—	—	—	—	—	—	—	—	—	—	—	3.11	0.00	3.11	0.31	0.00	—	10.9
Parking Lot	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Enclosed Parking with Elevator	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Other Non-Asphalt Surfaces	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Hotel	—	—	—	—	—	—	—	—	—	—	—	18.3	0.00	18.3	1.83	0.00	—	64.0
High Turnover (Sit Down Restaurant)	—	—	—	—	—	—	—	—	—	—	—	44.9	0.00	44.9	4.49	0.00	—	157
Total	—	—	—	—	—	—	—	—	—	—	—	66.3	0.00	66.3	6.63	0.00	—	232
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Apartments Mid Rise	—	—	—	—	—	—	—	—	—	—	—	3.11	0.00	3.11	0.31	0.00	—	10.9
Parking Lot	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Enclosed Parking with Elevator	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Other Non-Asphalt Surfaces	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Hotel	—	—	—	—	—	—	—	—	—	—	—	18.3	0.00	18.3	1.83	0.00	—	64.0
High Turnover (Sit Down Restaurart)	—	—	—	—	—	—	—	—	—	—	—	44.9	0.00	44.9	4.49	0.00	—	157
Total	—	—	—	—	—	—	—	—	—	—	—	66.3	0.00	66.3	6.63	0.00	—	232
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Apartments Mid Rise	—	—	—	—	—	—	—	—	—	—	—	0.52	0.00	0.52	0.05	0.00	—	1.80
Parking Lot	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Enclosed Parking with Elevator	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Other Non-Asphalt Surfaces	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Hotel	—	—	—	—	—	—	—	—	—	—	—	3.03	0.00	3.03	0.30	0.00	—	10.6
High Turnover (Sit Down Restaurart)	—	—	—	—	—	—	—	—	—	—	—	7.43	0.00	7.43	0.74	0.00	—	26.0

Total	—	—	—	—	—	—	—	—	—	—	—	11.0	0.00	11.0	1.10	0.00	—	38.4
-------	---	---	---	---	---	---	---	---	---	---	---	------	------	------	------	------	---	------

4.6. Refrigerant Emissions by Land Use

4.6.1. Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Land Use	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Apartments Mid Rise	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	0.09	0.09
Hotel	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	91.4	91.4
High Turnover (Sit Down Restaurant)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	11.2	11.2
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	103	103
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Apartments Mid Rise	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	0.09	0.09
Hotel	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	91.4	91.4
High Turnover (Sit Down Restaurant)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	11.2	11.2
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	103	103
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Apartment Mid Rise	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	0.02	0.02
Hotel	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	15.1	15.1
High Turnover (Sit Down Restaurant)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	1.85	1.85
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	17.0	17.0

4.7. Offroad Emissions By Equipment Type

4.7.1. Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Equipment Type	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

4.8. Stationary Emissions By Equipment Type

4.8.1. Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Equipme Type	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Emergency Generator	0.85	0.77	2.16	1.97	< 0.005	0.11	—	0.11	0.11	—	0.11	—	395	395	0.02	< 0.005	—	396
Total	0.85	0.77	2.16	1.97	< 0.005	0.11	—	0.11	0.11	—	0.11	—	395	395	0.02	< 0.005	—	396
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Emergency Generator	0.85	0.77	2.16	1.97	< 0.005	0.11	—	0.11	0.11	—	0.11	—	395	395	0.02	< 0.005	—	396
Total	0.85	0.77	2.16	1.97	< 0.005	0.11	—	0.11	0.11	—	0.11	—	395	395	0.02	< 0.005	—	396
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Emergency Generator	0.02	0.02	0.05	0.05	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	8.95	8.95	< 0.005	< 0.005	—	8.98
Total	0.02	0.02	0.05	0.05	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	8.95	8.95	< 0.005	< 0.005	—	8.98

4.9. User Defined Emissions By Equipment Type

4.9.1. Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Equipme nt Type	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
-----------------	-----	-----	-----	----	-----	-------	-------	-------	--------	--------	--------	------	-------	------	-----	-----	---	------

Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

4.10. Soil Carbon Accumulation By Vegetation Type

4.10.1. Soil Carbon Accumulation By Vegetation Type - Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Vegetation	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

4.10.2. Above and Belowground Carbon Accumulation by Land Use Type - Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Land Use	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

4.10.3. Avoided and Sequestered Emissions by Species - Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Species	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Avoided	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Sequestered	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Removed	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Avoided	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Sequestered	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Removed	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Avoided	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Sequestered	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Removed	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

5. Activity Data

5.9. Operational Mobile Sources

5.9.1. Unmitigated

Land Use Type	Trips/Weekday	Trips/Saturday	Trips/Sunday	Trips/Year	VMT/Weekday	VMT/Saturday	VMT/Sunday	VMT/Year
Total all Land Uses	512	517	394	180,967	9,023	10,181	7,610	3,279,961

5.10. Operational Area Sources

5.10.1. Hearths

5.10.1.1. Unmitigated

Hearth Type	Unmitigated (number)
Apartments Mid Rise	—
Wood Fireplaces	0
Gas Fireplaces	0
Propane Fireplaces	0
Electric Fireplaces	4
No Fireplaces	4
Conventional Wood Stoves	0
Catalytic Wood Stoves	0
Non-Catalytic Wood Stoves	0
Pellet Wood Stoves	0
Hotel	—
Wood Fireplaces	0
Gas Fireplaces	0
Propane Fireplaces	0
Electric Fireplaces	64
No Fireplaces	0

5.10.2. Architectural Coatings

Residential Interior Area Coated (sq ft)	Residential Exterior Area Coated (sq ft)	Non-Residential Interior Area Coated (sq ft)	Non-Residential Exterior Area Coated (sq ft)	Parking Area Coated (sq ft)
26250.074999999997	8,750	98,429	32,805	1,856

5.10.3. Landscape Equipment

Season	Unit	Value
Snow Days	day/yr	0.00
Summer Days	day/yr	180

5.11. Operational Energy Consumption

5.11.1. Unmitigated

Electricity (kWh/yr) and CO2 and CH4 and N2O and Natural Gas (kBTU/yr)

Land Use	Electricity (kWh/yr)	CO2	CH4	N2O	Natural Gas (kBTU/yr)
Apartments Mid Rise	51,869	204	0.0330	0.0040	0.00
Parking Lot	10,303	204	0.0330	0.0040	0.00
Enclosed Parking with Elevator	192,360	204	0.0330	0.0040	0.00
Other Non-Asphalt Surfaces	0.00	204	0.0330	0.0040	0.00
Hotel	866,926	204	0.0330	0.0040	0.00
High Turnover (Sit Down Restaurant)	314,829	204	0.0330	0.0040	949,168

5.12. Operational Water and Wastewater Consumption

5.12.1. Unmitigated

Land Use	Indoor Water (gal/year)	Outdoor Water (gal/year)
Apartments Mid Rise	257,894	0.00
Parking Lot	0.00	0.00
Enclosed Parking with Elevator	0.00	0.00
Other Non-Asphalt Surfaces	0.00	0.00
Hotel	1,572,740	19,260

High Turnover (Sit Down Restaurant)	2,124,736	0.00
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5.13. Operational Waste Generation

5.13.1. Unmitigated

Land Use	Waste (ton/year)	Cogeneration (kWh/year)
Apartments Mid Rise	5.78	0.00
Parking Lot	0.00	0.00
Enclosed Parking with Elevator	0.00	0.00
Other Non-Asphalt Surfaces	0.00	0.00
Hotel	33.95	0.00
High Turnover (Sit Down Restaurant)	83.30	0.00

5.14. Operational Refrigeration and Air Conditioning Equipment

5.14.1. Unmitigated

Land Use Type	Equipment Type	Refrigerant	GWP	Quantity (kg)	Operations Leak Rate	Service Leak Rate	Times Serviced
Apartments Mid Rise	Average room A/C & Other residential A/C and heat pumps	R-410A	2,088	< 0.005	2.50	2.50	10.0
Apartments Mid Rise	Household refrigerators and/or freezers	R-134a	1,430	0.12	0.60	0.00	1.00
Hotel	Household refrigerators and/or freezers	R-134a	1,430	0.00	0.60	0.00	1.00
Hotel	Other commercial A/C and heat pumps	R-410A	2,088	1.80	4.00	4.00	18.0
Hotel	Walk-in refrigerators and freezers	R-404A	3,922	< 0.005	7.50	7.50	20.0
High Turnover (Sit Down Restaurant)	Household refrigerators and/or freezers	R-134a	1,430	0.00	0.60	0.00	1.00

High Turnover (Sit Down Restaurant)	Other commercial A/C and heat pumps	R-410A	2,088	1.80	4.00	4.00	18.0
High Turnover (Sit Down Restaurant)	Walk-in refrigerators and freezers	R-404A	3,922	< 0.005	7.50	7.50	20.0

5.15. Operational Off-Road Equipment

5.15.1. Unmitigated

Equipment Type	Fuel Type	Engine Tier	Number per Day	Hours Per Day	Horsepower	Load Factor
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5.16. Stationary Sources

5.16.1. Emergency Generators and Fire Pumps

Equipment Type	Fuel Type	Number per Day	Hours per Day	Hours per Year	Horsepower	Load Factor
Emergency Generator	Diesel	1.00	1.00	50.0	470	0.73

5.16.2. Process Boilers

Equipment Type	Fuel Type	Number	Boiler Rating (MMBtu/hr)	Daily Heat Input (MMBtu/day)	Annual Heat Input (MMBtu/yr)
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5.17. User Defined

Equipment Type	Fuel Type
—	—

5.18. Vegetation

5.18.1. Land Use Change

5.18.1.1. Unmitigated

Vegetation Land Use Type	Vegetation Soil Type	Initial Acres	Final Acres
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5.18.1. Biomass Cover Type

5.18.1.1. Unmitigated

Biomass Cover Type	Initial Acres	Final Acres
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5.18.2. Sequestration

5.18.2.1. Unmitigated

Tree Type	Number	Electricity Saved (kWh/year)	Natural Gas Saved (btu/year)
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6. Climate Risk Detailed Report

6.1. Climate Risk Summary

Cal-Adapt midcentury 2040–2059 average projections for four hazards are reported below for your project location. These are under Representation Concentration Pathway (RCP) 8.5 which assumes GHG emissions will continue to rise strongly through 2050 and then plateau around 2100.

Climate Hazard	Result for Project Location	Unit
Temperature and Extreme Heat	11.3	annual days of extreme heat
Extreme Precipitation	9.95	annual days with precipitation above 20 mm
Sea Level Rise	0.00	meters of inundation depth
Wildfire	9.64	annual hectares burned

Temperature and Extreme Heat data are for grid cell in which your project are located. The projection is based on the 98th historical percentile of daily maximum/minimum temperatures from observed historical data (32 climate model ensemble from Cal-Adapt, 2040–2059 average under RCP 8.5). Each grid cell is 6 kilometers (km) by 6 km, or 3.7 miles (mi) by 3.7 mi.

Extreme Precipitation data are for the grid cell in which your project are located. The threshold of 20 mm is equivalent to about ¾ an inch of rain, which would be light to moderate rainfall if received over a full day or heavy rain if received over a period of 2 to 4 hours. Each grid cell is 6 kilometers (km) by 6 km, or 3.7 miles (mi) by 3.7 mi.

Sea Level Rise data are for the grid cell in which your project are located. The projections are from Radke et al. (2017), as reported in Cal-Adapt (2040–2059 average under RCP 8.5), and consider different increments of sea level rise coupled with extreme storm events. Users may select from four model simulations to view the range in potential inundation depth for the grid cell. The four simulations make different assumptions about expected rainfall and temperature are: Warmer/drier (HadGEM2-ES), Cooler/wetter (CNRM-CM5), Average conditions (CanESM2), Range of different rainfall and temperature possibilities (MIROC5). Each grid cell is 50 meters (m) by 50 m, or about 164 feet (ft) by 164 ft.

Wildfire data are for the grid cell in which your project are located. The projections are from UC Davis, as reported in Cal-Adapt (2040–2059 average under RCP 8.5), and consider historical data of climate, vegetation, population density, and large (> 400 ha) fire history. Users may select from four model simulations to view the range in potential wildfire probabilities for the grid cell. The four simulations make different assumptions about expected rainfall and temperature are: Warmer/drier (HadGEM2-ES), Cooler/wetter (CNRM-CM5), Average conditions (CanESM2), Range of different rainfall and temperature possibilities (MIROC5). Each grid cell is 6 kilometers (km) by 6 km, or 3.7 miles (mi) by 3.7 mi.

6.2. Initial Climate Risk Scores

Climate Hazard	Exposure Score	Sensitivity Score	Adaptive Capacity Score	Vulnerability Score
Temperature and Extreme Heat	N/A	N/A	N/A	N/A
Extreme Precipitation	N/A	N/A	N/A	N/A
Sea Level Rise	N/A	N/A	N/A	N/A
Wildfire	N/A	N/A	N/A	N/A
Flooding	N/A	N/A	N/A	N/A
Drought	N/A	N/A	N/A	N/A
Snowpack Reduction	N/A	N/A	N/A	N/A
Air Quality Degradation	N/A	N/A	N/A	N/A

The sensitivity score reflects the extent to which a project would be adversely affected by exposure to a climate hazard. Exposure is rated on a scale of 1 to 5, with a score of 5 representing the greatest exposure.

The adaptive capacity of a project refers to its ability to manage and reduce vulnerabilities from projected climate hazards. Adaptive capacity is rated on a scale of 1 to 5, with a score of 5 representing the greatest ability to adapt.

The overall vulnerability scores are calculated based on the potential impacts and adaptive capacity assessments for each hazard. Scores do not include implementation of climate risk reduction measures.

6.3. Adjusted Climate Risk Scores

Climate Hazard	Exposure Score	Sensitivity Score	Adaptive Capacity Score	Vulnerability Score
Temperature and Extreme Heat	N/A	N/A	N/A	N/A
Extreme Precipitation	N/A	N/A	N/A	N/A
Sea Level Rise	N/A	N/A	N/A	N/A
Wildfire	N/A	N/A	N/A	N/A
Flooding	N/A	N/A	N/A	N/A

Drought	N/A	N/A	N/A	N/A
Snowpack Reduction	N/A	N/A	N/A	N/A
Air Quality Degradation	N/A	N/A	N/A	N/A

The sensitivity score reflects the extent to which a project would be adversely affected by exposure to a climate hazard. Exposure is rated on a scale of 1 to 5, with a score of 5 representing the greatest exposure.

The adaptive capacity of a project refers to its ability to manage and reduce vulnerabilities from projected climate hazards. Adaptive capacity is rated on a scale of 1 to 5, with a score of 5 representing the greatest ability to adapt.

The overall vulnerability scores are calculated based on the potential impacts and adaptive capacity assessments for each hazard. Scores include implementation of climate risk reduction measures.

6.4. Climate Risk Reduction Measures

7. Health and Equity Details

7.1. CalEnviroScreen 4.0 Scores

The maximum CalEnviroScreen score is 100. A high score (i.e., greater than 50) reflects a higher pollution burden compared to other census tracts in the state.

Indicator	Result for Project Census Tract
Exposure Indicators	—
AQ-Ozone	13.6
AQ-PM	15.2
AQ-DPM	30.5
Drinking Water	36.2
Lead Risk Housing	51.1
Pesticides	66.0
Toxic Releases	45.8
Traffic	10.5
Effect Indicators	—
CleanUp Sites	0.00
Groundwater	47.4
Haz Waste Facilities/Generators	37.7

Impaired Water Bodies	23.9
Solid Waste	0.00
Sensitive Population	—
Asthma	24.8
Cardio-vascular	22.6
Low Birth Weights	2.53
Socioeconomic Factor Indicators	—
Education	26.9
Housing	59.7
Linguistic	2.81
Poverty	35.9
Unemployment	33.6

7.2. Healthy Places Index Scores

The maximum Health Places Index score is 100. A high score (i.e., greater than 50) reflects healthier community conditions compared to other census tracts in the state.

Indicator	Result for Project Census Tract
Economic	—
Above Poverty	66.072116
Employed	70.51199795
Median HI	—
Education	—
Bachelor's or higher	71.62838445
High school enrollment	100
Preschool enrollment	73.48902862
Transportation	—
Auto Access	68.11240857
Active commuting	74.01514179

Social	—
2-parent households	26.5622995
Voting	99.34556653
Neighborhood	—
Alcohol availability	11.86962659
Park access	60.70832799
Retail density	59.18131657
Supermarket access	38.79122289
Tree canopy	82.47144874
Housing	—
Homeownership	44.41165148
Housing habitability	82.49711279
Low-inc homeowner severe housing cost burden	91.94148595
Low-inc renter severe housing cost burden	71.76953676
Uncrowded housing	80.21301168
Health Outcomes	—
Insured adults	74.11779802
Arthritis	0.0
Asthma ER Admissions	83.4
High Blood Pressure	0.0
Cancer (excluding skin)	0.0
Asthma	0.0
Coronary Heart Disease	0.0
Chronic Obstructive Pulmonary Disease	0.0
Diagnosed Diabetes	0.0
Life Expectancy at Birth	61.1
Cognitively Disabled	60.3

Physically Disabled	93.4
Heart Attack ER Admissions	56.5
Mental Health Not Good	0.0
Chronic Kidney Disease	0.0
Obesity	0.0
Pedestrian Injuries	19.6
Physical Health Not Good	0.0
Stroke	0.0
Health Risk Behaviors	—
Binge Drinking	0.0
Current Smoker	0.0
No Leisure Time for Physical Activity	0.0
Climate Change Exposures	—
Wildfire Risk	0.0
SLR Inundation Area	0.0
Children	69.7
Elderly	4.4
English Speaking	95.4
Foreign-born	13.7
Outdoor Workers	62.4
Climate Change Adaptive Capacity	—
Impervious Surface Cover	71.7
Traffic Density	13.2
Traffic Access	23.0
Other Indices	—
Hardship	30.1
Other Decision Support	—

2016 Voting	99.7
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7.3. Overall Health & Equity Scores

Metric	Result for Project Census Tract
CalEnviroScreen 4.0 Score for Project Location (a)	11.0
Healthy Places Index Score for Project Location (b)	77.0
Project Located in a Designated Disadvantaged Community (Senate Bill 535)	No
Project Located in a Low-Income Community (Assembly Bill 1550)	No
Project Located in a Community Air Protection Program Community (Assembly Bill 617)	No

a: The maximum CalEnviroScreen score is 100. A high score (i.e., greater than 50) reflects a higher pollution burden compared to other census tracts in the state.

b: The maximum Health Places Index score is 100. A high score (i.e., greater than 50) reflects healthier community conditions compared to other census tracts in the state.

7.4. Health & Equity Measures

No Health & Equity Measures selected.

7.5. Evaluation Scorecard

Health & Equity Evaluation Scorecard not completed.

7.6. Health & Equity Custom Measures

No Health & Equity Custom Measures created.

8. User Changes to Default Data

Screen	Justification
Land Use	Per project site plan. Parking garage is below hotel, including underground, and acreage is accounted for with hotel. Landscaped area accounted for with hotel land use. Parking lot includes hotel surface parking and residential parking lot. Residential acreage accounted for with parking as ground level below 8 residential units.
Construction: Construction Phases	Basis of design project-specific construction schedule, adjusted for construction start in 2024.
Construction: Off-Road Equipment	CalEEMod default construction equipment, except added equipment for trenching phases, which is not included in CalEEMod defaults.

Construction: Trips and VMT	Haul distances per project basis of design report.
Operations: Hearths	Accounted for hotel room fireplaces and two in the lobby (electric-powered to minimize natural gas use, per mitigation).
Operations: Energy Use	Mitigation to require no natural gas use in the residential and hotel land uses; minimized natural gas use in restaurant use is not quantified here.

Hotel project Sonoma RDEIR 2030 Mitigated Detailed Report

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8. User Changes to Default Data

1. Basic Project Information

1.1. Basic Project Information

Data Field	Value
Project Name	Hotel project Sonoma RDEIR 2030 Mitigated
Operational Year	2030
Lead Agency	—
Land Use Scale	Project/site
Analysis Level for Defaults	County
Windspeed (m/s)	3.60
Precipitation (days)	40.4
Location	153 W Napa St, Sonoma, CA 95476, USA
County	Sonoma-San Francisco
City	Sonoma
Air District	Bay Area AQMD
Air Basin	San Francisco Bay Area
TAZ	981
EDFZ	2
Electric Utility	Pacific Gas & Electric Company
Gas Utility	Pacific Gas & Electric
App Version	2022.1.1.8

1.2. Land Use Types

Land Use Subtype	Size	Unit	Lot Acreage	Building Area (sq ft)	Landscape Area (sq ft)	Special Landscape Area (sq ft)	Population	Description
Apartments Mid Rise	8.00	Dwelling Unit	0.00	12,963	0.00	—	20.0	—

Parking Lot	17.0	Space	0.27	0.00	0.00	—	—	—
Enclosed Parking with Elevator	113	Space	0.01	52,110	0.00	—	—	—
Other Non-Asphalt Surfaces	0.43	Acre	0.43	0.00	0.00	—	—	—
Hotel	62.0	Room	0.55	58,445	2,150	—	—	—
High Turnover (Sit Down Restaurant)	7.00	1000sqft	0.00	7,161	0.00	—	—	—

1.3. User-Selected Emission Reduction Measures by Emissions Sector

No measures selected

2. Emissions Summary

2.4. Operations Emissions Compared Against Thresholds

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Un/Mit.	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unmit.	4.71	6.15	5.88	37.1	0.08	0.22	2.88	3.10	0.22	0.52	0.74	73.9	9,685	9,759	7.87	0.37	124	10,189
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unmit.	3.69	5.20	6.28	28.9	0.08	0.21	2.88	3.09	0.21	0.52	0.73	73.9	9,277	9,351	7.88	0.39	103	9,769
Average Daily (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unmit.	3.18	4.76	3.90	26.7	0.07	0.11	2.54	2.65	0.11	0.46	0.57	73.9	8,096	8,169	7.83	0.34	111	8,578
Annual (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Unmit.	0.58	0.87	0.71	4.88	0.01	0.02	0.46	0.48	0.02	0.08	0.10	12.2	1,340	1,353	1.30	0.06	18.4	1,420
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2.5. Operations Emissions by Sector, Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Sector	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Mobile	2.86	2.55	3.16	29.1	0.08	0.06	2.88	2.94	0.06	0.52	0.58	—	7,812	7,812	0.26	0.33	21.6	7,938
Area	0.95	2.80	0.05	5.58	< 0.005	0.01	—	0.01	0.01	—	0.01	0.00	57.0	57.0	0.01	< 0.005	—	57.4
Energy	0.06	0.03	0.51	0.43	< 0.005	0.04	—	0.04	0.04	—	0.04	—	1,411	1,411	0.18	0.02	—	1,421
Water	—	—	—	—	—	—	—	—	—	—	—	7.58	9.88	17.5	0.78	0.02	—	42.5
Waste	—	—	—	—	—	—	—	—	—	—	—	66.3	0.00	66.3	6.63	0.00	—	232
Refrig.	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	103	103
Stationary	0.85	0.77	2.16	1.97	< 0.005	0.11	—	0.11	0.11	—	0.11	—	395	395	0.02	< 0.005	—	396
Total	4.71	6.15	5.88	37.1	0.08	0.22	2.88	3.10	0.22	0.52	0.74	73.9	9,685	9,759	7.87	0.37	124	10,189
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Mobile	2.79	2.47	3.62	26.5	0.07	0.06	2.88	2.94	0.06	0.52	0.58	—	7,427	7,427	0.27	0.35	0.56	7,540
Area	0.00	1.92	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	0.00	34.7	34.7	0.01	< 0.005	—	35.1
Energy	0.06	0.03	0.51	0.43	< 0.005	0.04	—	0.04	0.04	—	0.04	—	1,411	1,411	0.18	0.02	—	1,421
Water	—	—	—	—	—	—	—	—	—	—	—	7.58	9.88	17.5	0.78	0.02	—	42.5
Waste	—	—	—	—	—	—	—	—	—	—	—	66.3	0.00	66.3	6.63	0.00	—	232
Refrig.	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	103	103
Stationary	0.85	0.77	2.16	1.97	< 0.005	0.11	—	0.11	0.11	—	0.11	—	395	395	0.02	< 0.005	—	396
Total	3.69	5.20	6.28	28.9	0.08	0.21	2.88	3.09	0.21	0.52	0.73	73.9	9,277	9,351	7.88	0.39	103	9,769

Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Mobile	2.54	2.27	3.07	23.3	0.06	0.05	2.54	2.59	0.05	0.46	0.51	—	6,599	6,599	0.24	0.31	8.24	6,705
Area	0.47	2.36	0.02	2.75	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	0.00	21.3	21.3	< 0.005	< 0.005	—	21.4
Energy	0.06	0.03	0.51	0.43	< 0.005	0.04	—	0.04	0.04	—	0.04	—	1,411	1,411	0.18	0.02	—	1,421
Water	—	—	—	—	—	—	—	—	—	—	—	7.58	9.88	17.5	0.78	0.02	—	42.5
Waste	—	—	—	—	—	—	—	—	—	—	—	66.3	0.00	66.3	6.63	0.00	—	232
Refrig.	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	103	103
Stationary	0.12	0.11	0.30	0.27	< 0.005	0.02	—	0.02	0.02	—	0.02	—	54.1	54.1	< 0.005	< 0.005	—	54.2
Total	3.18	4.76	3.90	26.7	0.07	0.11	2.54	2.65	0.11	0.46	0.57	73.9	8,096	8,169	7.83	0.34	111	8,578
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Mobile	0.46	0.41	0.56	4.25	0.01	0.01	0.46	0.47	0.01	0.08	0.09	—	1,093	1,093	0.04	0.05	1.36	1,110
Area	0.09	0.43	< 0.005	0.50	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	0.00	3.52	3.52	< 0.005	< 0.005	—	3.55
Energy	0.01	0.01	0.09	0.08	< 0.005	0.01	—	0.01	0.01	—	0.01	—	234	234	0.03	< 0.005	—	235
Water	—	—	—	—	—	—	—	—	—	—	—	1.25	1.64	2.89	0.13	< 0.005	—	7.03
Waste	—	—	—	—	—	—	—	—	—	—	—	11.0	0.00	11.0	1.10	0.00	—	38.4
Refrig.	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	17.0	17.0
Stationary	0.02	0.02	0.05	0.05	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	8.95	8.95	< 0.005	< 0.005	—	8.98
Total	0.58	0.87	0.71	4.88	0.01	0.02	0.46	0.48	0.02	0.08	0.10	12.2	1,340	1,353	1.30	0.06	18.4	1,420

4. Operations Emissions Details

4.1. Mobile Emissions by Land Use

4.1.1. Unmitigated

Mobile source emissions results are presented in Sections 2.6. No further detailed breakdown of emissions is available.

4.2. Energy

4.2.1. Electricity Emissions By Land Use - Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Land Use	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Apartments Mid Rise	—	—	—	—	—	—	—	—	—	—	—	—	29.0	29.0	< 0.005	< 0.005	—	29.3
Parking Lot	—	—	—	—	—	—	—	—	—	—	—	—	5.76	5.76	< 0.005	< 0.005	—	5.81
Enclosed Parking with Elevator	—	—	—	—	—	—	—	—	—	—	—	—	108	108	0.02	< 0.005	—	109
Other Non-Asphalt Surfaces	—	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	—	0.00
Hotel	—	—	—	—	—	—	—	—	—	—	—	—	484	484	0.08	0.01	—	489
High Turnover (Sit Down Restaurant)	—	—	—	—	—	—	—	—	—	—	—	—	176	176	0.03	< 0.005	—	178
Total	—	—	—	—	—	—	—	—	—	—	—	—	803	803	0.13	0.02	—	811
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Apartments Mid Rise	—	—	—	—	—	—	—	—	—	—	—	—	29.0	29.0	< 0.005	< 0.005	—	29.3

Parking Lot	—	—	—	—	—	—	—	—	—	—	—	—	5.76	5.76	< 0.005	< 0.005	—	5.81
Enclosed Parking with Elevator	—	—	—	—	—	—	—	—	—	—	—	—	108	108	0.02	< 0.005	—	109
Other Non-Asphalt Surfaces	—	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	—	0.00
Hotel	—	—	—	—	—	—	—	—	—	—	—	—	484	484	0.08	0.01	—	489
High Turnover (Sit Down Restaurant)	—	—	—	—	—	—	—	—	—	—	—	—	176	176	0.03	< 0.005	—	178
Total	—	—	—	—	—	—	—	—	—	—	—	—	803	803	0.13	0.02	—	811
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Apartments Mid Rise	—	—	—	—	—	—	—	—	—	—	—	—	4.80	4.80	< 0.005	< 0.005	—	4.85
Parking Lot	—	—	—	—	—	—	—	—	—	—	—	—	0.95	0.95	< 0.005	< 0.005	—	0.96
Enclosed Parking with Elevator	—	—	—	—	—	—	—	—	—	—	—	—	17.8	17.8	< 0.005	< 0.005	—	18.0
Other Non-Asphalt Surfaces	—	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	—	0.00
Hotel	—	—	—	—	—	—	—	—	—	—	—	—	80.2	80.2	0.01	< 0.005	—	81.0
High Turnover (Sit Down Restaurant)	—	—	—	—	—	—	—	—	—	—	—	—	29.1	29.1	< 0.005	< 0.005	—	29.4
Total	—	—	—	—	—	—	—	—	—	—	—	—	133	133	0.02	< 0.005	—	134

4.2.3. Natural Gas Emissions By Land Use - Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Land Use	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Apartments Mid Rise	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	0.00	0.00	0.00	—	0.00
Parking Lot	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	0.00	0.00	0.00	—	0.00
Enclosed Parking with Elevator	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	0.00	0.00	0.00	—	0.00
Other Non-Asphalt Surfaces	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	0.00	0.00	0.00	—	0.00
Hotel	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	0.00	0.00	0.00	—	0.00
High Turnover (Sit Down Restaurant)	0.06	0.03	0.51	0.43	< 0.005	0.04	—	0.04	0.04	—	0.04	—	608	608	0.05	< 0.005	—	610
Total	0.06	0.03	0.51	0.43	< 0.005	0.04	—	0.04	0.04	—	0.04	—	608	608	0.05	< 0.005	—	610
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Apartments Mid Rise	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	0.00	0.00	0.00	—	0.00
Parking Lot	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	0.00	0.00	0.00	—	0.00

Enclosed Parking with Elevator	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	0.00	0.00	0.00	—	0.00
Other Non-Asphalt Surfaces	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	0.00	0.00	0.00	—	0.00
Hotel	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	0.00	0.00	0.00	—	0.00
High Turnover (Sit Down Restaurant)	0.06	0.03	0.51	0.43	< 0.005	0.04	—	0.04	0.04	—	0.04	—	608	608	0.05	< 0.005	—	610
Total	0.06	0.03	0.51	0.43	< 0.005	0.04	—	0.04	0.04	—	0.04	—	608	608	0.05	< 0.005	—	610
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Apartments Mid Rise	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	0.00	0.00	0.00	—	0.00
Parking Lot	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	0.00	0.00	0.00	—	0.00
Enclosed Parking with Elevator	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	0.00	0.00	0.00	—	0.00
Other Non-Asphalt Surfaces	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	0.00	0.00	0.00	—	0.00
Hotel	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	0.00	0.00	0.00	—	0.00
High Turnover (Sit Down Restaurant)	0.01	0.01	0.09	0.08	< 0.005	0.01	—	0.01	0.01	—	0.01	—	101	101	0.01	< 0.005	—	101
Total	0.01	0.01	0.09	0.08	< 0.005	0.01	—	0.01	0.01	—	0.01	—	101	101	0.01	< 0.005	—	101

4.3. Area Emissions by Source

4.3.2. Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Source	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Hearths	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	0.00	34.7	34.7	0.01	< 0.005	—	35.1
Consumer Products	—	1.68	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Architectural Coatings	—	0.24	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Landscape Equipment	0.95	0.88	0.05	5.58	< 0.005	0.01	—	0.01	0.01	—	0.01	—	22.3	22.3	< 0.005	< 0.005	—	22.3
Total	0.95	2.80	0.05	5.58	< 0.005	0.01	—	0.01	0.01	—	0.01	0.00	57.0	57.0	0.01	< 0.005	—	57.4
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Hearths	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	0.00	34.7	34.7	0.01	< 0.005	—	35.1
Consumer Products	—	1.68	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Architectural Coatings	—	0.24	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Total	0.00	1.92	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	0.00	34.7	34.7	0.01	< 0.005	—	35.1
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Hearths	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	0.00	1.71	1.71	< 0.005	< 0.005	—	1.72

Consumer Products	—	0.31	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Architectural Coatings	—	0.04	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Landscape Equipment	0.09	0.08	< 0.005	0.50	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	1.82	1.82	< 0.005	< 0.005	—	1.82
Total	0.09	0.43	< 0.005	0.50	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	0.00	3.52	3.52	< 0.005	< 0.005	—	3.55

4.4. Water Emissions by Land Use

4.4.2. Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Land Use	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Apartments Mid Rise	—	—	—	—	—	—	—	—	—	—	—	0.49	0.64	1.14	0.05	< 0.005	—	2.77
Parking Lot	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Enclosed Parking with Elevator	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Other Non-Asphalt Surfaces	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Hotel	—	—	—	—	—	—	—	—	—	—	—	3.01	3.95	6.96	0.31	0.01	—	16.9

High Turnover (Sit Down Restaurant)	—	—	—	—	—	—	—	—	—	—	—	4.07	5.29	9.36	0.42	0.01	—	22.8
Total	—	—	—	—	—	—	—	—	—	—	—	7.58	9.88	17.5	0.78	0.02	—	42.5
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Apartments Mid Rise	—	—	—	—	—	—	—	—	—	—	—	0.49	0.64	1.14	0.05	< 0.005	—	2.77
Parking Lot	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Enclosed Parking with Elevator	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Other Non-Asphalt Surfaces	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Hotel	—	—	—	—	—	—	—	—	—	—	—	3.01	3.95	6.96	0.31	0.01	—	16.9
High Turnover (Sit Down Restaurant)	—	—	—	—	—	—	—	—	—	—	—	4.07	5.29	9.36	0.42	0.01	—	22.8
Total	—	—	—	—	—	—	—	—	—	—	—	7.58	9.88	17.5	0.78	0.02	—	42.5
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Apartments Mid Rise	—	—	—	—	—	—	—	—	—	—	—	0.08	0.11	0.19	0.01	< 0.005	—	0.46
Parking Lot	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Enclosed Parking with Elevator	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00

Other Non-Asphalt Surfaces	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Hotel	—	—	—	—	—	—	—	—	—	—	—	0.50	0.65	1.15	0.05	< 0.005	—	2.80
High Turnover (Sit Down Restaurant)	—	—	—	—	—	—	—	—	—	—	—	0.67	0.88	1.55	0.07	< 0.005	—	3.78
Total	—	—	—	—	—	—	—	—	—	—	—	1.25	1.64	2.89	0.13	< 0.005	—	7.03

4.5. Waste Emissions by Land Use

4.5.2. Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Land Use	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Apartments Mid Rise	—	—	—	—	—	—	—	—	—	—	—	3.11	0.00	3.11	0.31	0.00	—	10.9
Parking Lot	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Enclosed Parking with Elevator	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Other Non-Asphalt Surfaces	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Hotel	—	—	—	—	—	—	—	—	—	—	—	18.3	0.00	18.3	1.83	0.00	—	64.0

High Turnover (Sit Down Restaurant)	—	—	—	—	—	—	—	—	—	—	—	44.9	0.00	44.9	4.49	0.00	—	157
Total	—	—	—	—	—	—	—	—	—	—	—	66.3	0.00	66.3	6.63	0.00	—	232
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Apartments Mid Rise	—	—	—	—	—	—	—	—	—	—	—	3.11	0.00	3.11	0.31	0.00	—	10.9
Parking Lot	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Enclosed Parking with Elevator	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Other Non-Asphalt Surfaces	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Hotel	—	—	—	—	—	—	—	—	—	—	—	18.3	0.00	18.3	1.83	0.00	—	64.0
High Turnover (Sit Down Restaurant)	—	—	—	—	—	—	—	—	—	—	—	44.9	0.00	44.9	4.49	0.00	—	157
Total	—	—	—	—	—	—	—	—	—	—	—	66.3	0.00	66.3	6.63	0.00	—	232
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Apartments Mid Rise	—	—	—	—	—	—	—	—	—	—	—	0.52	0.00	0.52	0.05	0.00	—	1.80
Parking Lot	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Enclosed Parking with Elevator	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00

Other Non-Asphalt Surfaces	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Hotel	—	—	—	—	—	—	—	—	—	—	—	3.03	0.00	3.03	0.30	0.00	—	10.6
High Turnover (Sit Down Restaurant)	—	—	—	—	—	—	—	—	—	—	—	7.43	0.00	7.43	0.74	0.00	—	26.0
Total	—	—	—	—	—	—	—	—	—	—	—	11.0	0.00	11.0	1.10	0.00	—	38.4

4.6. Refrigerant Emissions by Land Use

4.6.1. Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Land Use	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Apartments Mid Rise	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	0.09	0.09
Hotel	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	91.4	91.4
High Turnover (Sit Down Restaurant)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	11.2	11.2
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	103	103
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Apartments Mid Rise	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	0.09	0.09

Hotel	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	91.4	91.4
High Turnover (Sit Down Restaurart)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	11.2	11.2
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	103	103
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Apartme nts Mid Rise	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	0.02	0.02
Hotel	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	15.1	15.1
High Turnover (Sit Down Restaurart)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	1.85	1.85
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	17.0	17.0

4.7. Offroad Emissions By Equipment Type

4.7.1. Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Equipme nt Type	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
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4.8. Stationary Emissions By Equipment Type

4.8.1. Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Equipment Type	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Emergency Generator	0.85	0.77	2.16	1.97	< 0.005	0.11	—	0.11	0.11	—	0.11	—	395	395	0.02	< 0.005	—	396
Total	0.85	0.77	2.16	1.97	< 0.005	0.11	—	0.11	0.11	—	0.11	—	395	395	0.02	< 0.005	—	396
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Emergency Generator	0.85	0.77	2.16	1.97	< 0.005	0.11	—	0.11	0.11	—	0.11	—	395	395	0.02	< 0.005	—	396
Total	0.85	0.77	2.16	1.97	< 0.005	0.11	—	0.11	0.11	—	0.11	—	395	395	0.02	< 0.005	—	396
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Emergency Generator	0.02	0.02	0.05	0.05	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	8.95	8.95	< 0.005	< 0.005	—	8.98
Total	0.02	0.02	0.05	0.05	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	8.95	8.95	< 0.005	< 0.005	—	8.98

4.9. User Defined Emissions By Equipment Type

4.9.1. Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Equipment Type	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

4.10. Soil Carbon Accumulation By Vegetation Type

4.10.1. Soil Carbon Accumulation By Vegetation Type - Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Vegetation	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
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4.10.2. Above and Belowground Carbon Accumulation by Land Use Type - Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Land Use	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

4.10.3. Avoided and Sequestered Emissions by Species - Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Species	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Avoided	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Sequestered	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Removed	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Avoided	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Sequestered	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Removed	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Avoided	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Sequestered	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Removed	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

5. Activity Data

5.9. Operational Mobile Sources

5.9.1. Unmitigated

Land Use Type	Trips/Weekday	Trips/Saturday	Trips/Sunday	Trips/Year	VMT/Weekday	VMT/Saturday	VMT/Sunday	VMT/Year
Total all Land Uses	512	517	394	180,967	9,023	10,181	7,610	3,279,961

5.10. Operational Area Sources

5.10.1. Hearths

5.10.1.1. Unmitigated

Hearth Type	Unmitigated (number)
Apartments Mid Rise	—
Wood Fireplaces	0
Gas Fireplaces	0
Propane Fireplaces	0
Electric Fireplaces	4
No Fireplaces	4
Conventional Wood Stoves	0
Catalytic Wood Stoves	0
Non-Catalytic Wood Stoves	0
Pellet Wood Stoves	0
Hotel	—
Wood Fireplaces	0
Gas Fireplaces	0
Propane Fireplaces	0
Electric Fireplaces	64
No Fireplaces	0

5.10.2. Architectural Coatings

Residential Interior Area Coated (sq ft)	Residential Exterior Area Coated (sq ft)	Non-Residential Interior Area Coated (sq ft)	Non-Residential Exterior Area Coated (sq ft)	Parking Area Coated (sq ft)
26250.074999999997	8,750	98,429	32,805	1,856

5.10.3. Landscape Equipment

Season	Unit	Value
Snow Days	day/yr	0.00
Summer Days	day/yr	180

5.11. Operational Energy Consumption

5.11.1. Unmitigated

Electricity (kWh/yr) and CO2 and CH4 and N2O and Natural Gas (kBTU/yr)

Land Use	Electricity (kWh/yr)	CO2	CH4	N2O	Natural Gas (kBTU/yr)
Apartments Mid Rise	51,869	204	0.0330	0.0040	0.00
Parking Lot	10,303	204	0.0330	0.0040	0.00
Enclosed Parking with Elevator	192,360	204	0.0330	0.0040	0.00
Other Non-Asphalt Surfaces	0.00	204	0.0330	0.0040	0.00
Hotel	866,926	204	0.0330	0.0040	0.00
High Turnover (Sit Down Restaurant)	314,829	204	0.0330	0.0040	949,168

5.12. Operational Water and Wastewater Consumption

5.12.1. Unmitigated

Land Use	Indoor Water (gal/year)	Outdoor Water (gal/year)
Apartments Mid Rise	257,894	0.00
Parking Lot	0.00	0.00

Enclosed Parking with Elevator	0.00	0.00
Other Non-Asphalt Surfaces	0.00	0.00
Hotel	1,572,740	19,260
High Turnover (Sit Down Restaurant)	2,124,736	0.00

5.13. Operational Waste Generation

5.13.1. Unmitigated

Land Use	Waste (ton/year)	Cogeneration (kWh/year)
Apartments Mid Rise	5.78	0.00
Parking Lot	0.00	0.00
Enclosed Parking with Elevator	0.00	0.00
Other Non-Asphalt Surfaces	0.00	0.00
Hotel	33.95	0.00
High Turnover (Sit Down Restaurant)	83.30	0.00

5.14. Operational Refrigeration and Air Conditioning Equipment

5.14.1. Unmitigated

Land Use Type	Equipment Type	Refrigerant	GWP	Quantity (kg)	Operations Leak Rate	Service Leak Rate	Times Serviced
Apartments Mid Rise	Average room A/C & Other residential A/C and heat pumps	R-410A	2,088	< 0.005	2.50	2.50	10.0
Apartments Mid Rise	Household refrigerators and/or freezers	R-134a	1,430	0.12	0.60	0.00	1.00
Hotel	Household refrigerators and/or freezers	R-134a	1,430	0.00	0.60	0.00	1.00
Hotel	Other commercial A/C and heat pumps	R-410A	2,088	1.80	4.00	4.00	18.0

Hotel	Walk-in refrigerators and freezers	R-404A	3,922	< 0.005	7.50	7.50	20.0
High Turnover (Sit Down Restaurant)	Household refrigerators and/or freezers	R-134a	1,430	0.00	0.60	0.00	1.00
High Turnover (Sit Down Restaurant)	Other commercial A/C and heat pumps	R-410A	2,088	1.80	4.00	4.00	18.0
High Turnover (Sit Down Restaurant)	Walk-in refrigerators and freezers	R-404A	3,922	< 0.005	7.50	7.50	20.0

5.15. Operational Off-Road Equipment

5.15.1. Unmitigated

Equipment Type	Fuel Type	Engine Tier	Number per Day	Hours Per Day	Horsepower	Load Factor
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5.16. Stationary Sources

5.16.1. Emergency Generators and Fire Pumps

Equipment Type	Fuel Type	Number per Day	Hours per Day	Hours per Year	Horsepower	Load Factor
Emergency Generator	Diesel	1.00	1.00	50.0	470	0.73

5.16.2. Process Boilers

Equipment Type	Fuel Type	Number	Boiler Rating (MMBtu/hr)	Daily Heat Input (MMBtu/day)	Annual Heat Input (MMBtu/yr)
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5.17. User Defined

Equipment Type	Fuel Type
—	—

5.18. Vegetation

5.18.1. Land Use Change

5.18.1.1. Unmitigated

Vegetation Land Use Type	Vegetation Soil Type	Initial Acres	Final Acres
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5.18.1. Biomass Cover Type

5.18.1.1. Unmitigated

Biomass Cover Type	Initial Acres	Final Acres
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5.18.2. Sequestration

5.18.2.1. Unmitigated

Tree Type	Number	Electricity Saved (kWh/year)	Natural Gas Saved (btu/year)
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6. Climate Risk Detailed Report

6.1. Climate Risk Summary

Cal-Adapt midcentury 2040–2059 average projections for four hazards are reported below for your project location. These are under Representation Concentration Pathway (RCP) 8.5 which assumes GHG emissions will continue to rise strongly through 2050 and then plateau around 2100.

Climate Hazard	Result for Project Location	Unit
Temperature and Extreme Heat	11.3	annual days of extreme heat
Extreme Precipitation	9.95	annual days with precipitation above 20 mm
Sea Level Rise	0.00	meters of inundation depth
Wildfire	9.64	annual hectares burned

Temperature and Extreme Heat data are for grid cell in which your project are located. The projection is based on the 98th historical percentile of daily maximum/minimum temperatures from observed historical data (32 climate model ensemble from Cal-Adapt, 2040–2059 average under RCP 8.5). Each grid cell is 6 kilometers (km) by 6 km, or 3.7 miles (mi) by 3.7 mi.

Extreme Precipitation data are for the grid cell in which your project are located. The threshold of 20 mm is equivalent to about ¾ an inch of rain, which would be light to moderate rainfall if received over a full day or heavy rain if received over a period of 2 to 4 hours. Each grid cell is 6 kilometers (km) by 6 km, or 3.7 miles (mi) by 3.7 mi.

Sea Level Rise data are for the grid cell in which your project are located. The projections are from Radke et al. (2017), as reported in Cal-Adapt (2040–2059 average under RCP 8.5), and consider different increments of sea level rise coupled with extreme storm events. Users may select from four model simulations to view the range in potential inundation depth for the grid cell. The four simulations make different assumptions about expected rainfall and temperature are: Warmer/drier (HadGEM2-ES), Cooler/wetter (CNRM-CM5), Average conditions (CanESM2), Range of different rainfall and temperature possibilities (MIROC5). Each grid cell is 50 meters (m) by 50 m, or about 164 feet (ft) by 164 ft.

Wildfire data are for the grid cell in which your project are located. The projections are from UC Davis, as reported in Cal-Adapt (2040–2059 average under RCP 8.5), and consider historical data of climate, vegetation, population density, and large (> 400 ha) fire history. Users may select from four model simulations to view the range in potential wildfire probabilities for the grid cell. The four simulations make different assumptions about expected rainfall and temperature are: Warmer/drier (HadGEM2-ES), Cooler/wetter (CNRM-CM5), Average conditions (CanESM2), Range of different rainfall and temperature possibilities (MIROC5). Each grid cell is 6 kilometers (km) by 6 km, or 3.7 miles (mi) by 3.7 mi.

6.2. Initial Climate Risk Scores

Climate Hazard	Exposure Score	Sensitivity Score	Adaptive Capacity Score	Vulnerability Score
Temperature and Extreme Heat	N/A	N/A	N/A	N/A
Extreme Precipitation	N/A	N/A	N/A	N/A
Sea Level Rise	N/A	N/A	N/A	N/A
Wildfire	N/A	N/A	N/A	N/A
Flooding	N/A	N/A	N/A	N/A
Drought	N/A	N/A	N/A	N/A
Snowpack Reduction	N/A	N/A	N/A	N/A
Air Quality Degradation	N/A	N/A	N/A	N/A

The sensitivity score reflects the extent to which a project would be adversely affected by exposure to a climate hazard. Exposure is rated on a scale of 1 to 5, with a score of 5 representing the greatest exposure.

The adaptive capacity of a project refers to its ability to manage and reduce vulnerabilities from projected climate hazards. Adaptive capacity is rated on a scale of 1 to 5, with a score of 5 representing the greatest ability to adapt.

The overall vulnerability scores are calculated based on the potential impacts and adaptive capacity assessments for each hazard. Scores do not include implementation of climate risk reduction measures.

6.3. Adjusted Climate Risk Scores

Climate Hazard	Exposure Score	Sensitivity Score	Adaptive Capacity Score	Vulnerability Score
Temperature and Extreme Heat	N/A	N/A	N/A	N/A
Extreme Precipitation	N/A	N/A	N/A	N/A

Sea Level Rise	N/A	N/A	N/A	N/A
Wildfire	N/A	N/A	N/A	N/A
Flooding	N/A	N/A	N/A	N/A
Drought	N/A	N/A	N/A	N/A
Snowpack Reduction	N/A	N/A	N/A	N/A
Air Quality Degradation	N/A	N/A	N/A	N/A

The sensitivity score reflects the extent to which a project would be adversely affected by exposure to a climate hazard. Exposure is rated on a scale of 1 to 5, with a score of 5 representing the greatest exposure.

The adaptive capacity of a project refers to its ability to manage and reduce vulnerabilities from projected climate hazards. Adaptive capacity is rated on a scale of 1 to 5, with a score of 5 representing the greatest ability to adapt.

The overall vulnerability scores are calculated based on the potential impacts and adaptive capacity assessments for each hazard. Scores include implementation of climate risk reduction measures.

6.4. Climate Risk Reduction Measures

7. Health and Equity Details

7.1. CalEnviroScreen 4.0 Scores

The maximum CalEnviroScreen score is 100. A high score (i.e., greater than 50) reflects a higher pollution burden compared to other census tracts in the state.

Indicator	Result for Project Census Tract
Exposure Indicators	—
AQ-Ozone	13.6
AQ-PM	15.2
AQ-DPM	30.5
Drinking Water	36.2
Lead Risk Housing	51.1
Pesticides	66.0
Toxic Releases	45.8
Traffic	10.5
Effect Indicators	—

CleanUp Sites	0.00
Groundwater	47.4
Haz Waste Facilities/Generators	37.7
Impaired Water Bodies	23.9
Solid Waste	0.00
Sensitive Population	—
Asthma	24.8
Cardio-vascular	22.6
Low Birth Weights	2.53
Socioeconomic Factor Indicators	—
Education	26.9
Housing	59.7
Linguistic	2.81
Poverty	35.9
Unemployment	33.6

7.2. Healthy Places Index Scores

The maximum Health Places Index score is 100. A high score (i.e., greater than 50) reflects healthier community conditions compared to other census tracts in the state.

Indicator	Result for Project Census Tract
Economic	—
Above Poverty	66.072116
Employed	70.51199795
Median HI	—
Education	—
Bachelor's or higher	71.62838445
High school enrollment	100
Preschool enrollment	73.48902862

Transportation	—
Auto Access	68.11240857
Active commuting	74.01514179
Social	—
2-parent households	26.5622995
Voting	99.34556653
Neighborhood	—
Alcohol availability	11.86962659
Park access	60.70832799
Retail density	59.18131657
Supermarket access	38.79122289
Tree canopy	82.47144874
Housing	—
Homeownership	44.41165148
Housing habitability	82.49711279
Low-inc homeowner severe housing cost burden	91.94148595
Low-inc renter severe housing cost burden	71.76953676
Uncrowded housing	80.21301168
Health Outcomes	—
Insured adults	74.11779802
Arthritis	0.0
Asthma ER Admissions	83.4
High Blood Pressure	0.0
Cancer (excluding skin)	0.0
Asthma	0.0
Coronary Heart Disease	0.0
Chronic Obstructive Pulmonary Disease	0.0

Diagnosed Diabetes	0.0
Life Expectancy at Birth	61.1
Cognitively Disabled	60.3
Physically Disabled	93.4
Heart Attack ER Admissions	56.5
Mental Health Not Good	0.0
Chronic Kidney Disease	0.0
Obesity	0.0
Pedestrian Injuries	19.6
Physical Health Not Good	0.0
Stroke	0.0
Health Risk Behaviors	—
Binge Drinking	0.0
Current Smoker	0.0
No Leisure Time for Physical Activity	0.0
Climate Change Exposures	—
Wildfire Risk	0.0
SLR Inundation Area	0.0
Children	69.7
Elderly	4.4
English Speaking	95.4
Foreign-born	13.7
Outdoor Workers	62.4
Climate Change Adaptive Capacity	—
Impervious Surface Cover	71.7
Traffic Density	13.2
Traffic Access	23.0

Other Indices	—
Hardship	30.1
Other Decision Support	—
2016 Voting	99.7

7.3. Overall Health & Equity Scores

Metric	Result for Project Census Tract
CalEnviroScreen 4.0 Score for Project Location (a)	11.0
Healthy Places Index Score for Project Location (b)	77.0
Project Located in a Designated Disadvantaged Community (Senate Bill 535)	No
Project Located in a Low-Income Community (Assembly Bill 1550)	No
Project Located in a Community Air Protection Program Community (Assembly Bill 617)	No

a: The maximum CalEnviroScreen score is 100. A high score (i.e., greater than 50) reflects a higher pollution burden compared to other census tracts in the state.

b: The maximum Health Places Index score is 100. A high score (i.e., greater than 50) reflects healthier community conditions compared to other census tracts in the state.

7.4. Health & Equity Measures

No Health & Equity Measures selected.

7.5. Evaluation Scorecard

Health & Equity Evaluation Scorecard not completed.

7.6. Health & Equity Custom Measures

No Health & Equity Custom Measures created.

8. User Changes to Default Data

Screen	Justification
Land Use	Per project site plan. Parking garage is below hotel, including underground, and acreage is accounted for with hotel. Landscaped area accounted for with hotel land use. Parking lot includes hotel surface parking and residential parking lot. Residential acreage accounted for with parking as ground level below 8 residential units.

Construction: Construction Phases	Basis of design project-specific construction schedule, adjusted for construction start in 2024.
Construction: Off-Road Equipment	CalEEMod default construction equipment, except added equipment for trenching phases, which is not included in CalEEMod defaults.
Construction: Trips and VMT	Haul distances per project basis of design report.
Operations: Hearths	Accounted for hotel room fireplaces and two in the lobby (electric-powered to minimize natural gas use, per mitigation).
Operations: Energy Use	Mitigation to require no natural gas use in the residential and hotel land uses; minimized natural gas use in restaurant use is not quantified here.

Hotel project Sonoma RDEIR 2040 Mitigated Detailed Report

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8. User Changes to Default Data

1. Basic Project Information

1.1. Basic Project Information

Data Field	Value
Project Name	Hotel project Sonoma RDEIR 2040 Mitigated
Operational Year	2040
Lead Agency	—
Land Use Scale	Project/site
Analysis Level for Defaults	County
Windspeed (m/s)	3.60
Precipitation (days)	40.4
Location	153 W Napa St, Sonoma, CA 95476, USA
County	Sonoma-San Francisco
City	Sonoma
Air District	Bay Area AQMD
Air Basin	San Francisco Bay Area
TAZ	981
EDFZ	2
Electric Utility	Pacific Gas & Electric Company
Gas Utility	Pacific Gas & Electric
App Version	2022.1.1.8

1.2. Land Use Types

Land Use Subtype	Size	Unit	Lot Acreage	Building Area (sq ft)	Landscape Area (sq ft)	Special Landscape Area (sq ft)	Population	Description
Apartments Mid Rise	8.00	Dwelling Unit	0.00	12,963	0.00	—	20.0	—

Parking Lot	17.0	Space	0.27	0.00	0.00	—	—	—
Enclosed Parking with Elevator	113	Space	0.01	52,110	0.00	—	—	—
Other Non-Asphalt Surfaces	0.43	Acre	0.43	0.00	0.00	—	—	—
Hotel	62.0	Room	0.55	58,445	2,150	—	—	—
High Turnover (Sit Down Restaurant)	7.00	1000sqft	0.00	7,161	0.00	—	—	—

1.3. User-Selected Emission Reduction Measures by Emissions Sector

No measures selected

2. Emissions Summary

2.4. Operations Emissions Compared Against Thresholds

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Un/Mit.	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unmit.	4.00	5.52	4.51	31.1	0.07	0.19	2.86	3.05	0.19	0.51	0.71	73.9	8,583	8,657	7.80	0.29	108	9,046
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unmit.	2.99	4.58	4.74	23.0	0.07	0.19	2.86	3.05	0.18	0.51	0.70	73.9	8,213	8,287	7.81	0.31	103	8,676
Average Daily (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unmit.	2.56	4.21	2.59	21.7	0.06	0.09	2.52	2.61	0.09	0.45	0.54	73.9	7,152	7,226	7.77	0.27	105	7,605
Annual (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Unmit.	0.47	0.77	0.47	3.97	0.01	0.02	0.46	0.48	0.02	0.08	0.10	12.2	1,184	1,196	1.29	0.04	17.3	1,259
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2.5. Operations Emissions by Sector, Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Sector	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Mobile	2.14	1.91	1.79	23.1	0.07	0.03	2.86	2.89	0.03	0.51	0.55	—	6,711	6,711	0.19	0.25	5.60	6,794
Area	0.95	2.80	0.05	5.58	< 0.005	0.01	—	0.01	0.01	—	0.01	0.00	57.0	57.0	0.01	< 0.005	—	58.0
Energy	0.06	0.03	0.51	0.43	< 0.005	0.04	—	0.04	0.04	—	0.04	—	1,411	1,411	0.18	0.02	—	1,421
Water	—	—	—	—	—	—	—	—	—	—	—	7.58	9.88	17.5	0.78	0.02	—	42.5
Waste	—	—	—	—	—	—	—	—	—	—	—	66.3	0.00	66.3	6.63	0.00	—	232
Refrig.	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	103	103
Stationary	0.85	0.77	2.16	1.97	< 0.005	0.11	—	0.11	0.11	—	0.11	—	395	395	0.02	< 0.005	—	396
Total	4.00	5.52	4.51	31.1	0.07	0.19	2.86	3.05	0.19	0.51	0.71	73.9	8,583	8,657	7.80	0.29	108	9,046
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Mobile	2.09	1.86	2.08	20.6	0.06	0.03	2.86	2.89	0.03	0.51	0.55	—	6,363	6,363	0.20	0.27	0.15	6,447
Area	0.00	1.92	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	0.00	34.7	34.7	0.01	< 0.005	—	35.1
Energy	0.06	0.03	0.51	0.43	< 0.005	0.04	—	0.04	0.04	—	0.04	—	1,411	1,411	0.18	0.02	—	1,421
Water	—	—	—	—	—	—	—	—	—	—	—	7.58	9.88	17.5	0.78	0.02	—	42.5
Waste	—	—	—	—	—	—	—	—	—	—	—	66.3	0.00	66.3	6.63	0.00	—	232
Refrig.	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	103	103
Stationary	0.85	0.77	2.16	1.97	< 0.005	0.11	—	0.11	0.11	—	0.11	—	395	395	0.02	< 0.005	—	396
Total	2.99	4.58	4.74	23.0	0.07	0.19	2.86	3.05	0.18	0.51	0.70	73.9	8,213	8,287	7.81	0.31	103	8,676

Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Mobile	1.92	1.71	1.76	18.3	0.06	0.03	2.52	2.55	0.03	0.45	0.48	—	5,656	5,656	0.17	0.23	2.13	5,731
Area	0.47	2.36	0.02	2.75	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	0.00	21.3	21.3	< 0.005	< 0.005	—	21.7
Energy	0.06	0.03	0.51	0.43	< 0.005	0.04	—	0.04	0.04	—	0.04	—	1,411	1,411	0.18	0.02	—	1,421
Water	—	—	—	—	—	—	—	—	—	—	—	7.58	9.88	17.5	0.78	0.02	—	42.5
Waste	—	—	—	—	—	—	—	—	—	—	—	66.3	0.00	66.3	6.63	0.00	—	232
Refrig.	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	103	103
Stationary	0.12	0.11	0.30	0.27	< 0.005	0.02	—	0.02	0.02	—	0.02	—	54.1	54.1	< 0.005	< 0.005	—	54.2
Total	2.56	4.21	2.59	21.7	0.06	0.09	2.52	2.61	0.09	0.45	0.54	73.9	7,152	7,226	7.77	0.27	105	7,605
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Mobile	0.35	0.31	0.32	3.34	0.01	0.01	0.46	0.47	0.01	0.08	0.09	—	936	936	0.03	0.04	0.35	949
Area	0.09	0.43	< 0.005	0.50	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	0.00	3.52	3.52	< 0.005	< 0.005	—	3.59
Energy	0.01	0.01	0.09	0.08	< 0.005	0.01	—	0.01	0.01	—	0.01	—	234	234	0.03	< 0.005	—	235
Water	—	—	—	—	—	—	—	—	—	—	—	1.25	1.64	2.89	0.13	< 0.005	—	7.03
Waste	—	—	—	—	—	—	—	—	—	—	—	11.0	0.00	11.0	1.10	0.00	—	38.4
Refrig.	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	17.0	17.0
Stationary	0.02	0.02	0.05	0.05	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	8.95	8.95	< 0.005	< 0.005	—	8.98
Total	0.47	0.77	0.47	3.97	0.01	0.02	0.46	0.48	0.02	0.08	0.10	12.2	1,184	1,196	1.29	0.04	17.3	1,259

4. Operations Emissions Details

4.1. Mobile Emissions by Land Use

4.1.1. Unmitigated

Mobile source emissions results are presented in Sections 2.6. No further detailed breakdown of emissions is available.

4.2. Energy

4.2.1. Electricity Emissions By Land Use - Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Land Use	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Apartments Mid Rise	—	—	—	—	—	—	—	—	—	—	—	—	29.0	29.0	< 0.005	< 0.005	—	29.3
Parking Lot	—	—	—	—	—	—	—	—	—	—	—	—	5.76	5.76	< 0.005	< 0.005	—	5.81
Enclosed Parking with Elevator	—	—	—	—	—	—	—	—	—	—	—	—	108	108	0.02	< 0.005	—	109
Other Non-Asphalt Surfaces	—	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	—	0.00
Hotel	—	—	—	—	—	—	—	—	—	—	—	—	484	484	0.08	0.01	—	489
High Turnover (Sit Down Restaurant)	—	—	—	—	—	—	—	—	—	—	—	—	176	176	0.03	< 0.005	—	178
Total	—	—	—	—	—	—	—	—	—	—	—	—	803	803	0.13	0.02	—	811
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Apartments Mid Rise	—	—	—	—	—	—	—	—	—	—	—	—	29.0	29.0	< 0.005	< 0.005	—	29.3

Parking Lot	—	—	—	—	—	—	—	—	—	—	—	—	5.76	5.76	< 0.005	< 0.005	—	5.81
Enclosed Parking with Elevator	—	—	—	—	—	—	—	—	—	—	—	—	108	108	0.02	< 0.005	—	109
Other Non-Asphalt Surfaces	—	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	—	0.00
Hotel	—	—	—	—	—	—	—	—	—	—	—	—	484	484	0.08	0.01	—	489
High Turnover (Sit Down Restaurant)	—	—	—	—	—	—	—	—	—	—	—	—	176	176	0.03	< 0.005	—	178
Total	—	—	—	—	—	—	—	—	—	—	—	—	803	803	0.13	0.02	—	811
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Apartments Mid Rise	—	—	—	—	—	—	—	—	—	—	—	—	4.80	4.80	< 0.005	< 0.005	—	4.85
Parking Lot	—	—	—	—	—	—	—	—	—	—	—	—	0.95	0.95	< 0.005	< 0.005	—	0.96
Enclosed Parking with Elevator	—	—	—	—	—	—	—	—	—	—	—	—	17.8	17.8	< 0.005	< 0.005	—	18.0
Other Non-Asphalt Surfaces	—	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	—	0.00
Hotel	—	—	—	—	—	—	—	—	—	—	—	—	80.2	80.2	0.01	< 0.005	—	81.0
High Turnover (Sit Down Restaurant)	—	—	—	—	—	—	—	—	—	—	—	—	29.1	29.1	< 0.005	< 0.005	—	29.4
Total	—	—	—	—	—	—	—	—	—	—	—	—	133	133	0.02	< 0.005	—	134

4.2.3. Natural Gas Emissions By Land Use - Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Land Use	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Apartments Mid Rise	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	0.00	0.00	0.00	—	0.00
Parking Lot	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	0.00	0.00	0.00	—	0.00
Enclosed Parking with Elevator	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	0.00	0.00	0.00	—	0.00
Other Non-Asphalt Surfaces	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	0.00	0.00	0.00	—	0.00
Hotel	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	0.00	0.00	0.00	—	0.00
High Turnover (Sit Down Restaurant)	0.06	0.03	0.51	0.43	< 0.005	0.04	—	0.04	0.04	—	0.04	—	608	608	0.05	< 0.005	—	610
Total	0.06	0.03	0.51	0.43	< 0.005	0.04	—	0.04	0.04	—	0.04	—	608	608	0.05	< 0.005	—	610
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Apartments Mid Rise	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	0.00	0.00	0.00	—	0.00
Parking Lot	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	0.00	0.00	0.00	—	0.00

Enclosed Parking with Elevator	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	0.00	0.00	0.00	—	0.00
Other Non-Asphalt Surfaces	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	0.00	0.00	0.00	—	0.00
Hotel	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	0.00	0.00	0.00	—	0.00
High Turnover (Sit Down Restaurant)	0.06	0.03	0.51	0.43	< 0.005	0.04	—	0.04	0.04	—	0.04	—	608	608	0.05	< 0.005	—	610
Total	0.06	0.03	0.51	0.43	< 0.005	0.04	—	0.04	0.04	—	0.04	—	608	608	0.05	< 0.005	—	610
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Apartments Mid Rise	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	0.00	0.00	0.00	—	0.00
Parking Lot	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	0.00	0.00	0.00	—	0.00
Enclosed Parking with Elevator	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	0.00	0.00	0.00	—	0.00
Other Non-Asphalt Surfaces	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	0.00	0.00	0.00	—	0.00
Hotel	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	0.00	0.00	0.00	—	0.00
High Turnover (Sit Down Restaurant)	0.01	0.01	0.09	0.08	< 0.005	0.01	—	0.01	0.01	—	0.01	—	101	101	0.01	< 0.005	—	101
Total	0.01	0.01	0.09	0.08	< 0.005	0.01	—	0.01	0.01	—	0.01	—	101	101	0.01	< 0.005	—	101

4.3. Area Emissions by Source

4.3.2. Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Source	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Hearths	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	0.00	34.7	34.7	0.01	< 0.005	—	35.1
Consumer Products	—	1.68	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Architectural Coatings	—	0.24	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Landscape Equipment	0.95	0.88	0.05	5.58	< 0.005	0.01	—	0.01	0.01	—	0.01	—	22.3	22.3	< 0.005	< 0.005	—	22.9
Total	0.95	2.80	0.05	5.58	< 0.005	0.01	—	0.01	0.01	—	0.01	0.00	57.0	57.0	0.01	< 0.005	—	58.0
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Hearths	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	0.00	34.7	34.7	0.01	< 0.005	—	35.1
Consumer Products	—	1.68	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Architectural Coatings	—	0.24	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Total	0.00	1.92	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	0.00	34.7	34.7	0.01	< 0.005	—	35.1
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Hearths	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	0.00	1.71	1.71	< 0.005	< 0.005	—	1.72

Consumer Products	—	0.31	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Architectural Coatings	—	0.04	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Landscape Equipment	0.09	0.08	< 0.005	0.50	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	1.82	1.82	< 0.005	< 0.005	—	1.87
Total	0.09	0.43	< 0.005	0.50	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	0.00	3.52	3.52	< 0.005	< 0.005	—	3.59

4.4. Water Emissions by Land Use

4.4.2. Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Land Use	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Apartments Mid Rise	—	—	—	—	—	—	—	—	—	—	—	0.49	0.64	1.14	0.05	< 0.005	—	2.77
Parking Lot	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Enclosed Parking with Elevator	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Other Non-Asphalt Surfaces	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Hotel	—	—	—	—	—	—	—	—	—	—	—	3.01	3.95	6.96	0.31	0.01	—	16.9

High Turnover (Sit Down Restaurant)	—	—	—	—	—	—	—	—	—	—	—	4.07	5.29	9.36	0.42	0.01	—	22.8
Total	—	—	—	—	—	—	—	—	—	—	—	7.58	9.88	17.5	0.78	0.02	—	42.5
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Apartments Mid Rise	—	—	—	—	—	—	—	—	—	—	—	0.49	0.64	1.14	0.05	< 0.005	—	2.77
Parking Lot	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Enclosed Parking with Elevator	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Other Non-Asphalt Surfaces	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Hotel	—	—	—	—	—	—	—	—	—	—	—	3.01	3.95	6.96	0.31	0.01	—	16.9
High Turnover (Sit Down Restaurant)	—	—	—	—	—	—	—	—	—	—	—	4.07	5.29	9.36	0.42	0.01	—	22.8
Total	—	—	—	—	—	—	—	—	—	—	—	7.58	9.88	17.5	0.78	0.02	—	42.5
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Apartments Mid Rise	—	—	—	—	—	—	—	—	—	—	—	0.08	0.11	0.19	0.01	< 0.005	—	0.46
Parking Lot	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Enclosed Parking with Elevator	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00

Other Non-Asphalt Surfaces	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Hotel	—	—	—	—	—	—	—	—	—	—	—	0.50	0.65	1.15	0.05	< 0.005	—	2.80
High Turnover (Sit Down Restaurant)	—	—	—	—	—	—	—	—	—	—	—	0.67	0.88	1.55	0.07	< 0.005	—	3.78
Total	—	—	—	—	—	—	—	—	—	—	—	1.25	1.64	2.89	0.13	< 0.005	—	7.03

4.5. Waste Emissions by Land Use

4.5.2. Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Land Use	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Apartments Mid Rise	—	—	—	—	—	—	—	—	—	—	—	3.11	0.00	3.11	0.31	0.00	—	10.9
Parking Lot	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Enclosed Parking with Elevator	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Other Non-Asphalt Surfaces	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Hotel	—	—	—	—	—	—	—	—	—	—	—	18.3	0.00	18.3	1.83	0.00	—	64.0

High Turnover (Sit Down Restaurant)	—	—	—	—	—	—	—	—	—	—	—	44.9	0.00	44.9	4.49	0.00	—	157
Total	—	—	—	—	—	—	—	—	—	—	—	66.3	0.00	66.3	6.63	0.00	—	232
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Apartments Mid Rise	—	—	—	—	—	—	—	—	—	—	—	3.11	0.00	3.11	0.31	0.00	—	10.9
Parking Lot	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Enclosed Parking with Elevator	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Other Non-Asphalt Surfaces	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Hotel	—	—	—	—	—	—	—	—	—	—	—	18.3	0.00	18.3	1.83	0.00	—	64.0
High Turnover (Sit Down Restaurant)	—	—	—	—	—	—	—	—	—	—	—	44.9	0.00	44.9	4.49	0.00	—	157
Total	—	—	—	—	—	—	—	—	—	—	—	66.3	0.00	66.3	6.63	0.00	—	232
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Apartments Mid Rise	—	—	—	—	—	—	—	—	—	—	—	0.52	0.00	0.52	0.05	0.00	—	1.80
Parking Lot	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Enclosed Parking with Elevator	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00

Other Non-Asphalt Surfaces	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Hotel	—	—	—	—	—	—	—	—	—	—	—	3.03	0.00	3.03	0.30	0.00	—	10.6
High Turnover (Sit Down Restaurant)	—	—	—	—	—	—	—	—	—	—	—	7.43	0.00	7.43	0.74	0.00	—	26.0
Total	—	—	—	—	—	—	—	—	—	—	—	11.0	0.00	11.0	1.10	0.00	—	38.4

4.6. Refrigerant Emissions by Land Use

4.6.1. Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Land Use	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Apartments Mid Rise	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	0.09	0.09
Hotel	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	91.4	91.4
High Turnover (Sit Down Restaurant)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	11.2	11.2
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	103	103
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Apartments Mid Rise	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	0.09	0.09

Hotel	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	91.4	91.4
High Turnover (Sit Down Restaurart)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	11.2	11.2
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	103	103
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Apartme nts Mid Rise	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	0.02	0.02
Hotel	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	15.1	15.1
High Turnover (Sit Down Restaurart)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	1.85	1.85
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	17.0	17.0

4.7. Offroad Emissions By Equipment Type

4.7.1. Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Equipme nt Type	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
-------	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---

4.8. Stationary Emissions By Equipment Type

4.8.1. Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Equipment Type	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Emergency Generator	0.85	0.77	2.16	1.97	< 0.005	0.11	—	0.11	0.11	—	0.11	—	395	395	0.02	< 0.005	—	396
Total	0.85	0.77	2.16	1.97	< 0.005	0.11	—	0.11	0.11	—	0.11	—	395	395	0.02	< 0.005	—	396
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Emergency Generator	0.85	0.77	2.16	1.97	< 0.005	0.11	—	0.11	0.11	—	0.11	—	395	395	0.02	< 0.005	—	396
Total	0.85	0.77	2.16	1.97	< 0.005	0.11	—	0.11	0.11	—	0.11	—	395	395	0.02	< 0.005	—	396
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Emergency Generator	0.02	0.02	0.05	0.05	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	8.95	8.95	< 0.005	< 0.005	—	8.98
Total	0.02	0.02	0.05	0.05	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	8.95	8.95	< 0.005	< 0.005	—	8.98

4.9. User Defined Emissions By Equipment Type

4.9.1. Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Equipment Type	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

4.10. Soil Carbon Accumulation By Vegetation Type

4.10.1. Soil Carbon Accumulation By Vegetation Type - Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Vegetation	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
-------	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---

4.10.2. Above and Belowground Carbon Accumulation by Land Use Type - Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Land Use	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

4.10.3. Avoided and Sequestered Emissions by Species - Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Species	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Avoided	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Sequestered	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Removed	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Avoided	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Sequestered	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Removed	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Avoided	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Sequestered	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Removed	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

5. Activity Data

5.9. Operational Mobile Sources

5.9.1. Unmitigated

Land Use Type	Trips/Weekday	Trips/Saturday	Trips/Sunday	Trips/Year	VMT/Weekday	VMT/Saturday	VMT/Sunday	VMT/Year
Total all Land Uses	512	517	394	180,967	9,023	10,181	7,610	3,279,961

5.10. Operational Area Sources

5.10.1. Hearths

5.10.1.1. Unmitigated

Hearth Type	Unmitigated (number)
Apartments Mid Rise	—
Wood Fireplaces	0
Gas Fireplaces	0
Propane Fireplaces	0
Electric Fireplaces	4
No Fireplaces	4
Conventional Wood Stoves	0
Catalytic Wood Stoves	0
Non-Catalytic Wood Stoves	0
Pellet Wood Stoves	0
Hotel	—
Wood Fireplaces	0
Gas Fireplaces	0
Propane Fireplaces	0
Electric Fireplaces	64
No Fireplaces	0

5.10.2. Architectural Coatings

Residential Interior Area Coated (sq ft)	Residential Exterior Area Coated (sq ft)	Non-Residential Interior Area Coated (sq ft)	Non-Residential Exterior Area Coated (sq ft)	Parking Area Coated (sq ft)
26250.074999999997	8,750	98,429	32,805	1,856

5.10.3. Landscape Equipment

Season	Unit	Value
Snow Days	day/yr	0.00
Summer Days	day/yr	180

5.11. Operational Energy Consumption

5.11.1. Unmitigated

Electricity (kWh/yr) and CO2 and CH4 and N2O and Natural Gas (kBTU/yr)

Land Use	Electricity (kWh/yr)	CO2	CH4	N2O	Natural Gas (kBTU/yr)
Apartments Mid Rise	51,869	204	0.0330	0.0040	0.00
Parking Lot	10,303	204	0.0330	0.0040	0.00
Enclosed Parking with Elevator	192,360	204	0.0330	0.0040	0.00
Other Non-Asphalt Surfaces	0.00	204	0.0330	0.0040	0.00
Hotel	866,926	204	0.0330	0.0040	0.00
High Turnover (Sit Down Restaurant)	314,829	204	0.0330	0.0040	949,168

5.12. Operational Water and Wastewater Consumption

5.12.1. Unmitigated

Land Use	Indoor Water (gal/year)	Outdoor Water (gal/year)
Apartments Mid Rise	257,894	0.00
Parking Lot	0.00	0.00

Enclosed Parking with Elevator	0.00	0.00
Other Non-Asphalt Surfaces	0.00	0.00
Hotel	1,572,740	19,260
High Turnover (Sit Down Restaurant)	2,124,736	0.00

5.13. Operational Waste Generation

5.13.1. Unmitigated

Land Use	Waste (ton/year)	Cogeneration (kWh/year)
Apartments Mid Rise	5.78	0.00
Parking Lot	0.00	0.00
Enclosed Parking with Elevator	0.00	0.00
Other Non-Asphalt Surfaces	0.00	0.00
Hotel	33.95	0.00
High Turnover (Sit Down Restaurant)	83.30	0.00

5.14. Operational Refrigeration and Air Conditioning Equipment

5.14.1. Unmitigated

Land Use Type	Equipment Type	Refrigerant	GWP	Quantity (kg)	Operations Leak Rate	Service Leak Rate	Times Serviced
Apartments Mid Rise	Average room A/C & Other residential A/C and heat pumps	R-410A	2,088	< 0.005	2.50	2.50	10.0
Apartments Mid Rise	Household refrigerators and/or freezers	R-134a	1,430	0.12	0.60	0.00	1.00
Hotel	Household refrigerators and/or freezers	R-134a	1,430	0.00	0.60	0.00	1.00
Hotel	Other commercial A/C and heat pumps	R-410A	2,088	1.80	4.00	4.00	18.0

Hotel	Walk-in refrigerators and freezers	R-404A	3,922	< 0.005	7.50	7.50	20.0
High Turnover (Sit Down Restaurant)	Household refrigerators and/or freezers	R-134a	1,430	0.00	0.60	0.00	1.00
High Turnover (Sit Down Restaurant)	Other commercial A/C and heat pumps	R-410A	2,088	1.80	4.00	4.00	18.0
High Turnover (Sit Down Restaurant)	Walk-in refrigerators and freezers	R-404A	3,922	< 0.005	7.50	7.50	20.0

5.15. Operational Off-Road Equipment

5.15.1. Unmitigated

Equipment Type	Fuel Type	Engine Tier	Number per Day	Hours Per Day	Horsepower	Load Factor
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5.16. Stationary Sources

5.16.1. Emergency Generators and Fire Pumps

Equipment Type	Fuel Type	Number per Day	Hours per Day	Hours per Year	Horsepower	Load Factor
Emergency Generator	Diesel	1.00	1.00	50.0	470	0.73

5.16.2. Process Boilers

Equipment Type	Fuel Type	Number	Boiler Rating (MMBtu/hr)	Daily Heat Input (MMBtu/day)	Annual Heat Input (MMBtu/yr)
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5.17. User Defined

Equipment Type	Fuel Type
—	—

5.18. Vegetation

5.18.1. Land Use Change

5.18.1.1. Unmitigated

Vegetation Land Use Type	Vegetation Soil Type	Initial Acres	Final Acres
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5.18.1. Biomass Cover Type

5.18.1.1. Unmitigated

Biomass Cover Type	Initial Acres	Final Acres
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5.18.2. Sequestration

5.18.2.1. Unmitigated

Tree Type	Number	Electricity Saved (kWh/year)	Natural Gas Saved (btu/year)
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6. Climate Risk Detailed Report

6.1. Climate Risk Summary

Cal-Adapt midcentury 2040–2059 average projections for four hazards are reported below for your project location. These are under Representation Concentration Pathway (RCP) 8.5 which assumes GHG emissions will continue to rise strongly through 2050 and then plateau around 2100.

Climate Hazard	Result for Project Location	Unit
Temperature and Extreme Heat	11.3	annual days of extreme heat
Extreme Precipitation	9.95	annual days with precipitation above 20 mm
Sea Level Rise	0.00	meters of inundation depth
Wildfire	9.64	annual hectares burned

Temperature and Extreme Heat data are for grid cell in which your project are located. The projection is based on the 98th historical percentile of daily maximum/minimum temperatures from observed historical data (32 climate model ensemble from Cal-Adapt, 2040–2059 average under RCP 8.5). Each grid cell is 6 kilometers (km) by 6 km, or 3.7 miles (mi) by 3.7 mi.

Extreme Precipitation data are for the grid cell in which your project are located. The threshold of 20 mm is equivalent to about ¾ an inch of rain, which would be light to moderate rainfall if received over a full day or heavy rain if received over a period of 2 to 4 hours. Each grid cell is 6 kilometers (km) by 6 km, or 3.7 miles (mi) by 3.7 mi.

Sea Level Rise data are for the grid cell in which your project are located. The projections are from Radke et al. (2017), as reported in Cal-Adapt (2040–2059 average under RCP 8.5), and consider different increments of sea level rise coupled with extreme storm events. Users may select from four model simulations to view the range in potential inundation depth for the grid cell. The four simulations make different assumptions about expected rainfall and temperature are: Warmer/drier (HadGEM2-ES), Cooler/wetter (CNRM-CM5), Average conditions (CanESM2), Range of different rainfall and temperature possibilities (MIROC5). Each grid cell is 50 meters (m) by 50 m, or about 164 feet (ft) by 164 ft.

Wildfire data are for the grid cell in which your project are located. The projections are from UC Davis, as reported in Cal-Adapt (2040–2059 average under RCP 8.5), and consider historical data of climate, vegetation, population density, and large (> 400 ha) fire history. Users may select from four model simulations to view the range in potential wildfire probabilities for the grid cell. The four simulations make different assumptions about expected rainfall and temperature are: Warmer/drier (HadGEM2-ES), Cooler/wetter (CNRM-CM5), Average conditions (CanESM2), Range of different rainfall and temperature possibilities (MIROC5). Each grid cell is 6 kilometers (km) by 6 km, or 3.7 miles (mi) by 3.7 mi.

6.2. Initial Climate Risk Scores

Climate Hazard	Exposure Score	Sensitivity Score	Adaptive Capacity Score	Vulnerability Score
Temperature and Extreme Heat	N/A	N/A	N/A	N/A
Extreme Precipitation	N/A	N/A	N/A	N/A
Sea Level Rise	N/A	N/A	N/A	N/A
Wildfire	N/A	N/A	N/A	N/A
Flooding	N/A	N/A	N/A	N/A
Drought	N/A	N/A	N/A	N/A
Snowpack Reduction	N/A	N/A	N/A	N/A
Air Quality Degradation	N/A	N/A	N/A	N/A

The sensitivity score reflects the extent to which a project would be adversely affected by exposure to a climate hazard. Exposure is rated on a scale of 1 to 5, with a score of 5 representing the greatest exposure.

The adaptive capacity of a project refers to its ability to manage and reduce vulnerabilities from projected climate hazards. Adaptive capacity is rated on a scale of 1 to 5, with a score of 5 representing the greatest ability to adapt.

The overall vulnerability scores are calculated based on the potential impacts and adaptive capacity assessments for each hazard. Scores do not include implementation of climate risk reduction measures.

6.3. Adjusted Climate Risk Scores

Climate Hazard	Exposure Score	Sensitivity Score	Adaptive Capacity Score	Vulnerability Score
Temperature and Extreme Heat	N/A	N/A	N/A	N/A
Extreme Precipitation	N/A	N/A	N/A	N/A

Sea Level Rise	N/A	N/A	N/A	N/A
Wildfire	N/A	N/A	N/A	N/A
Flooding	N/A	N/A	N/A	N/A
Drought	N/A	N/A	N/A	N/A
Snowpack Reduction	N/A	N/A	N/A	N/A
Air Quality Degradation	N/A	N/A	N/A	N/A

The sensitivity score reflects the extent to which a project would be adversely affected by exposure to a climate hazard. Exposure is rated on a scale of 1 to 5, with a score of 5 representing the greatest exposure.

The adaptive capacity of a project refers to its ability to manage and reduce vulnerabilities from projected climate hazards. Adaptive capacity is rated on a scale of 1 to 5, with a score of 5 representing the greatest ability to adapt.

The overall vulnerability scores are calculated based on the potential impacts and adaptive capacity assessments for each hazard. Scores include implementation of climate risk reduction measures.

6.4. Climate Risk Reduction Measures

7. Health and Equity Details

7.1. CalEnviroScreen 4.0 Scores

The maximum CalEnviroScreen score is 100. A high score (i.e., greater than 50) reflects a higher pollution burden compared to other census tracts in the state.

Indicator	Result for Project Census Tract
Exposure Indicators	—
AQ-Ozone	13.6
AQ-PM	15.2
AQ-DPM	30.5
Drinking Water	36.2
Lead Risk Housing	51.1
Pesticides	66.0
Toxic Releases	45.8
Traffic	10.5
Effect Indicators	—

CleanUp Sites	0.00
Groundwater	47.4
Haz Waste Facilities/Generators	37.7
Impaired Water Bodies	23.9
Solid Waste	0.00
Sensitive Population	—
Asthma	24.8
Cardio-vascular	22.6
Low Birth Weights	2.53
Socioeconomic Factor Indicators	—
Education	26.9
Housing	59.7
Linguistic	2.81
Poverty	35.9
Unemployment	33.6

7.2. Healthy Places Index Scores

The maximum Health Places Index score is 100. A high score (i.e., greater than 50) reflects healthier community conditions compared to other census tracts in the state.

Indicator	Result for Project Census Tract
Economic	—
Above Poverty	66.072116
Employed	70.51199795
Median HI	—
Education	—
Bachelor's or higher	71.62838445
High school enrollment	100
Preschool enrollment	73.48902862

Transportation	—
Auto Access	68.11240857
Active commuting	74.01514179
Social	—
2-parent households	26.5622995
Voting	99.34556653
Neighborhood	—
Alcohol availability	11.86962659
Park access	60.70832799
Retail density	59.18131657
Supermarket access	38.79122289
Tree canopy	82.47144874
Housing	—
Homeownership	44.41165148
Housing habitability	82.49711279
Low-inc homeowner severe housing cost burden	91.94148595
Low-inc renter severe housing cost burden	71.76953676
Uncrowded housing	80.21301168
Health Outcomes	—
Insured adults	74.11779802
Arthritis	0.0
Asthma ER Admissions	83.4
High Blood Pressure	0.0
Cancer (excluding skin)	0.0
Asthma	0.0
Coronary Heart Disease	0.0
Chronic Obstructive Pulmonary Disease	0.0

Diagnosed Diabetes	0.0
Life Expectancy at Birth	61.1
Cognitively Disabled	60.3
Physically Disabled	93.4
Heart Attack ER Admissions	56.5
Mental Health Not Good	0.0
Chronic Kidney Disease	0.0
Obesity	0.0
Pedestrian Injuries	19.6
Physical Health Not Good	0.0
Stroke	0.0
Health Risk Behaviors	—
Binge Drinking	0.0
Current Smoker	0.0
No Leisure Time for Physical Activity	0.0
Climate Change Exposures	—
Wildfire Risk	0.0
SLR Inundation Area	0.0
Children	69.7
Elderly	4.4
English Speaking	95.4
Foreign-born	13.7
Outdoor Workers	62.4
Climate Change Adaptive Capacity	—
Impervious Surface Cover	71.7
Traffic Density	13.2
Traffic Access	23.0

Other Indices	—
Hardship	30.1
Other Decision Support	—
2016 Voting	99.7

7.3. Overall Health & Equity Scores

Metric	Result for Project Census Tract
CalEnviroScreen 4.0 Score for Project Location (a)	11.0
Healthy Places Index Score for Project Location (b)	77.0
Project Located in a Designated Disadvantaged Community (Senate Bill 535)	No
Project Located in a Low-Income Community (Assembly Bill 1550)	No
Project Located in a Community Air Protection Program Community (Assembly Bill 617)	No

a: The maximum CalEnviroScreen score is 100. A high score (i.e., greater than 50) reflects a higher pollution burden compared to other census tracts in the state.

b: The maximum Health Places Index score is 100. A high score (i.e., greater than 50) reflects healthier community conditions compared to other census tracts in the state.

7.4. Health & Equity Measures

No Health & Equity Measures selected.

7.5. Evaluation Scorecard

Health & Equity Evaluation Scorecard not completed.

7.6. Health & Equity Custom Measures

No Health & Equity Custom Measures created.

8. User Changes to Default Data

Screen	Justification
Land Use	Per project site plan. Parking garage is below hotel, including underground, and acreage is accounted for with hotel. Landscaped area accounted for with hotel land use. Parking lot includes hotel surface parking and residential parking lot. Residential acreage accounted for with parking as ground level below 8 residential units.

Construction: Construction Phases	Basis of design project-specific construction schedule, adjusted for construction start in 2024.
Construction: Off-Road Equipment	CalEEMod default construction equipment, except added equipment for trenching phases, which is not included in CalEEMod defaults.
Construction: Trips and VMT	Haul distances per project basis of design report.
Operations: Hearths	Accounted for hotel room fireplaces and two in the lobby (electric-powered to minimize natural gas use, per mitigation).
Operations: Energy Use	Mitigation to require no natural gas use in the residential and hotel land uses; minimized natural gas use in restaurant use is not quantified here.

Hotel project Sonoma RDEIR 2050 Mitigated Detailed Report

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8. User Changes to Default Data

1. Basic Project Information

1.1. Basic Project Information

Data Field	Value
Project Name	Hotel project Sonoma RDEIR 2050 Mitigated
Operational Year	2050
Lead Agency	—
Land Use Scale	Project/site
Analysis Level for Defaults	County
Windspeed (m/s)	3.60
Precipitation (days)	40.4
Location	153 W Napa St, Sonoma, CA 95476, USA
County	Sonoma-San Francisco
City	Sonoma
Air District	Bay Area AQMD
Air Basin	San Francisco Bay Area
TAZ	981
EDFZ	2
Electric Utility	Pacific Gas & Electric Company
Gas Utility	Pacific Gas & Electric
App Version	2022.1.1.8

1.2. Land Use Types

Land Use Subtype	Size	Unit	Lot Acreage	Building Area (sq ft)	Landscape Area (sq ft)	Special Landscape Area (sq ft)	Population	Description
Apartments Mid Rise	8.00	Dwelling Unit	0.00	12,963	0.00	—	20.0	—

Parking Lot	17.0	Space	0.27	0.00	0.00	—	—	—
Enclosed Parking with Elevator	113	Space	0.01	52,110	0.00	—	—	—
Other Non-Asphalt Surfaces	0.43	Acre	0.43	0.00	0.00	—	—	—
Hotel	62.0	Room	0.55	58,445	2,150	—	—	—
High Turnover (Sit Down Restaurant)	7.00	1000sqft	0.00	7,161	0.00	—	—	—

1.3. User-Selected Emission Reduction Measures by Emissions Sector

No measures selected

2. Emissions Summary

2.4. Operations Emissions Compared Against Thresholds

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Un/Mit.	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unmit.	3.67	5.22	3.99	29.3	0.07	0.18	2.85	3.03	0.18	0.51	0.69	73.9	8,159	8,233	7.77	0.25	104	8,607
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unmit.	2.66	4.28	4.17	21.0	0.07	0.18	2.85	3.02	0.17	0.51	0.68	73.9	7,798	7,871	7.77	0.27	103	8,248
Average Daily (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Unmit.	2.26	3.94	2.10	20.1	0.06	0.08	2.51	2.59	0.08	0.45	0.53	73.9	6,785	6,859	7.74	0.24	103	7,225
Annual (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Unmit.	0.41	0.72	0.38	3.67	0.01	0.01	0.46	0.47	0.01	0.08	0.10	12.2	1,123	1,136	1.28	0.04	17.1	1,196
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2.5. Operations Emissions by Sector, Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Sector	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Mobile	1.82	1.62	1.28	21.3	0.06	0.02	2.85	2.87	0.02	0.51	0.53	—	6,287	6,287	0.16	0.21	1.31	6,354
Area	0.95	2.80	0.05	5.58	< 0.005	0.01	—	0.01	0.01	—	0.01	0.00	57.0	57.0	0.01	0.01	—	59.1
Energy	0.06	0.03	0.51	0.43	< 0.005	0.04	—	0.04	0.04	—	0.04	—	1,411	1,411	0.18	0.02	—	1,421
Water	—	—	—	—	—	—	—	—	—	—	—	7.58	9.88	17.5	0.78	0.02	—	42.5
Waste	—	—	—	—	—	—	—	—	—	—	—	66.3	0.00	66.3	6.63	0.00	—	232
Refrig.	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	103	103
Stationary	0.85	0.77	2.16	1.97	< 0.005	0.11	—	0.11	0.11	—	0.11	—	395	395	0.02	< 0.005	—	396
Total	3.67	5.22	3.99	29.3	0.07	0.18	2.85	3.03	0.18	0.51	0.69	73.9	8,159	8,233	7.77	0.25	104	8,607
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Mobile	1.75	1.56	1.51	18.7	0.06	0.02	2.85	2.87	0.02	0.51	0.53	—	5,947	5,947	0.16	0.23	0.03	6,019
Area	0.00	1.92	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	0.00	34.7	34.7	0.01	< 0.005	—	35.1
Energy	0.06	0.03	0.51	0.43	< 0.005	0.04	—	0.04	0.04	—	0.04	—	1,411	1,411	0.18	0.02	—	1,421
Water	—	—	—	—	—	—	—	—	—	—	—	7.58	9.88	17.5	0.78	0.02	—	42.5
Waste	—	—	—	—	—	—	—	—	—	—	—	66.3	0.00	66.3	6.63	0.00	—	232
Refrig.	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	103	103
Stationary	0.85	0.77	2.16	1.97	< 0.005	0.11	—	0.11	0.11	—	0.11	—	395	395	0.02	< 0.005	—	396
Total	2.66	4.28	4.17	21.0	0.07	0.18	2.85	3.02	0.17	0.51	0.68	73.9	7,798	7,871	7.77	0.27	103	8,248

Average Daily	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Mobile	1.62	1.45	1.27	16.7	0.05	0.02	2.51	2.53	0.02	0.45	0.47	—	5,288	5,288	0.15	0.20	0.50	5,351
Area	0.47	2.36	0.02	2.75	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	0.00	21.3	21.3	< 0.005	< 0.005	—	22.3
Energy	0.06	0.03	0.51	0.43	< 0.005	0.04	—	0.04	0.04	—	0.04	—	1,411	1,411	0.18	0.02	—	1,421
Water	—	—	—	—	—	—	—	—	—	—	—	7.58	9.88	17.5	0.78	0.02	—	42.5
Waste	—	—	—	—	—	—	—	—	—	—	—	66.3	0.00	66.3	6.63	0.00	—	232
Refrig.	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	103	103
Stationary	0.12	0.11	0.30	0.27	< 0.005	0.02	—	0.02	0.02	—	0.02	—	54.1	54.1	< 0.005	< 0.005	—	54.2
Total	2.26	3.94	2.10	20.1	0.06	0.08	2.51	2.59	0.08	0.45	0.53	73.9	6,785	6,859	7.74	0.24	103	7,225
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Mobile	0.30	0.26	0.23	3.04	0.01	< 0.005	0.46	0.46	< 0.005	0.08	0.09	—	876	876	0.02	0.03	0.08	886
Area	0.09	0.43	< 0.005	0.50	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	0.00	3.52	3.52	< 0.005	< 0.005	—	3.69
Energy	0.01	0.01	0.09	0.08	< 0.005	0.01	—	0.01	0.01	—	0.01	—	234	234	0.03	< 0.005	—	235
Water	—	—	—	—	—	—	—	—	—	—	—	1.25	1.64	2.89	0.13	< 0.005	—	7.03
Waste	—	—	—	—	—	—	—	—	—	—	—	11.0	0.00	11.0	1.10	0.00	—	38.4
Refrig.	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	17.0	17.0
Stationary	0.02	0.02	0.05	0.05	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	8.95	8.95	< 0.005	< 0.005	—	8.98
Total	0.41	0.72	0.38	3.67	0.01	0.01	0.46	0.47	0.01	0.08	0.10	12.2	1,123	1,136	1.28	0.04	17.1	1,196

4. Operations Emissions Details

4.1. Mobile Emissions by Land Use

4.1.1. Unmitigated

Mobile source emissions results are presented in Sections 2.6. No further detailed breakdown of emissions is available.

4.2. Energy

4.2.1. Electricity Emissions By Land Use - Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Land Use	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Apartments Mid Rise	—	—	—	—	—	—	—	—	—	—	—	—	29.0	29.0	< 0.005	< 0.005	—	29.3
Parking Lot	—	—	—	—	—	—	—	—	—	—	—	—	5.76	5.76	< 0.005	< 0.005	—	5.81
Enclosed Parking with Elevator	—	—	—	—	—	—	—	—	—	—	—	—	108	108	0.02	< 0.005	—	109
Other Non-Asphalt Surfaces	—	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	—	0.00
Hotel	—	—	—	—	—	—	—	—	—	—	—	—	484	484	0.08	0.01	—	489
High Turnover (Sit Down Restaurant)	—	—	—	—	—	—	—	—	—	—	—	—	176	176	0.03	< 0.005	—	178
Total	—	—	—	—	—	—	—	—	—	—	—	—	803	803	0.13	0.02	—	811
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Apartments Mid Rise	—	—	—	—	—	—	—	—	—	—	—	—	29.0	29.0	< 0.005	< 0.005	—	29.3

Parking Lot	—	—	—	—	—	—	—	—	—	—	—	—	5.76	5.76	< 0.005	< 0.005	—	5.81
Enclosed Parking with Elevator	—	—	—	—	—	—	—	—	—	—	—	—	108	108	0.02	< 0.005	—	109
Other Non-Asphalt Surfaces	—	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	—	0.00
Hotel	—	—	—	—	—	—	—	—	—	—	—	—	484	484	0.08	0.01	—	489
High Turnover (Sit Down Restaurant)	—	—	—	—	—	—	—	—	—	—	—	—	176	176	0.03	< 0.005	—	178
Total	—	—	—	—	—	—	—	—	—	—	—	—	803	803	0.13	0.02	—	811
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Apartments Mid Rise	—	—	—	—	—	—	—	—	—	—	—	—	4.80	4.80	< 0.005	< 0.005	—	4.85
Parking Lot	—	—	—	—	—	—	—	—	—	—	—	—	0.95	0.95	< 0.005	< 0.005	—	0.96
Enclosed Parking with Elevator	—	—	—	—	—	—	—	—	—	—	—	—	17.8	17.8	< 0.005	< 0.005	—	18.0
Other Non-Asphalt Surfaces	—	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	—	0.00
Hotel	—	—	—	—	—	—	—	—	—	—	—	—	80.2	80.2	0.01	< 0.005	—	81.0
High Turnover (Sit Down Restaurant)	—	—	—	—	—	—	—	—	—	—	—	—	29.1	29.1	< 0.005	< 0.005	—	29.4
Total	—	—	—	—	—	—	—	—	—	—	—	—	133	133	0.02	< 0.005	—	134

4.2.3. Natural Gas Emissions By Land Use - Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Land Use	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Apartments Mid Rise	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	0.00	0.00	0.00	—	0.00
Parking Lot	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	0.00	0.00	0.00	—	0.00
Enclosed Parking with Elevator	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	0.00	0.00	0.00	—	0.00
Other Non-Asphalt Surfaces	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	0.00	0.00	0.00	—	0.00
Hotel	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	0.00	0.00	0.00	—	0.00
High Turnover (Sit Down Restaurant)	0.06	0.03	0.51	0.43	< 0.005	0.04	—	0.04	0.04	—	0.04	—	608	608	0.05	< 0.005	—	610
Total	0.06	0.03	0.51	0.43	< 0.005	0.04	—	0.04	0.04	—	0.04	—	608	608	0.05	< 0.005	—	610
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Apartments Mid Rise	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	0.00	0.00	0.00	—	0.00
Parking Lot	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	0.00	0.00	0.00	—	0.00

Enclosed Parking with Elevator	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	0.00	0.00	0.00	—	0.00
Other Non-Asphalt Surfaces	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	0.00	0.00	0.00	—	0.00
Hotel	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	0.00	0.00	0.00	—	0.00
High Turnover (Sit Down Restaurant)	0.06	0.03	0.51	0.43	< 0.005	0.04	—	0.04	0.04	—	0.04	—	608	608	0.05	< 0.005	—	610
Total	0.06	0.03	0.51	0.43	< 0.005	0.04	—	0.04	0.04	—	0.04	—	608	608	0.05	< 0.005	—	610
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Apartments Mid Rise	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	0.00	0.00	0.00	—	0.00
Parking Lot	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	0.00	0.00	0.00	—	0.00
Enclosed Parking with Elevator	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	0.00	0.00	0.00	—	0.00
Other Non-Asphalt Surfaces	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	0.00	0.00	0.00	—	0.00
Hotel	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	—	0.00	0.00	0.00	0.00	—	0.00
High Turnover (Sit Down Restaurant)	0.01	0.01	0.09	0.08	< 0.005	0.01	—	0.01	0.01	—	0.01	—	101	101	0.01	< 0.005	—	101
Total	0.01	0.01	0.09	0.08	< 0.005	0.01	—	0.01	0.01	—	0.01	—	101	101	0.01	< 0.005	—	101

4.3. Area Emissions by Source

4.3.2. Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Source	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Hearths	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	0.00	34.7	34.7	0.01	< 0.005	—	35.1
Consumer Products	—	1.68	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Architectural Coatings	—	0.24	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Landscape Equipment	0.95	0.88	0.05	5.58	< 0.005	0.01	—	0.01	0.01	—	0.01	—	22.3	22.3	< 0.005	0.01	—	24.1
Total	0.95	2.80	0.05	5.58	< 0.005	0.01	—	0.01	0.01	—	0.01	0.00	57.0	57.0	0.01	0.01	—	59.1
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Hearths	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	0.00	34.7	34.7	0.01	< 0.005	—	35.1
Consumer Products	—	1.68	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Architectural Coatings	—	0.24	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Total	0.00	1.92	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	0.00	34.7	34.7	0.01	< 0.005	—	35.1
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Hearths	0.00	0.00	0.00	0.00	0.00	0.00	—	0.00	0.00	—	0.00	0.00	1.71	1.71	< 0.005	< 0.005	—	1.72

Consumer Products	—	0.31	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Architectural Coatings	—	0.04	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Landscape Equipment	0.09	0.08	< 0.005	0.50	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	1.82	1.82	< 0.005	< 0.005	—	1.96
Total	0.09	0.43	< 0.005	0.50	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	0.00	3.52	3.52	< 0.005	< 0.005	—	3.69

4.4. Water Emissions by Land Use

4.4.2. Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Land Use	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Apartments Mid Rise	—	—	—	—	—	—	—	—	—	—	—	0.49	0.64	1.14	0.05	< 0.005	—	2.77
Parking Lot	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Enclosed Parking with Elevator	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Other Non-Asphalt Surfaces	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Hotel	—	—	—	—	—	—	—	—	—	—	—	3.01	3.95	6.96	0.31	0.01	—	16.9

High Turnover (Sit Down Restaurant)	—	—	—	—	—	—	—	—	—	—	—	4.07	5.29	9.36	0.42	0.01	—	22.8
Total	—	—	—	—	—	—	—	—	—	—	—	7.58	9.88	17.5	0.78	0.02	—	42.5
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Apartments Mid Rise	—	—	—	—	—	—	—	—	—	—	—	0.49	0.64	1.14	0.05	< 0.005	—	2.77
Parking Lot	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Enclosed Parking with Elevator	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Other Non-Asphalt Surfaces	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Hotel	—	—	—	—	—	—	—	—	—	—	—	3.01	3.95	6.96	0.31	0.01	—	16.9
High Turnover (Sit Down Restaurant)	—	—	—	—	—	—	—	—	—	—	—	4.07	5.29	9.36	0.42	0.01	—	22.8
Total	—	—	—	—	—	—	—	—	—	—	—	7.58	9.88	17.5	0.78	0.02	—	42.5
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Apartments Mid Rise	—	—	—	—	—	—	—	—	—	—	—	0.08	0.11	0.19	0.01	< 0.005	—	0.46
Parking Lot	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Enclosed Parking with Elevator	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00

Other Non-Asphalt Surfaces	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Hotel	—	—	—	—	—	—	—	—	—	—	—	0.50	0.65	1.15	0.05	< 0.005	—	2.80
High Turnover (Sit Down Restaurant)	—	—	—	—	—	—	—	—	—	—	—	0.67	0.88	1.55	0.07	< 0.005	—	3.78
Total	—	—	—	—	—	—	—	—	—	—	—	1.25	1.64	2.89	0.13	< 0.005	—	7.03

4.5. Waste Emissions by Land Use

4.5.2. Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Land Use	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Apartments Mid Rise	—	—	—	—	—	—	—	—	—	—	—	3.11	0.00	3.11	0.31	0.00	—	10.9
Parking Lot	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Enclosed Parking with Elevator	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Other Non-Asphalt Surfaces	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Hotel	—	—	—	—	—	—	—	—	—	—	—	18.3	0.00	18.3	1.83	0.00	—	64.0

High Turnover (Sit Down Restaurart)	—	—	—	—	—	—	—	—	—	—	—	44.9	0.00	44.9	4.49	0.00	—	157
Total	—	—	—	—	—	—	—	—	—	—	—	66.3	0.00	66.3	6.63	0.00	—	232
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Apartme nts Mid Rise	—	—	—	—	—	—	—	—	—	—	—	3.11	0.00	3.11	0.31	0.00	—	10.9
Parking Lot	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Enclosed Parking with Elevator	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Other Non-Asphalt Surfaces	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Hotel	—	—	—	—	—	—	—	—	—	—	—	18.3	0.00	18.3	1.83	0.00	—	64.0
High Turnover (Sit Down Restaurart)	—	—	—	—	—	—	—	—	—	—	—	44.9	0.00	44.9	4.49	0.00	—	157
Total	—	—	—	—	—	—	—	—	—	—	—	66.3	0.00	66.3	6.63	0.00	—	232
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Apartme nts Mid Rise	—	—	—	—	—	—	—	—	—	—	—	0.52	0.00	0.52	0.05	0.00	—	1.80
Parking Lot	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Enclosed Parking with Elevator	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00

Other Non-Asphalt Surfaces	—	—	—	—	—	—	—	—	—	—	—	0.00	0.00	0.00	0.00	0.00	—	0.00
Hotel	—	—	—	—	—	—	—	—	—	—	—	3.03	0.00	3.03	0.30	0.00	—	10.6
High Turnover (Sit Down Restaurant)	—	—	—	—	—	—	—	—	—	—	—	7.43	0.00	7.43	0.74	0.00	—	26.0
Total	—	—	—	—	—	—	—	—	—	—	—	11.0	0.00	11.0	1.10	0.00	—	38.4

4.6. Refrigerant Emissions by Land Use

4.6.1. Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Land Use	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Apartments Mid Rise	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	0.09	0.09
Hotel	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	91.4	91.4
High Turnover (Sit Down Restaurant)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	11.2	11.2
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	103	103
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Apartments Mid Rise	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	0.09	0.09

Hotel	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	91.4	91.4
High Turnover (Sit Down Restaurart)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	11.2	11.2
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	103	103
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Apartme nts Mid Rise	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	0.02	0.02
Hotel	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	15.1	15.1
High Turnover (Sit Down Restaurart)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	1.85	1.85
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	17.0	17.0

4.7. Offroad Emissions By Equipment Type

4.7.1. Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Equipme nt Type	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
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4.8. Stationary Emissions By Equipment Type

4.8.1. Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Equipment Type	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Emergency Generator	0.85	0.77	2.16	1.97	< 0.005	0.11	—	0.11	0.11	—	0.11	—	395	395	0.02	< 0.005	—	396
Total	0.85	0.77	2.16	1.97	< 0.005	0.11	—	0.11	0.11	—	0.11	—	395	395	0.02	< 0.005	—	396
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Emergency Generator	0.85	0.77	2.16	1.97	< 0.005	0.11	—	0.11	0.11	—	0.11	—	395	395	0.02	< 0.005	—	396
Total	0.85	0.77	2.16	1.97	< 0.005	0.11	—	0.11	0.11	—	0.11	—	395	395	0.02	< 0.005	—	396
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Emergency Generator	0.02	0.02	0.05	0.05	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	8.95	8.95	< 0.005	< 0.005	—	8.98
Total	0.02	0.02	0.05	0.05	< 0.005	< 0.005	—	< 0.005	< 0.005	—	< 0.005	—	8.95	8.95	< 0.005	< 0.005	—	8.98

4.9. User Defined Emissions By Equipment Type

4.9.1. Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Equipment Type	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

4.10. Soil Carbon Accumulation By Vegetation Type

4.10.1. Soil Carbon Accumulation By Vegetation Type - Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Vegetation	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
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4.10.2. Above and Belowground Carbon Accumulation by Land Use Type - Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Land Use	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Total	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

4.10.3. Avoided and Sequestered Emissions by Species - Unmitigated

Criteria Pollutants (lb/day for daily, ton/yr for annual) and GHGs (lb/day for daily, MT/yr for annual)

Species	TOG	ROG	NOx	CO	SO2	PM10E	PM10D	PM10T	PM2.5E	PM2.5D	PM2.5T	BCO2	NBCO2	CO2T	CH4	N2O	R	CO2e
Daily, Summer (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Avoided	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Sequestered	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Removed	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Daily, Winter (Max)	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Avoided	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Sequestered	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Removed	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Annual	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Avoided	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Sequestered	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Removed	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Subtotal	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—

5. Activity Data

5.9. Operational Mobile Sources

5.9.1. Unmitigated

Land Use Type	Trips/Weekday	Trips/Saturday	Trips/Sunday	Trips/Year	VMT/Weekday	VMT/Saturday	VMT/Sunday	VMT/Year
Total all Land Uses	512	517	394	180,967	9,023	10,181	7,610	3,279,961

5.10. Operational Area Sources

5.10.1. Hearths

5.10.1.1. Unmitigated

Hearth Type	Unmitigated (number)
Apartments Mid Rise	—
Wood Fireplaces	0
Gas Fireplaces	0
Propane Fireplaces	0
Electric Fireplaces	4
No Fireplaces	4
Conventional Wood Stoves	0
Catalytic Wood Stoves	0
Non-Catalytic Wood Stoves	0
Pellet Wood Stoves	0
Hotel	—
Wood Fireplaces	0
Gas Fireplaces	0
Propane Fireplaces	0
Electric Fireplaces	64
No Fireplaces	0

5.10.2. Architectural Coatings

Residential Interior Area Coated (sq ft)	Residential Exterior Area Coated (sq ft)	Non-Residential Interior Area Coated (sq ft)	Non-Residential Exterior Area Coated (sq ft)	Parking Area Coated (sq ft)
26250.074999999997	8,750	98,429	32,805	1,856

5.10.3. Landscape Equipment

Season	Unit	Value
Snow Days	day/yr	0.00
Summer Days	day/yr	180

5.11. Operational Energy Consumption

5.11.1. Unmitigated

Electricity (kWh/yr) and CO2 and CH4 and N2O and Natural Gas (kBTU/yr)

Land Use	Electricity (kWh/yr)	CO2	CH4	N2O	Natural Gas (kBTU/yr)
Apartments Mid Rise	51,869	204	0.0330	0.0040	0.00
Parking Lot	10,303	204	0.0330	0.0040	0.00
Enclosed Parking with Elevator	192,360	204	0.0330	0.0040	0.00
Other Non-Asphalt Surfaces	0.00	204	0.0330	0.0040	0.00
Hotel	866,926	204	0.0330	0.0040	0.00
High Turnover (Sit Down Restaurant)	314,829	204	0.0330	0.0040	949,168

5.12. Operational Water and Wastewater Consumption

5.12.1. Unmitigated

Land Use	Indoor Water (gal/year)	Outdoor Water (gal/year)
Apartments Mid Rise	257,894	0.00
Parking Lot	0.00	0.00

Enclosed Parking with Elevator	0.00	0.00
Other Non-Asphalt Surfaces	0.00	0.00
Hotel	1,572,740	19,260
High Turnover (Sit Down Restaurant)	2,124,736	0.00

5.13. Operational Waste Generation

5.13.1. Unmitigated

Land Use	Waste (ton/year)	Cogeneration (kWh/year)
Apartments Mid Rise	5.78	0.00
Parking Lot	0.00	0.00
Enclosed Parking with Elevator	0.00	0.00
Other Non-Asphalt Surfaces	0.00	0.00
Hotel	33.95	0.00
High Turnover (Sit Down Restaurant)	83.30	0.00

5.14. Operational Refrigeration and Air Conditioning Equipment

5.14.1. Unmitigated

Land Use Type	Equipment Type	Refrigerant	GWP	Quantity (kg)	Operations Leak Rate	Service Leak Rate	Times Serviced
Apartments Mid Rise	Average room A/C & Other residential A/C and heat pumps	R-410A	2,088	< 0.005	2.50	2.50	10.0
Apartments Mid Rise	Household refrigerators and/or freezers	R-134a	1,430	0.12	0.60	0.00	1.00
Hotel	Household refrigerators and/or freezers	R-134a	1,430	0.00	0.60	0.00	1.00
Hotel	Other commercial A/C and heat pumps	R-410A	2,088	1.80	4.00	4.00	18.0

Hotel	Walk-in refrigerators and freezers	R-404A	3,922	< 0.005	7.50	7.50	20.0
High Turnover (Sit Down Restaurant)	Household refrigerators and/or freezers	R-134a	1,430	0.00	0.60	0.00	1.00
High Turnover (Sit Down Restaurant)	Other commercial A/C and heat pumps	R-410A	2,088	1.80	4.00	4.00	18.0
High Turnover (Sit Down Restaurant)	Walk-in refrigerators and freezers	R-404A	3,922	< 0.005	7.50	7.50	20.0

5.15. Operational Off-Road Equipment

5.15.1. Unmitigated

Equipment Type	Fuel Type	Engine Tier	Number per Day	Hours Per Day	Horsepower	Load Factor
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5.16. Stationary Sources

5.16.1. Emergency Generators and Fire Pumps

Equipment Type	Fuel Type	Number per Day	Hours per Day	Hours per Year	Horsepower	Load Factor
Emergency Generator	Diesel	1.00	1.00	50.0	470	0.73

5.16.2. Process Boilers

Equipment Type	Fuel Type	Number	Boiler Rating (MMBtu/hr)	Daily Heat Input (MMBtu/day)	Annual Heat Input (MMBtu/yr)
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5.17. User Defined

Equipment Type	Fuel Type
—	—

5.18. Vegetation

5.18.1. Land Use Change

5.18.1.1. Unmitigated

Vegetation Land Use Type	Vegetation Soil Type	Initial Acres	Final Acres
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5.18.1. Biomass Cover Type

5.18.1.1. Unmitigated

Biomass Cover Type	Initial Acres	Final Acres
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5.18.2. Sequestration

5.18.2.1. Unmitigated

Tree Type	Number	Electricity Saved (kWh/year)	Natural Gas Saved (btu/year)
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6. Climate Risk Detailed Report

6.1. Climate Risk Summary

Cal-Adapt midcentury 2040–2059 average projections for four hazards are reported below for your project location. These are under Representation Concentration Pathway (RCP) 8.5 which assumes GHG emissions will continue to rise strongly through 2050 and then plateau around 2100.

Climate Hazard	Result for Project Location	Unit
Temperature and Extreme Heat	11.3	annual days of extreme heat
Extreme Precipitation	9.95	annual days with precipitation above 20 mm
Sea Level Rise	0.00	meters of inundation depth
Wildfire	9.64	annual hectares burned

Temperature and Extreme Heat data are for grid cell in which your project are located. The projection is based on the 98th historical percentile of daily maximum/minimum temperatures from observed historical data (32 climate model ensemble from Cal-Adapt, 2040–2059 average under RCP 8.5). Each grid cell is 6 kilometers (km) by 6 km, or 3.7 miles (mi) by 3.7 mi.

Extreme Precipitation data are for the grid cell in which your project are located. The threshold of 20 mm is equivalent to about ¾ an inch of rain, which would be light to moderate rainfall if received over a full day or heavy rain if received over a period of 2 to 4 hours. Each grid cell is 6 kilometers (km) by 6 km, or 3.7 miles (mi) by 3.7 mi.

Sea Level Rise data are for the grid cell in which your project are located. The projections are from Radke et al. (2017), as reported in Cal-Adapt (2040–2059 average under RCP 8.5), and consider different increments of sea level rise coupled with extreme storm events. Users may select from four model simulations to view the range in potential inundation depth for the grid cell. The four simulations make different assumptions about expected rainfall and temperature are: Warmer/drier (HadGEM2-ES), Cooler/wetter (CNRM-CM5), Average conditions (CanESM2), Range of different rainfall and temperature possibilities (MIROC5). Each grid cell is 50 meters (m) by 50 m, or about 164 feet (ft) by 164 ft.

Wildfire data are for the grid cell in which your project are located. The projections are from UC Davis, as reported in Cal-Adapt (2040–2059 average under RCP 8.5), and consider historical data of climate, vegetation, population density, and large (> 400 ha) fire history. Users may select from four model simulations to view the range in potential wildfire probabilities for the grid cell. The four simulations make different assumptions about expected rainfall and temperature are: Warmer/drier (HadGEM2-ES), Cooler/wetter (CNRM-CM5), Average conditions (CanESM2), Range of different rainfall and temperature possibilities (MIROC5). Each grid cell is 6 kilometers (km) by 6 km, or 3.7 miles (mi) by 3.7 mi.

6.2. Initial Climate Risk Scores

Climate Hazard	Exposure Score	Sensitivity Score	Adaptive Capacity Score	Vulnerability Score
Temperature and Extreme Heat	N/A	N/A	N/A	N/A
Extreme Precipitation	N/A	N/A	N/A	N/A
Sea Level Rise	N/A	N/A	N/A	N/A
Wildfire	N/A	N/A	N/A	N/A
Flooding	N/A	N/A	N/A	N/A
Drought	N/A	N/A	N/A	N/A
Snowpack Reduction	N/A	N/A	N/A	N/A
Air Quality Degradation	N/A	N/A	N/A	N/A

The sensitivity score reflects the extent to which a project would be adversely affected by exposure to a climate hazard. Exposure is rated on a scale of 1 to 5, with a score of 5 representing the greatest exposure.

The adaptive capacity of a project refers to its ability to manage and reduce vulnerabilities from projected climate hazards. Adaptive capacity is rated on a scale of 1 to 5, with a score of 5 representing the greatest ability to adapt.

The overall vulnerability scores are calculated based on the potential impacts and adaptive capacity assessments for each hazard. Scores do not include implementation of climate risk reduction measures.

6.3. Adjusted Climate Risk Scores

Climate Hazard	Exposure Score	Sensitivity Score	Adaptive Capacity Score	Vulnerability Score
Temperature and Extreme Heat	N/A	N/A	N/A	N/A
Extreme Precipitation	N/A	N/A	N/A	N/A

Sea Level Rise	N/A	N/A	N/A	N/A
Wildfire	N/A	N/A	N/A	N/A
Flooding	N/A	N/A	N/A	N/A
Drought	N/A	N/A	N/A	N/A
Snowpack Reduction	N/A	N/A	N/A	N/A
Air Quality Degradation	N/A	N/A	N/A	N/A

The sensitivity score reflects the extent to which a project would be adversely affected by exposure to a climate hazard. Exposure is rated on a scale of 1 to 5, with a score of 5 representing the greatest exposure.

The adaptive capacity of a project refers to its ability to manage and reduce vulnerabilities from projected climate hazards. Adaptive capacity is rated on a scale of 1 to 5, with a score of 5 representing the greatest ability to adapt.

The overall vulnerability scores are calculated based on the potential impacts and adaptive capacity assessments for each hazard. Scores include implementation of climate risk reduction measures.

6.4. Climate Risk Reduction Measures

7. Health and Equity Details

7.1. CalEnviroScreen 4.0 Scores

The maximum CalEnviroScreen score is 100. A high score (i.e., greater than 50) reflects a higher pollution burden compared to other census tracts in the state.

Indicator	Result for Project Census Tract
Exposure Indicators	—
AQ-Ozone	13.6
AQ-PM	15.2
AQ-DPM	30.5
Drinking Water	36.2
Lead Risk Housing	51.1
Pesticides	66.0
Toxic Releases	45.8
Traffic	10.5
Effect Indicators	—

CleanUp Sites	0.00
Groundwater	47.4
Haz Waste Facilities/Generators	37.7
Impaired Water Bodies	23.9
Solid Waste	0.00
Sensitive Population	—
Asthma	24.8
Cardio-vascular	22.6
Low Birth Weights	2.53
Socioeconomic Factor Indicators	—
Education	26.9
Housing	59.7
Linguistic	2.81
Poverty	35.9
Unemployment	33.6

7.2. Healthy Places Index Scores

The maximum Health Places Index score is 100. A high score (i.e., greater than 50) reflects healthier community conditions compared to other census tracts in the state.

Indicator	Result for Project Census Tract
Economic	—
Above Poverty	66.072116
Employed	70.51199795
Median HI	—
Education	—
Bachelor's or higher	71.62838445
High school enrollment	100
Preschool enrollment	73.48902862

Transportation	—
Auto Access	68.11240857
Active commuting	74.01514179
Social	—
2-parent households	26.5622995
Voting	99.34556653
Neighborhood	—
Alcohol availability	11.86962659
Park access	60.70832799
Retail density	59.18131657
Supermarket access	38.79122289
Tree canopy	82.47144874
Housing	—
Homeownership	44.41165148
Housing habitability	82.49711279
Low-inc homeowner severe housing cost burden	91.94148595
Low-inc renter severe housing cost burden	71.76953676
Uncrowded housing	80.21301168
Health Outcomes	—
Insured adults	74.11779802
Arthritis	0.0
Asthma ER Admissions	83.4
High Blood Pressure	0.0
Cancer (excluding skin)	0.0
Asthma	0.0
Coronary Heart Disease	0.0
Chronic Obstructive Pulmonary Disease	0.0

Diagnosed Diabetes	0.0
Life Expectancy at Birth	61.1
Cognitively Disabled	60.3
Physically Disabled	93.4
Heart Attack ER Admissions	56.5
Mental Health Not Good	0.0
Chronic Kidney Disease	0.0
Obesity	0.0
Pedestrian Injuries	19.6
Physical Health Not Good	0.0
Stroke	0.0
Health Risk Behaviors	—
Binge Drinking	0.0
Current Smoker	0.0
No Leisure Time for Physical Activity	0.0
Climate Change Exposures	—
Wildfire Risk	0.0
SLR Inundation Area	0.0
Children	69.7
Elderly	4.4
English Speaking	95.4
Foreign-born	13.7
Outdoor Workers	62.4
Climate Change Adaptive Capacity	—
Impervious Surface Cover	71.7
Traffic Density	13.2
Traffic Access	23.0

Other Indices	—
Hardship	30.1
Other Decision Support	—
2016 Voting	99.7

7.3. Overall Health & Equity Scores

Metric	Result for Project Census Tract
CalEnviroScreen 4.0 Score for Project Location (a)	11.0
Healthy Places Index Score for Project Location (b)	77.0
Project Located in a Designated Disadvantaged Community (Senate Bill 535)	No
Project Located in a Low-Income Community (Assembly Bill 1550)	No
Project Located in a Community Air Protection Program Community (Assembly Bill 617)	No

a: The maximum CalEnviroScreen score is 100. A high score (i.e., greater than 50) reflects a higher pollution burden compared to other census tracts in the state.

b: The maximum Health Places Index score is 100. A high score (i.e., greater than 50) reflects healthier community conditions compared to other census tracts in the state.

7.4. Health & Equity Measures

No Health & Equity Measures selected.

7.5. Evaluation Scorecard

Health & Equity Evaluation Scorecard not completed.

7.6. Health & Equity Custom Measures

No Health & Equity Custom Measures created.

8. User Changes to Default Data

Screen	Justification
Land Use	Per project site plan. Parking garage is below hotel, including underground, and acreage is accounted for with hotel. Landscaped area accounted for with hotel land use. Parking lot includes hotel surface parking and residential parking lot. Residential acreage accounted for with parking as ground level below 8 residential units.

Construction: Construction Phases	Basis of design project-specific construction schedule, adjusted for construction start in 2024.
Construction: Off-Road Equipment	CalEEMod default construction equipment, except added equipment for trenching phases, which is not included in CalEEMod defaults.
Construction: Trips and VMT	Haul distances per project basis of design report.
Operations: Hearths	Accounted for hotel room fireplaces and two in the lobby (electric-powered to minimize natural gas use, per mitigation).
Operations: Energy Use	Mitigation to require no natural gas use in the residential and hotel land uses; minimized natural gas use in restaurant use is not quantified here.

CAREMAD Inputs and Assumptions

Project Characteristics	Project Name	Hotel Project Geneva 2022 R02R
	Project Location	Solano County
	CDC CA Dis Demand Forecast Zone	2
	Observation Year	2025
	UBSE	P04E

Unit Conversions	
Acres	square feet
1	43,560
Code: Yrd/Imp/Water	short ton of waste
1	2,000
1	2.2
1	2.2
1	2.2

1.1375

2022 Unit and GFR Summary Worksheet

Land Use	Land Use Type	Land Use Subtype	Square Footage	Project Acct#	Landscaping Area	Roofs	Parking Spaces	Source	Note	
Building A	Recreational	Hotel	58,462	0.05	2,150	62		Hotel sq ft reflects Project Narrative 02170222 Table 11, and Table 2-3 R02R 2022	Square Footage based on Hotel Building total square footage (58,462 sq ft), as listed in Table 2-1 of R02R 90 and 91/2022 Project Narrative, minus the Restaurant square footage (7,146 sq ft) located in the R02R Part 2 page 46. Restaurant sq ft was subtracted out and included as a separate land use.	
	Commercial	High Turnover Sit-down Restaurant	7,863	-	-	-	-	Based on Design Report Part 2, page 46. (2015)	Average reflects that floor square footage of Hotel (21,690 sq ft) restaurant average provided out below and total building footprint is accounted for under hotel. Average includes 2,150 sq ft of landscape that abutted the construction edge of the Project footprint. Average associated with Building A surface parking and other non-surface landscaped areas accounted for separately below.	
	Parking	On-street/Backlot Surface Parking	52,110	-	-	-	113	Project Narrative 02170222 Table 11, and Table 2-3 R02R 2022	Backlot parking garage, average included in hotel building average.	
	Parking	Off-street/Backlot Surface Parking	3,800	0.08	-	-	9	Number of surface parking spaces per Project Narrative 02170222 and Table 2-3 R02R 2022	Average and sq ft based on CAREMAD default for 8 spaces.	
	Parking	Off-street/Backlot Surface Parking	18,360	0.43	-	-	43	Based on Design Report Part 2, page 46. (2015)	Includes all ground floor horizontal ramp, accounted for in hotel/parking area.	
	Residential	Apartment/ Mid Rise	217,758	1.06	-	-	422	Project Narrative 02170222 Table 11 and Table 2-3 R02R 2022	Average based on lot floor square footage (8,258 sq ft), which aligns with the first floor apartment.	
	Parking	Parking Lot (Bldg & Covered Parking)	8,258	-	-	-	8	Project Narrative 02170222 Table 11 and Table 2-3 R02R 2022	Average estimated, accounted for with total coverage captured under Residential use.	
	Residential	Apartment/ Single-Family Detached	29,271	0.13	-	-	8	R02R PG Section 1.1.1		
	Check:	Yes	Yes	Yes	Yes	Yes	Yes	Yes	*Note that Project Narrative (2-17-2022) lists sq ft of 1.38 acres in Project Site summary on page 1, but 1.25 acres in the Table 11, zoning consistency table that details each use and use.	
	Check:	Yes	Yes	Yes	Yes	Yes	Yes	Yes		

Construction Inputs

Demolition	Term of Waste (Yr)	Source
50%	100	City from basis of Design Report, Part 2, page 46. Calculated from CAREMAD Appendix C based on composition of CR to Short Term of waste.
50%	700	Hotel Project Basis of Design Report, Part 2, Page 46.
Total Term:	366.98	

Construction Phases & Equipment

Construction Schedule	Start	January 1, 2023	18 Month Duration	5 week drop per week	Phase Name	Phase Type	Duration (Weeks)	Start Date	End Date	CAREMAD Dates Used	Calculation	Equipment
Building Demolition	Demolition	30	30	30	Building Demolition	Demolition	10	1/1/2023	1/1/2023	1/1/2023	1/1/2023	Excavator, 30' lift, 8 ton/hr.
								1/1/2023	1/1/2023	1/1/2023	1/1/2023	Excavator, 30' lift, 8 ton/hr.
								1/1/2023	1/1/2023	1/1/2023	1/1/2023	Excavator, 30' lift, 8 ton/hr.
								1/1/2023	1/1/2023	1/1/2023	1/1/2023	Excavator, 30' lift, 8 ton/hr.
								1/1/2023	1/1/2023	1/1/2023	1/1/2023	Excavator, 30' lift, 8 ton/hr.
								1/1/2023	1/1/2023	1/1/2023	1/1/2023	Excavator, 30' lift, 8 ton/hr.
								1/1/2023	1/1/2023	1/1/2023	1/1/2023	Excavator, 30' lift, 8 ton/hr.
								1/1/2023	1/1/2023	1/1/2023	1/1/2023	Excavator, 30' lift, 8 ton/hr.
								1/1/2023	1/1/2023	1/1/2023	1/1/2023	Excavator, 30' lift, 8 ton/hr.
								1/1/2023	1/1/2023	1/1/2023	1/1/2023	Excavator, 30' lift, 8 ton/hr.

Source: Hotel Project Basis of Design Report, Part 2 (Page 46) see comments in Column 13 and 14 and the updated construction start date of January 1, 2023 and to align with CAREMAD worksite and holiday adjustments. Construction equipment assumed default, equipment with life on page 46. Use CAREMAD defaults except additional equipment for trenching phases, which is not included in CAREMAD defaults.

Construction Phases & Equipment

Construction Schedule	Start	January 1, 2023	18 Month Duration	5 week drop per week	Phase Name	Phase Type	Duration (Weeks)	Start Date	End Date	CAREMAD Dates Used	Calculation	Equipment
Building Demolition	Demolition	30	30	30	Building Demolition	Demolition	10	1/1/2023	1/1/2023	1/1/2023	1/1/2023	Excavator, 30' lift, 8 ton/hr.
								1/1/2023	1/1/2023	1/1/2023	1/1/2023	Excavator, 30' lift, 8 ton/hr.
								1/1/2023	1/1/2023	1/1/2023	1/1/2023	Excavator, 30' lift, 8 ton/hr.
								1/1/2023	1/1/2023	1/1/2023	1/1/2023	Excavator, 30' lift, 8 ton/hr.
								1/1/2023	1/1/2023	1/1/2023	1/1/2023	Excavator, 30' lift, 8 ton/hr.
								1/1/2023	1/1/2023	1/1/2023	1/1/2023	Excavator, 30' lift, 8 ton/hr.
								1/1/2023	1/1/2023	1/1/2023	1/1/2023	Excavator, 30' lift, 8 ton/hr.
								1/1/2023	1/1/2023	1/1/2023	1/1/2023	Excavator, 30' lift, 8 ton/hr.
								1/1/2023	1/1/2023	1/1/2023	1/1/2023	Excavator, 30' lift, 8 ton/hr.
								1/1/2023	1/1/2023	1/1/2023	1/1/2023	Excavator, 30' lift, 8 ton/hr.

Source: Hotel Project Basis of Design Report, Part 2 (Page 46) see comments in Column 13 and 14 and the updated construction start date of January 1, 2023 and to align with CAREMAD worksite and holiday adjustments. Construction equipment assumed default, equipment with life on page 46. Use CAREMAD defaults except additional equipment for trenching phases, which is not included in CAREMAD defaults.

Construction Activities	Start Date	End Date	Duration (Weeks)
Building Demolition (Chateau Solano Building)	2/15/2018	6/5/2018	18
Building Demolition (Hotel)	2/22/2018	3/7/2018	10
Building Demolition (Perry Building)	2/15/2018	3/4/2018	19
Building Demolition (Hotel) (if applicable)	2/22/2018	3/7/2018	15
Asphalt Demolition	3/7/2018	3/14/2018	5
Asphalt Demolition (Hotel) (if applicable)	3/7/2018	3/14/2018	5
Site Preparation	3/14/2018	3/28/2018	15
Site Preparation (Hotel) (if applicable)	3/14/2018	4/21/2018	25
Gravel Grading	3/14/2018	5/15/2018	40
Grading (Hotel) (if applicable)	3/14/2018	3/28/2018	20
Utility Trenching	8/1/2018	9/4/2018	5
Form Grading	6/5/2017	6/29/2017	5
Form Grading (Hotel) (if applicable)	6/5/2017	6/29/2017	5
Building Construction	4/15/2016	8/15/2017	312
Asphalt Paving	6/7/2017	6/14/2017	7
Architectural Coating	4/15/2017	6/15/2017	44
Finishing/Landscaping	7/1/2017	8/15/2017	30

2016 HRA Emissions Inputs vs 2023 Project

Construction Emissions

	DPM (exhaust)	PM2.5 (total)	Notes
2016 HRA 2016 Mitigated	0.47	0.71	on-site + off-site
2016 HRA 2017 Mitigated	0.55	0.71	on-site + off-site
Current 2023 Project Unmitigated	0.526	0.739	weighted average of 2023-2024 construction - based on average daily for each year, weighted on number of construction work days per year
Percent Change	4%	-4%	

Current 2023 Project Weighted Average Daily Emissions		
	199.46	280.18
	0.526279683	0.739261214

Proposed Construction Duration:

Year	Days of Construction
2024	252
2025	127
Total	379

Placeworks HRA Snips:

PDF Page 185 of DEIR-Appendices:

Table 3 Construction Activity – Average Daily Emission Rates With Mitigation

Parameter – Year	Onsite Emissions (lbs/day) ¹	Total Offsite Emissions (lbs/day) ¹
DPM – 2016	0.42	0.05
PM _{2.5} -2016	0.53	0.18
DPM – 2017	0.52	0.03
PM _{2.5} -2017	0.51	0.20

Presented emission rates are average daily emissions.

Source: CalEEMod 2013.2.2.

¹ Accounts for emissions reductions from implementation of mitigation which requires use of Level 3 DPF for construction equipment with a horsepower rating of 50 horsepower or higher.

Table 4 Health Risk Assessment Results – With Mitigation

Receptor	Cancer Risk (per million)	Chronic Hazard Index	PM _{2.5} (µg/m ³) ¹
Resident (Maximum Exposed Individual)	6.8	0.014	0.04
BAAQMD Threshold	10	1.0	0.3
Exceeds Threshold	No	No	No

Sources: Lakes AERMOD View, 8.9, 2015.

Note:

¹ From year 2016 which represents the highest maximum annual PM_{2.5} concentration.

Page 176 and 184:

Table 1 Construction Activity – Average Daily Emission Rates

Parameter – Year	Onsite Emissions (lbs/day)	Total Offsite Emissions (lbs/day)
DPM – 2016	1.17	0.05
PM _{2.5} -2016	1.24	0.19
DPM – 2017	1.28	0.03
PM _{2.5} -2017	1.24	0.21

Presented emission rates are average daily emissions.

Source: CalEEMod 2013.2.2.

Table 2 Health Risk Assessment Results

Receptor	Cancer Risk (per million)	Chronic Hazard Index	PM _{2.5} (µg/m ³) ¹
Resident (Maximum Exposed Receptor)	17	0.04	0.10
Golden Living Centers – London House Sonoma	0.03	0.002	0.004
Sunnyside School Daycare	1.4	0.01	0.03
BAAQMD Threshold	10	1.0	0.3
Exceeds Threshold	Yes	No	No

Sources: Lakes AERMOD View, 8.9, 2014.

Note:

¹ From year 2016 which represents the highest maximum annual PM_{2.5} concentration.

**Hotel Project Sonoma RDEIR
GHG Emissions Estimates, Thresholds, and Offset Requirements**

	2025 Mitigated	2030 Mitigated	2040 Mitigated	2050 Mitigated
Construction	1001	1001	1001	1001
Amortized Construction (30-year)	33.37	33.37	33.37	33.37
Operational				
Mobile	1224	1110	949	886
Area	1.72	3.55	3.59	3.69
Energy	148.3244473	148.3244473	148.3244473	148.3244473
Water	7.03	7.03	7.03	7.03
Waste	38.4	38.4	38.4	38.4
Refrigerants	16.9	16.9	16.9	16.9
Stationary	8.98	8.98	8.98	8.98
Total Operational	1728	1333.184447	1172.224447	1109.324447
Amortized Construction + Annual Operational	1761.366667	1366.551114	1205.591114	1142.691114
Service Population (75 FTE employees + 20 residents)	95	95	95	95
GHG Efficiency of Project	18.54070175	14.38474857	12.69043278	12.02832752
GHG Efficiency Threshold	2.88	2.88	2.88	2.88
GHG Mass Threshold to Achieve Efficiency Threshold	273.6	273.6	273.6	273.6
Additional Emissions Reductions/Offsets Required	1487.766667	1092.951114	931.991114	869.091114

Mitigation Assumptions

No VMT mitigation assumed.

Elimination of natural gas fireplaces in hotel and residential.

Hotel and Restaurant subscribe to SCP EverGreen - unmitigated Electricity GHG emissions from Residential use in unmitigated CalEEMod run is added in, as it is not assumed that residents will subscribe to SCP.

Eliminate natural gas infrastructure from hotel and residential.

30% of outdoor water supplied via rain catchment - not quantified due to uncertainty in rain levels and availability of rin catchment as a water supply.

	2025 to 2029	2030 to 2039	2040 to 2049	2050 to 2055	Total
Emission Credits					
Number of Years	5	10	10	6	31
Without Natural Gas in Residential or Hotel (no change to Restaurant)	7,439	10,930	9,320	5,215	32,903

Energy-sector GHG emissions with mitigation of No Natural Gas and Subscription to SCP

CleanStart for Hotel and Restaurant

Mitigated Electricity Consumption	Residential	Parking Lot	Parking Garage	Hotel	Restaurant	Total
kWh/yr	51869	10303	192360		866926	1436287
Electricity GHG Emissions (SCP EverGreen, MT CO2e/year)	4.85	0.299095536	5.584200452		25.16681514	47.3244473
Natural Gas Emissions (Restaurant, MT CO2e/year)		0	0		0	101
Total Energy GHG Emissions (MT CO2e/year)	4.85	0.299095536	5.584200452		25.16681514	148.3244473

Sonoma Clean Power 2022 Co2e Emissions Intensity Factors

SCP CleanStart GHG Intensity (lb CO2e/MWh)	80
SCP EverGreen GHG Intensity (lb CO2e/MWh)	64

Electricity Consumption Estimates Converting Natural Gas (NG) Appliances to Electric-powered

With Natural Gas, 2024, no NG fireplaces

Land Use	Title 24 Electricity	Title 24 NG	Non-Title 24 Electric	Non-Title 24 NG
Apartments	7064.2	87631.85	18478.23	2216.87
Parking Lot	10302.81	0	0	0
Parking Garage	162312.36	0	8807.64	0
Hotel	182040.13	1499932.82	191119.7	185192.88
Restaurant	113581.52	194998.2	201247.91	754169.77

No Natural Gas in Residential & Hotel, 2024

Land Use	Title 24 Electricity	Title 24 NG	Non-Title 24 Electric	Non-Title 24 NG
Apartments	32741.60565	0	19127.80513	0
Parking Lot	10302.81	0	0	0
Parking Garage	162312.36	0	8807.64	0
Hotel	621542.2456	0	245383.9053	0
Restaurant	113581.52	194998.2	201247.91	754169.77

kBTU	KWh
1	0.293014534

Phase	Source	MT CO ₂ e/yr ^a	Fuel Type	Factor	
				(MT CO ₂ /gallon) ^b	Gallons/year
<i>Demolition</i>	Offroad Equipme	81.71	Diesel	1.02E-02	8,042
	Hauling	2.00	Diesel	0.01016	197
	Vendor	0.00	Diesel	0.01016	-
	Worker	1.15	Gas	0.008887	129
<i>Site Prep</i>	Offroad Equipme	28.18	Diesel	1.02E-02	2,774
	Hauling	26.95	Diesel	0.01016	2,653
	Vendor	0.00	Diesel	0.01016	-
	Worker	0.29	Gas	0.008887	33
<i>Grading</i>	Offroad Equipme	150.77	Diesel	0.01016	14,840
	Hauling	0.18	Diesel	0.01016	18
	Vendor	0.00	Diesel	0.01016	-
	Worker	1.48	Gas	0.008887	167
<i>Trenching</i>	Offroad Equipme	3.87	Diesel	0.01016	381
	Hauling	0.00	Diesel	0.01016	-
	Vendor	0.00	Diesel	0.01016	-
	Worker	0.19	Gas	0.008887	21
<i>Building Construction</i>	Offroad Equipme	509.40	Diesel	0.01016	50,138
	Hauling	0.00	Diesel	0.01016	-
	Vendor	94.10	Diesel	0.01016	9,262
	Worker	74.00	Gas	0.008887	8,327
<i>Paving</i>	Offroad Equipme	9.48	Diesel	0.01016	933
	Hauling	0.00	Diesel	0.01016	-
	Vendor	0.18	Diesel	0.01016	18
	Worker	0.33	Gas	0.008887	37
<i>Architectural Coating</i>	Offroad Equipme	13.49	Diesel	0.01016	1,328
	Hauling	0.00	Diesel	0.01016	-
	Vendor	0.00	Diesel	0.01016	-
	Worker	3.08	Gas	0.008887	347
1000.83 Total Gallons			Diesel	90,582	
			Gasoline	9,060	

Notes:

Sources:

^a Modeled by AECOM in 2023;

^b U.S. Energy Information Administration 2016 (https://www.eia.gov/environment/emissions/co2_vol_mass.php)

Factor:	MT/gallon
Diesel	1.02E-02
Gasoline	8.89E-03

Table 3.5-3. Estimated Annual Electrical and Natural Gas Demand

	Electrical Demand (kWh/year)	Natural Gas Demand (kBtu/year)	Natural Gas Demand (therms)
Hotel	374,859	1,692,801	
Restaurant	314,829	949,168	
Residential	25,542	89,849	
Parking	181,423	-	
Total Proposed Project	896,653	2,731,818	27318.18
Notes: kWh = kilowatt-hours; kBtu = thousand British thermal unit			
Source: AECOM 2023			

Hotel Sonoma Project 2021 RDEIR - Operational Transportation Energy Consumption

Source: EMFAC2011 (v1.0.2) Emissions Inventory

Region Type: County
Region: Sacramento

Calendar Year: 2025
Season: Annual

Vehicle Classification: EMFAC202x Categories

Units: miles/day for CVMT and EVMT, trips/day for Trips, kWh/day for Energy Consumption, tons/day for Emissions, 1000 gallons/day for Fuel Consumption

Project Annual
VMT:
3,279,960

Region	CAFR	VehClass	ADMT	Speed	Fuel	Population	TotalVMT	CVMT	EVMT	Trips	Energy Consumed	Fuel Consum	kWh/mile	% VMT	Project Daily			Project Annual	
															VMT	Project Annual VMT	Project Annual Fuel Consumption (gallons)	Project Annual Electricity	Project Annual VMT
Bay Area AQMD	2025	LD	Aggregate	Gasoline	2208622.88	27922035392	27922035392	0	3548142179	0	909575.78	0	47.39%	4258.4258	1554325.40	58631.01136	0	0	
Bay Area AQMD	2025	LD	Aggregate	Diesel	8048.62779	76660457.17	76660457.17	0	11723427	0	1776.7802	0	0.13%	11.6916	4267.43	98.9073501	0	0	
Bay Area AQMD	2025	LD	Aggregate	Electricity	183077.24	2809198681	0	2809198681	0	2809198681	110773261	0	0.386083	4.87%	437.9738	159715.36	0	61862.23213	
Bay Area AQMD	2025	LD	Aggregate	Plug-in Hybrid	67539.1411	1021830689	494513376.7	52737312.8	869898.982	159271585.6	16611.245	0.30203	1.75%	155.8438	56882.88	924.6918888	17180.35429	0	
Bay Area AQMD	2025	LD1T	Aggregate	Gasoline	210963.542	2369520673	2369520673	0	324592067.8	0	92370.96	0	4.02%	361.3787	131903.21	5141.979347	0	0	
Bay Area AQMD	2025	LD1T	Aggregate	Diesel	101.404658	423379.7065	423379.7065	0	100117.6507	0	17.52092	0	0.00%	0.0646	23.57	0.975330419	0	0	
Bay Area AQMD	2025	LD1T	Aggregate	Electricity	748.541655	5068039.01	0	10688009.01	1270931.64	4123376.529	0	0.386083	0.02%	1.6288	594.52	0	229.5344444	0	
Bay Area AQMD	2025	LD1T	Aggregate	Plug-in Hybrid	381.90079	6245283.362	2710867.1	3534416.763	550848.5878	1067499.205	91.32188	0.30203	0.01%	0.9525	347.65	5.0838061	105.0018271	0	
Bay Area AQMD	2025	LD2T	Aggregate	Gasoline	116005.41	1411648895	1411648895	0	1798921236	0	365726.65	0	24.04%	2160.2790	789500.39	31492.09208	0	0	
Bay Area AQMD	2025	LD2T	Aggregate	Diesel	4448.58527	57602289.63	57602289.63	0	729031.729	0	1751.4933	0	0.10%	8.7800	3206.52	97.49791347	0	0	
Bay Area AQMD	2025	LD2T	Aggregate	Electricity	834.51792	9872026.29	0	9872826.29	14740807.35	38117166.62	0	0.386083	0.17%	15.0571	5495.86	0	2121.85992	0	
Bay Area AQMD	2025	LD2T	Aggregate	Plug-in Hybrid	9987.30551	154842951.4	70652928.32	84189575.07	14310285.59	254277460.92	2390.4812	0.30203	0.26%	23.6152	8819.56	133.0700163	2603.363774	0	
Bay Area AQMD	2025	LHD1	Aggregate	Gasoline	83403.4282	1021825307	1021825307	0	40610286.64	0	103716.41	0	1.73%	155.8399	56881.56	5773.542503	0	0	
Bay Area AQMD	2025	LHD1	Aggregate	Diesel	48154.9833	610813441.4	610813441.4	0	199718718.8	0	38204.849	0	1.04%	93.1190	34003.03	2126.734927	0	0	
Bay Area AQMD	2025	LHD1	Aggregate	Electricity	767.44483	1663994.2	0	1663994.2	3059532.596	10893744.61	0	0.654794	0.03%	2.3173	916.12	0	606.4178684	0	
Bay Area AQMD	2025	LHD2	Aggregate	Gasoline	10644.2016	129351453.3	129351453.3	0	52830919.94	0	14790.227	0	0.22%	19.2776	7200.56	823.3219618	0	0	
Bay Area AQMD	2025	LHD2	Aggregate	Diesel	20722.9275	265610478.5	265610478.5	0	85238553.1	0	19900.25	0	0.45%	40.5086	14785.64	1107.779726	0	0	
Bay Area AQMD	2025	LHD2	Aggregate	Electricity	197.190604	4061888.051	0	4061888.051	855941.8235	2619940.74	0	0.645006	0.01%	0.6195	226.11	0	145.842352	0	
Bay Area AQMD	2025	MDV	Aggregate	Gasoline	621736.57	7797484156	7797484156	0	1006103241	0	378043.07	0	13.23%	1189.2044	434059.61	21044.38076	0	0	
Bay Area AQMD	2025	MDV	Aggregate	Diesel	10093.3383	126411571.2	126411571.2	0	16261424.07	0	5067.9983	0	0.21%	19.7292	7098.91	282.1183479	0	0	
Bay Area AQMD	2025	MDV	Aggregate	Electricity	8800.93697	105161437.1	0	105161437.1	15681241.76	40600994.15	0	0.386083	0.18%	16.0383	5852.88	0	2360.120212	0	
Bay Area AQMD	2025	MDV	Aggregate	Plug-in Hybrid	6095.97346	42363319.13	49329426.38	8622806.425	14889957.02	1450.5102	0.30203	0.16%	13.9842	5104.23	80.74500228	1541.628215	2151.485152	0	

Category	Amount	Units
Diesel (heat content)	5.8	MMBtu/barrel
Motor Gasoline	5.25	MMBtu/barrel
Gallons per Barrel	4.1	gallons/barrel
		MMBtu/kWh

Source: The Climate Registry, 2011, 2012 Climate Registry Default Emission Factors, Table 21

<https://www.theclimateregistry.org/wp-content/uploads/2015/05/2011-Default-Emission-Factor-Document.pdf>

Category	Amount	Units
Project Mobile Energy		
Gallons/year, Diesel	3,714	Diesel
Gallons/year, Gasoline	114,908	Gasoline
kWh/year, Electricity	67,027	Electricity
Gallons/year, Gasoline, Plug-in Hybrid	1,144	Plug-in Hybrid
kWh/year, Electricity, Plug-in Hybrid	21,450	Plug-in Hybrid
Gallons/year, Natural Gas	-	Natural Gas
Barrels/year, Diesel	2,735.91	Barrels/year, Diesel
Barrels/year, Gasoline	27.23	Barrels/year, Gasoline
Barrels/year, Plug-in Hybrid	-	Barrels/year, Plug-in Hybrid
Barrels/year, Natural Gas	-	Barrels/year, Natural Gas
MMBtu, Diesel	513	MMBtu, Diesel
MMBtu, Gasoline	14,364	MMBtu, Gasoline
MMBtu, Electricity	228.71	MMBtu, Electricity
MMBtu, Plug-in Hybrid	216.07	MMBtu, Plug-in Hybrid
MMBtu, Natural Gas	-	MMBtu, Natural Gas
Total MMBtu, Transportation	15,321	MMBtu, Transportation

Table 3.5.4. Estimated Annual Energy Consumption for Proposed Project Operational Vehicle Travel			
	Gas Type	Value	Unit
Gross Project Energy Consumption			
	Diesel	3,714	
	Gasoline	116,092	
	Natural Gas	-	
	Electricity	88,457	

Note: kWh = kilowatt-hours; Mtu = thousand British thermal unit
Source: AECOM 2022