GAS OIL

Table 1. Potential Criteria Pollutant Emissions[1]

Emission Source	Units	Gas Turbines/HRSGs/Duct Burners Steady State Operation		Gas Turbines/HRSGs Startup/Shutdown		Auxiliary Boiler	Dewpoint Heater	Emergency Generator	Fire Pump	ULSD Tank	Total	Major Source Threshold	Major Source?	Attainment Status	Offsets/Allowances Required
Fuel Type		Natural Gas	ULSD	Natural Gas	ULSD	Natural Gas	Natural Gas	ULSD	ULSD						
Emission Controls		SCR/OC	SCR/OC	SCR/OC	SCR/OC	Ultra-Low NOx/FGR	Ultra-Low NOx/FGR								
Annual Operation (per unit)	hrs/yr	7,865	720	155	20	4,576	8,760	300	300						
Maximum Heat Input Per Unit (per Gas Turbine)	MMBtu/hr	3,393	3,507			140.6	15.0	19.5	2.1						
Maximum Heat Input Per Unit (per HRSG)	MMBtu/hr	721	0												
Maximum Power Output (total)	MW net	1,060	940												
Maximum Engine Output	Hp							2,682	315						
Proposed Emissions	per unit														
NOx	ppmvd@15%O2	2.0	5.0												
CO	ppmvd@15%O2	2.0	5.0												
VOC	ppmvd@15%O2	1.7	5.0												
CO2	~~lb/MW-hr~~	781	1,227												
SO2	lb/MMBtu	0.0012	0.0010												
PM/PM10/PM2.5	lb/MMBtu	0.0053	0.020												
Full Load Average Emission Rates	per unit														
NOx	lb/hr	24.90	66.60			1.55	0.16	32.23	1.88						
CO	lb/hr	15.10	41.75			10.55	1.85	1.77	0.47						
VOC	lb/hr	7.38	23.65			1.12	0.12	0.65	0.07						
CO2	lb/hr	339,000	577,000			16,591	1,770	3,206	349						
SO2	lb/hr	5.75	6.49			0.21	0.02	0.03	0.00						
PM/PM10/PM2.5	lb/hr	18.00	69.10			0.98	0.11	0.15	0.05						
Potential Emissions															
NOx	ton/yr	195.85	49.39	27.82	4.03	3.55	0.70	4.83	0.28	0.00	286.55	50	Yes	Ozone Nonattainment	344
CO	ton/yr	118.77	30.08	50.05	8.90	24.14	7.23	0.27	0.07	0.00	239.48	100	Yes	Attainment	NA
VOC	ton/yr	57.69	17.17	7.03	2.60	2.56	0.53	0.10	0.01	0.44	88.32	50	Yes	Ozone Nonattainment	106
CO2	ton/yr	3,138,251	415,440	13,002	3,592	37,980	7,753	481	52	0	3,616,592	100,000	Yes	No NAAQS	3,570,348
SO2	ton/yr	45.23	4.67	0.19	0.04	0.48	0.09	0.00	0.00	0.00	50.70	100	No	Attainment	NA
PM/PM10/PM2.5	ton/yr	141.58	49.75	1.64	1.09	2.24	0.48	0.02	0.01	0.00	196.81	100	Yes	Attainment	NA

*CARBON

[1] Based on preliminary project equipment specifications and emissions estimates. Equipment vendor selection, equipment specifications, and emission rates are subject to change as the project design advances.