



South Coast Air Quality Management District

21865 Copley Drive, Diamond Bar, CA 91765-4178
(909) 396-2000 • www.aqmd.gov

May 22, 2012

Mr. Gerardo Rios – sent via email (R9AirPermits_sc@epa.gov)
Chief – Permits Office
U. S. EPA, Region IX
75 Hawthorne Street, Air 3
San Francisco, CA 94105

Dear Mr. Rios:

Subject: Loma Linda University Medical Center (ID 800234) – Title V Permit
Revision

Loma Linda University Medical Center has proposed to revise their Title V permit under application no. 532404, by proposing to modify their incinerator. This proposed permit revision is considered as a “de minimis significant permit revision” to their Title V permit. Attached for your review is the permit evaluation and proposed Section D. With your receipt of the proposed Section D today, we will note that the EPA 45-day review period begins on May 22, 2012.

If you have any questions or need additional information regarding the proposed permit revision, please call Mr. Marcel Saulis at (909) 396-3093.

Very truly yours,

A handwritten signature in black ink, appearing to read 'Brian L. Yeh', is written over a faint, larger version of the same signature.

Brian L. Yeh
Senior Manager
Mechanical, Chemical and Public Services

BLY:AYL:JTY:MBS

Attachments

FACILITY PERMIT TO OPERATE LOMA LINDA UNIV

Facility Equipment and Requirements (Section D)

This section consists of a table listing all permitted equipment at the facility, facility wide requirements, all individual Permits to Construct and Permits to Operate issued to various equipment at the facility, and Rule 219-exempt equipment subject to source-specific requirements. Each permit and Rule 219-exempt equipment will list operating conditions including periodic monitoring requirements, and applicable emission limits and requirements that the equipment is subject to. Also included is the rule origin and authority of each emission limit and permit condition.

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PERMITTED EQUIPMENT LIST

THE FOLLOWING IS A LIST OF ALL PERMITS TO CONSTRUCT AND PERMITS TO OPERATE AT THIS FACILITY:

Application number	Permit to Operate number	Equipment description
139146	D03504	INCIN PATHOLOGICAL 51-100 LB/HR
144646	M56895	I C E (50-500 HP) EM ELEC GEN-DIESEL
176594	D09075	I C E (50-500 HP) EM ELEC GEN-DIESEL
277677	D71638	I C E (>500 HP) EM ELEC GEN DIESEL
277678	D71639	I C E (>500 HP) EM ELEC GEN DIESEL
334804	F10748	I C E (>500 HP) EM ELEC GEN DIESEL
334805	F10749	I C E (>500 HP) EM ELEC GEN DIESEL
435937	F73156	I C E (50-500 HP) EM ELEC GEN-DIESEL
456510	F81875	I C E (50-500 HP) EM ELEC GEN DIESEL
459899	F95797	BOILER (>20-50 MMBTU/HR) COMB GAS-DISTIL
478849	G3941	CREMATORY
480890	G3942	CREMATORY
480391	F99255	TURBINE ENGINE ≤ 50 MW NAT GAS - DIST
480393	F99256	TURBINE ENGINE ≤ 50 MW NAT GAS - DIST
494678	G7654	I C E (>500 HP) EM ELEC GEN-DIESEL
494679	G3943	I C E (50-500 HP) EM ELEC GEN-DIESEL
531846	TBD	INCIN PATHOLOGICAL 51-100 LB/HR

NOTE: EQUIPMENT LISTED ABOVE THAT HAVE NO CORRESPONDING PERMITS TO OPERATE NUMBER ARE ISSUED PERMITS TO CONSTRUCT. THE ISSUANCE OR DENIAL OF THEIR PERMITS TO OPERATE IS SUBJECT TO ENGINEERING FINAL REVIEW. ANY OTHER APPLICATIONS THAT ARE STILL BEING PROCESSED AND HAVE NOT BEEN ISSUED PERMITS TO CONSTRUCT OR PERMITS TO OPERATE WILL NOT BE FOUND IN THIS TITLE V PERMIT.

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FACILITY WIDE CONDITION(S)

Condition(s):

1. EXCEPT FOR OPEN ABRASIVE BLASTING OPERATIONS, THE OPERATOR SHALL NOT DISCHARGE INTO THE ATMOSPHERE FROM ANY SINGLE SOURCE OF EMISSIONS WHATSOEVER ANY AIR CONTAMINANT FOR A PERIOD OR PERIODS AGGREGATING MORE THAN THREE MINUTES IN ANY ONE HOUR WHICH IS:
 - A. AS DARK OR DARKER IN SHADE AS THAT DESIGNATED NO. 1 ON THE RINGELMANN CHART, AS PUBLISHED BY THE UNITED STATES BUREAU OF MINES; OR
 - B. OF SUCH OPACITY AS TO OBSCURE AN OBSERVER'S VIEW TO A DEGREE EQUAL TO OR GREATER THAN DOES SMOKE DESCRIBED IN SUBPARAGRAPH (A) OF THIS CONDITION.
[RULE 401]

2. THE OPERATOR SHALL NOT USE ANY DIESEL FUEL UNLESS THE FUEL IS LOW SULFUR DIESEL FOR WHICH THE SULFUR CONTENT SHALL NOT EXCEED 15 PPM BY WEIGHT AS SUPPLIED BY THE SUPPLIER.
[RULE 431.2, RULE 1470]

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Permit No. D03504
A/N 139146

Equipment Description:

INCINERATOR, PATHOLOGICAL, MULTIPLE CHAMBER, ECO LAIRE E.C.P. INC., MODEL 100 PWI, 100 POUNDS PER HOUR CAPACITY, 6' DIA X 8' H (PRIMARY CHAMBER), 4'-6" DIA X 8' L, SECONDARY CHAMBER WITH TWO 800,000 BTU/HR PRIMARY GAS BURNERS WITH A 1.3 HP UNDERFIRE BLOWER AND A 1,200,000 BTU PER HOUR SECONDARY GAS BURNER WITH A 3 HP BLOWER.

Conditions:

1. OPERATION OF THIS EQUIPMENT MUST BE CONDUCTED IN COMPLIANCE WITH ALL DATA AND SPECIFICATIONS SUBMITTED WITH THE APPLICATION UNDER WHICH THIS PERMIT IS ISSUED UNLESS OTHERWISE NOTED BELOW.
[RULE 204]
2. THIS EQUIPMENT MUST BE PROPERLY MAINTAINED AND KEPT IN GOOD OPERATING CONDITION AT ALL TIMES.
[RULE 204]
3. THIS EQUIPMENT SHALL NOT BURN ANY CHLORINATED MATERIALS, INCLUDING BUT NOT LIMITED TO PLASTICS, PACKAGING, TEXTILES, FABRIC, CONTAINERS, TUBING OR ANY OTHER GENERAL REFUSE THAT MAY CONTAIN, OR MAY BE CONTAMINATED WITH, CHLORINATED COMPOUNDS.
[RULE 1406]
4. THE TOTAL QUANTITY OF MATERIAL CHARGED TO THIS INCINERATOR SHALL NOT EXCEED 100 POUNDS PER HOUR OR 800 POUNDS PER DAY.
[RULE 1303(b)(2)-OFFSET]
5. A TEMPERATURE OF NOT LESS THAN 2000 DEGREES F SHALL BE MAINTAINED IN THE AFTERBURNER CHAMBER WHEN THE INCINERATOR IS IN OPERATION.
[RULE 1303(a)-BACT]
6. THE CHARGING DOOR SHALL REMAIN CLOSED EXCEPT DURING CHARGING.
[RULE 1303(a)-BACT]
7. THE PRIMARY GAS BURNER SHALL AUTOMATICALLY SHUT OFF WHEN THE CHARGING DOOR IS OPENED.
[RULE 1303(a)-BACT]
8. THE EQUIPMENT SHALL BE PROPERLY MAINTAINED AND KEPT IN GOOD OPERATING CONDITION AT ALL TIMES AND OPERATED BY PERSONNEL PROPERLY TRAINED IN ITS OPERATION.
[RULE 1303(a)-BACT]

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9. COMPLETE RECORDS OF THE AMOUNT OF MATERIAL PROCESSED PER DAY IN THIS INCINERATOR SHALL BE MAINTAINED IN A FORM APPROVED IN WRITING BY THE EXECUTIVE OFFICER. SUCH RECORDS SHALL BE MAINTAINED FOR A PERIOD OF NOT LESS THAN FIVE YEARS AND MADE AVAILABLE TO THE DISTRICT UPON REQUEST.
[RULE 1303(a)-BACT]
10. THIS UNIT SHALL OPERATE AS A CO-FIRED COMBUSTOR AND SHALL BE LIMITED TO BURNING MEDICAL/INFECTIOUS WASTE, AS DEFINED IN 40 CFR 62.14490, THAT IS LESS THAN 10 PERCENT OF THE WEIGHT OF WHICH IS COMPRISED, IN AGGREGATE, OF THE MATERIAL BURNED IN THE INCINERATOR. THE PERCENTAGE SHALL BE MEASURED ON A CALENDAR QUARTER BASIS.
[40 CFR SUBPART Ce]
11. THE FACILITY SHALL MAINTAIN RECORDS ON A CALENDAR QUARTER BASIS OF THE WEIGHT OF MATERIAL PROCESSED AND THE WEIGHT OF THE MEDICAL/INFECTIOUS WASTE COMBUSTED TO DEMONSTRATE THAT THE UNIT CONTINUES TO MEET THE DEFINITION OF A CO-FIRED COMBUSTOR IN 40 CFR 62.14490.
[40 CFR SUBPART Ce]
12. THIS EQUIPMENT SHALL COMPLY WITH RULE 1147.
[RULE 1147]

Periodic Monitoring:

10. THE OPERATOR SHALL CONDUCT AN INSPECTION FOR VISIBLE EMISSIONS FROM ALL STACKS AND OTHER EMISSION POINTS OF THIS EQUIPMENT WHENEVER THERE IS A PUBLIC COMPLAINT OF VISIBLE EMISSIONS, WHENEVER VISIBLE EMISSIONS ARE OBSERVED, AND ON A MONTHLY BASIS, AT LEAST, UNLESS THE EQUIPMENT DID NOT OPERATE DURING THE ENTIRE MONTHLY PERIOD. THE ROUTINE MONTHLY INSPECTION SHALL BE CONDUCTED WHILE THE EQUIPMENT IS IN OPERATION AND DURING DAYLIGHT HOURS. IF ANY VISIBLE EMISSIONS (NOT INCLUDING CONDENSED WATER VAPOR) ARE DETECTED THAT LAST MORE THAN THREE MINUTES IN ANY ONE-HOUR, THE OPERATOR SHALL EITHER:
 - A. VERIFY AND CERTIFY WITHIN 24 HOURS THAT THE EQUIPMENT CAUSING THE EMISSION AND ANY ASSOCIATED AIR POLLUTION CONTROL EQUIPMENT ARE OPERATING NORMALLY ACCORDING TO THEIR DESIGN AND STANDARD PROCEDURES AND UNDER THE SAME CONDITIONS UNDER WHICH COMPLIANCE WAS ACHIEVED IN THE PAST;
 - B. TAKE CORRECTIVE ACTION(S) THAT ELIMINATES THE VISIBLE EMISSIONS WITHIN 24 HOURS AND REPORT THE VISIBLE EMISSIONS AS A POTENTIAL DEVIATION IN ACCORDANCE WITH THE REPORTING REQUIREMENTS IN SECTION K OF THIS PERMIT; OR
 - C. HAVE A CARB-CERTIFIED SMOKE READER DETERMINE COMPLIANCE WITH THE OPACITY STANDARD, USING EPA METHOD 9 OR THE PROCEDURES IN THE CARB MANUAL "VISIBLE EMISSION EVALUATION", WITHIN THREE BUSINESS DAYS AND REPORT ANY DEVIATIONS TO AQMD.
- THE OPERATOR SHALL KEEP THE RECORDS IN ACCORDANCE WITH THE RECORDKEEPING REQUIREMENTS IN SECTION K OF THIS PERMIT AND THE FOLLOWING RECORDS:
- A. STACK OR EMISSION POINT IDENTIFICATION;
 - B. DESCRIPTION OF ANY CORRECTIVE ACTIONS TAKEN TO ABATE VISIBLE EMISSIONS;
 - C. DATE AND TIME VISIBLE EMISSION WAS ABATED; AND

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D. VISIBLE EMISSION OBSERVATION RECORDED BY A CERTIFIED SMOKE READER.
[RULE 3004 (a)(4)]

Emissions And Requirements:

11. THIS EQUIPMENT IS SUBJECT TO THE APPLICABLE REQUIREMENTS OF THE FOLLOWING RULES AND REGULATIONS:

PM: 0.1 GR/SCF RULE 473
CO: 2000 PPMV, RULE 407
SOX: 500 PPMV, RULE 407
PM: 0.1 GR/SCF, RULE 409
PM: RULE 404, SEE APPENDIX B FOR EMISSION LIMITS

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PERMIT TO OPERATE

Permit No. M56895
A/N 144646

Equipment Description:

EMERGENCY ELECTRIC POWER GENERATION SYSTEM CONSISTING OF:

1. DIESEL ENGINE, CATERPILLAR 3516-STD, S/N 2520076, 2520 HP, WITH TURBOCHARGER, AFTERCOOLED SYSTEM, AND RETARD IGNITION.
2. ELECTRIC GENERATOR, CATERPILLAR 3516, 1759 K.W. STANDBY RATING.

Conditions:

1. OPERATION OF THIS EQUIPMENT MUST BE CONDUCTED IN COMPLIANCE WITH ALL DATA AND SPECIFICATIONS SUBMITTED WITH THE APPLICATION UNDER WHICH THIS PERMIT IS ISSUED UNLESS OTHERWISE NOTED BELOW.
[RULE 204]
2. THIS EQUIPMENT MUST BE PROPERLY MAINTAINED AND KEPT IN GOOD OPERATING CONDITION AT ALL TIMES.
[RULE 204]
3. THIS ENGINE SHALL NOT BE OPERATED MORE THAN 200 HOURS IN A YEAR WHICH INCLUDES NO MORE THAN 30 HOURS FOR PERFORMANCE AND MAINTENANCE TESTING.
[RULE 1304(a)-MODELING AND OFFSET, RULE 1110.2, RULE 1470]
4. OPERATION BEYOND THE 30 HOURS PER YEAR ALLOTTED FOR ENGINE MAINTENANCE AND TESTING SHALL BE ALLOWED ONLY IN THE EVENT OF A LOSS OF GRID POWER OR UP TO 30 MINUTES PRIOR TO A ROTATING OUTAGE, PROVIDED THAT THE UTILITY DISTRIBUTION COMPANY HAS ORDERED ROTATING OUTAGES IN THE CONTROL AREA WHERE THE ENGINE IS LOCATED OR HAS INDICATED THAT IT EXPECTS TO ISSUE SUCH AN ORDER AT A CERTAIN TIME, AND THE ENGINE IS LOCATED IN A UTILITY SERVICE BLOCK THAT IS SUBJECT TO THE ROTATING OUTAGE. ENGINE OPERATION SHALL BE TERMINATED IMMEDIATELY AFTER THE UTILITY DISTRIBUTION COMPANY ADVISES THAT A ROTATING OUTAGE IS NO LONGER IMMINENT OR IN EFFECT.
[RULE 1304(a)-MODELING AND OFFSET, RULE 1110.2, RULE 1470]
5. AN ENGINE OPERATING LOG SHALL BE KEPT AND MAINTAINED ON FILE TO RECORD WHEN THIS ENGINE IS STARTED MANUALLY. THE LOG SHALL LIST THE DATE OF OPERATION, THE TIMER READING IN HOURS AT THE BEGINNING AND END OF OPERATION, AND THE REASON FOR OPERATION OF THIS ENGINE. THE LOG SHALL BE KEPT FOR A MINIMUM OF FIVE CALENDAR YEARS PRIOR TO THE CURRENT YEAR AND MADE AVAILABLE TO DISTRICT PERSONNEL UPON REQUEST. THE TOTAL HOURS OF OPERATION (BOTH MANUAL AND AUTOMATIC) FOR THE PREVIOUS CALENDAR YEAR SHALL BE RECORDED ANYTIME DURING THE FIRST 15 DAYS OF JANUARY OF EACH YEAR.
[RULE 1303(b)(2)-OFFSET, RULE 1110.2, RULE 1470]

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6. THIS ENGINE SHALL COMPLY WITH RULE 1470.
[RULE 1470]

Periodic Monitoring:

7. THE OPERATOR SHALL INSTALL AND MAINTAIN A NON-RESETTING ELAPSED TIME METER TO ACCURATELY INDICATE THE ELAPSED OPERATING TIME OF THE ENGINE.
[RULE 3004 (a)(4)]

Emissions And Requirements:

8. THIS EQUIPMENT IS SUBJECT TO THE APPLICABLE REQUIREMENTS OF THE FOLLOWING RULES AND REGULATIONS:
PM: RULE 404, SEE APPENDIX B FOR EMISSION LIMITS

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PERMIT TO OPERATE

Permit No. D09075
A/N 176594

Equipment Description:

INTERNAL COMBUSTION ENGINE, GM DIESEL, DIESEL FUELED, EMERGENCY ELECTRICAL GENERATION, MODEL NO. 7163-7000 SERIAL NO. 16VA1331, 16 CYLINDERS, TWO CYCLE, NATURALLY ASPIRATED, 466 BHP, WITH ONE EXHAUST.

Conditions:

1. OPERATION OF THIS EQUIPMENT MUST BE CONDUCTED IN COMPLIANCE WITH ALL DATA AND SPECIFICATIONS SUBMITTED WITH THE APPLICATION UNDER WHICH THIS PERMIT IS ISSUED UNLESS OTHERWISE NOTED BELOW.
[RULE 204]
2. THIS EQUIPMENT MUST BE PROPERLY MAINTAINED AND KEPT IN GOOD OPERATING CONDITION AT ALL TIMES.
[RULE 204]
3. THE IGNITION TIMING OF THIS ENGINE MUST BE INSPECTED, ADJUSTED, AND CERTIFIED, AT A MINIMUM, ONCE EVERY THREE YEARS OF OPERATION. INSPECTIONS, ADJUSTMENTS, AND CERTIFICATIONS MUST BE PERFORMED BY A QUALIFIED MECHANIC AND ACCORDING TO THE ENGINE MANUFACTURER'S PROCEDURES.
[RULE 1303(a)(1)-BACT]
4. THIS ENGINE SHALL NOT BE OPERATED MORE THAN 200 HOURS IN A YEAR WHICH INCLUDES NO MORE THAN 30 HOURS FOR PERFORMANCE AND MAINTENANCE TESTING.
[RULE 1304(a)-MODELING AND OFFSET, RULE 1110.2, RULE 1470]
5. OPERATION BEYOND THE 30 HOURS PER YEAR ALLOTTED FOR ENGINE MAINTENANCE AND TESTING SHALL BE ALLOWED ONLY IN THE EVENT OF A LOSS OF GRID POWER OR UP TO 30 MINUTES PRIOR TO A ROTATING OUTAGE, PROVIDED THAT THE UTILITY DISTRIBUTION COMPANY HAS ORDERED ROTATING OUTAGES IN THE CONTROL AREA WHERE THE ENGINE IS LOCATED OR HAS INDICATED THAT IT EXPECTS TO ISSUE SUCH AN ORDER AT A CERTAIN TIME, AND THE ENGINE IS LOCATED IN A UTILITY SERVICE BLOCK THAT IS SUBJECT TO THE ROTATING OUTAGE. ENGINE OPERATION SHALL BE TERMINATED IMMEDIATELY AFTER THE UTILITY DISTRIBUTION COMPANY ADVISES THAT A ROTATING OUTAGE IS NO LONGER IMMINENT OR IN EFFECT.
[RULE 1304(a)-MODELING AND OFFSET, RULE 1110.2, RULE 1470]
6. AN ENGINE OPERATING LOG SHALL BE KEPT AND MAINTAINED ON FILE TO RECORD WHEN THIS ENGINE IS STARTED MANUALLY. THE LOG SHALL LIST THE DATE OF OPERATION, THE TIMER READING IN HOURS AT THE BEGINNING AND END OF OPERATION, AND THE REASON FOR OPERATION OF THIS ENGINE. THE LOG SHALL BE KEPT FOR A MINIMUM OF FIVE CALENDAR YEARS PRIOR TO THE CURRENT YEAR AND MADE AVAILABLE TO DISTRICT

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PERSONNEL UPON REQUEST. THE TOTAL HOURS OF OPERATION (BOTH MANUAL AND AUTOMATIC) FOR THE PREVIOUS CALENDAR YEAR SHALL BE RECORDED ANYTIME DURING THE FIRST 15 DAYS OF JANUARY OF EACH YEAR.
[RULE 1303(b)(2)-OFFSET, RULE 1110.2, RULE 1470]

7. THIS ENGINE SHALL COMPLY WITH RULE 1470.
[RULE 1470]

Periodic Monitoring:

8. THE OPERATOR SHALL INSTALL AND MAINTAIN A NON-RESETTABLE ELAPSED TIME METER TO ACCURATELY INDICATE THE ELAPSED OPERATING TIME OF THE ENGINE.
[RULE 3004 (a)(4)]

Emissions And Requirements:

9. THIS EQUIPMENT IS SUBJECT TO THE APPLICABLE REQUIREMENTS OF THE FOLLOWING RULES AND REGULATIONS:
PM: RULE 404, SEE APPENDIX B FOR EMISSION LIMITS

FACILITY PERMIT TO OPERATE LOMA LINDA UNIV

PERMIT TO OPERATE

Permit No. D71638
A/N 277677

Equipment Description:

INTERNAL COMBUSTION ENGINE, CATERPILLAR, MODEL NO. 3508, SERIAL NO. 23Z01443, DIESEL FUELED, EMERGENCY, ELECTRICAL GENERATOR DRIVER, TURBOCHARGED, AFTERCOOLED, 8 CYLINDERS, 1344 BHP.

Conditions:

1. OPERATION OF THIS EQUIPMENT MUST BE CONDUCTED IN COMPLIANCE WITH ALL DATA AND SPECIFICATIONS SUBMITTED WITH THE APPLICATION UNDER WHICH THIS PERMIT IS ISSUED UNLESS OTHERWISE NOTED BELOW.
[RULE 204]
2. THIS EQUIPMENT MUST BE PROPERLY MAINTAINED AND KEPT IN GOOD OPERATING CONDITION AT ALL TIMES.
[RULE 204]
3. THIS ENGINE SHALL NOT BE OPERATED MORE THAN 200 HOURS IN A YEAR WHICH INCLUDES NO MORE THAN 30 HOURS FOR PERFORMANCE AND MAINTENANCE TESTING.
[RULE 1304(a)-MODELING AND OFFSET, RULE 1110.2, RULE 1470]
4. OPERATION BEYOND THE 30 HOURS PER YEAR ALLOTTED FOR ENGINE MAINTENANCE AND TESTING SHALL BE ALLOWED ONLY IN THE EVENT OF A LOSS OF GRID POWER OR UP TO 30 MINUTES PRIOR TO A ROTATING OUTAGE, PROVIDED THAT THE UTILITY DISTRIBUTION COMPANY HAS ORDERED ROTATING OUTAGES IN THE CONTROL AREA WHERE THE ENGINE IS LOCATED OR HAS INDICATED THAT IT EXPECTS TO ISSUE SUCH AN ORDER AT A CERTAIN TIME, AND THE ENGINE IS LOCATED IN A UTILITY SERVICE BLOCK THAT IS SUBJECT TO THE ROTATING OUTAGE. ENGINE OPERATION SHALL BE TERMINATED IMMEDIATELY AFTER THE UTILITY DISTRIBUTION COMPANY ADVISES THAT A ROTATING OUTAGE IS NO LONGER IMMINENT OR IN EFFECT.
[RULE 1304(a)-MODELING AND OFFSET, RULE 1110.2, RULE 1470]
5. AN ENGINE OPERATING LOG SHALL BE KEPT AND MAINTAINED ON FILE TO RECORD WHEN THIS ENGINE IS STARTED MANUALLY. THE LOG SHALL LIST THE DATE OF OPERATION, THE TIMER READING IN HOURS AT THE BEGINNING AND END OF OPERATION, AND THE REASON FOR OPERATION OF THIS ENGINE. THE LOG SHALL BE KEPT FOR A MINIMUM OF FIVE CALENDAR YEARS PRIOR TO THE CURRENT YEAR AND MADE AVAILABLE TO DISTRICT PERSONNEL UPON REQUEST. THE TOTAL HOURS OF OPERATION (BOTH MANUAL AND AUTOMATIC) FOR THE PREVIOUS CALENDAR YEAR SHALL BE RECORDED ANYTIME DURING THE FIRST 15 DAYS OF JANUARY OF EACH YEAR.
[RULE 1303(b)(2)-OFFSET, RULE 1110.2, RULE 1470]
6. THIS ENGINE SHALL COMPLY WITH RULE 1470.
[RULE 1470]

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7. THE FUEL INJECTION TIMING OF THIS ENGINE SHALL BE SET AND MAINTAINED AT 4 DEGREES RETARDED RELATIVE TO STANDARD TIMING.
[RULE 1303(a)(1)-BACT]

Periodic Monitoring:

8. THE OPERATOR SHALL INSTALL AND MAINTAIN A NON-RESETTABLE ELAPSED TIME METER TO ACCURATELY INDICATE THE ELAPSED OPERATING TIME OF THE ENGINE.
[RULE 3004 (a)(4)]

Emissions And Requirements:

9. THIS EQUIPMENT IS SUBJECT TO THE APPLICABLE REQUIREMENTS OF THE FOLLOWING RULES AND REGULATIONS:
PM: RULE 404, SEE APPENDIX B FOR EMISSION LIMITS

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PERMIT TO OPERATE

Permit No. D71639
A/N 277678

Equipment Description:

INTERNAL COMBUSTION ENGINE, CATERPILLAR, MODEL NO. 3508, SERIAL NO. 23Z01442, DIESEL FUELED, EMERGENCY, ELECTRICAL GENERATOR DRIVER, TURBOCHARGED, AFTERCOOLED, 8 CYLINDERS, 1344 BHP.

Conditions:

1. OPERATION OF THIS EQUIPMENT MUST BE CONDUCTED IN COMPLIANCE WITH ALL DATA AND SPECIFICATIONS SUBMITTED WITH THE APPLICATION UNDER WHICH THIS PERMIT IS ISSUED UNLESS OTHERWISE NOTED BELOW.
[RULE 204]
2. THIS EQUIPMENT MUST BE PROPERLY MAINTAINED AND KEPT IN GOOD OPERATING CONDITION AT ALL TIMES.
[RULE 204]
3. THIS ENGINE SHALL NOT BE OPERATED MORE THAN 200 HOURS IN A YEAR WHICH INCLUDES NO MORE THAN 30 HOURS FOR PERFORMANCE AND MAINTENANCE TESTING.
[RULE 1304(a)-MODELING AND OFFSET, RULE 1110.2, RULE 1470]
4. OPERATION BEYOND THE 30 HOURS PER YEAR ALLOTTED FOR ENGINE MAINTENANCE AND TESTING SHALL BE ALLOWED ONLY IN THE EVENT OF A LOSS OF GRID POWER OR UP TO 30 MINUTES PRIOR TO A ROTATING OUTAGE, PROVIDED THAT THE UTILITY DISTRIBUTION COMPANY HAS ORDERED ROTATING OUTAGES IN THE CONTROL AREA WHERE THE ENGINE IS LOCATED OR HAS INDICATED THAT IT EXPECTS TO ISSUE SUCH AN ORDER AT A CERTAIN TIME, AND THE ENGINE IS LOCATED IN A UTILITY SERVICE BLOCK THAT IS SUBJECT TO THE ROTATING OUTAGE. ENGINE OPERATION SHALL BE TERMINATED IMMEDIATELY AFTER THE UTILITY DISTRIBUTION COMPANY ADVISES THAT A ROTATING OUTAGE IS NO LONGER IMMINENT OR IN EFFECT.
[RULE 1304(a)-MODELING AND OFFSET, RULE 1110.2, RULE 1470]
5. AN ENGINE OPERATING LOG SHALL BE KEPT AND MAINTAINED ON FILE TO RECORD WHEN THIS ENGINE IS STARTED MANUALLY. THE LOG SHALL LIST THE DATE OF OPERATION, THE TIMER READING IN HOURS AT THE BEGINNING AND END OF OPERATION, AND THE REASON FOR OPERATION OF THIS ENGINE. THE LOG SHALL BE KEPT FOR A MINIMUM OF FIVE CALENDAR YEARS PRIOR TO THE CURRENT YEAR AND MADE AVAILABLE TO DISTRICT PERSONNEL UPON REQUEST. THE TOTAL HOURS OF OPERATION (BOTH MANUAL AND AUTOMATIC) FOR THE PREVIOUS CALENDAR YEAR SHALL BE RECORDED ANYTIME DURING THE FIRST 15 DAYS OF JANUARY OF EACH YEAR.
[RULE 1303(b)(2)-OFFSET, RULE 1110.2, RULE 1470]
6. THIS ENGINE SHALL COMPLY WITH RULE 1470.
[RULE 1470]

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7. THE FUEL INJECTION TIMING OF THIS ENGINE SHALL BE SET AND MAINTAINED AT 4 DEGREES RETARDED RELATIVE TO STANDARD TIMING.
[RULE 1303(a)(1)-BACT]

Periodic Monitoring:

8. THE OPERATOR SHALL INSTALL AND MAINTAIN A NON-RESETTABLE ELAPSED TIME METER TO ACCURATELY INDICATE THE ELAPSED OPERATING TIME OF THE ENGINE.
[RULE 3004 (a)(4)]

Emissions And Requirements:

9. THIS EQUIPMENT IS SUBJECT TO THE APPLICABLE REQUIREMENTS OF THE FOLLOWING RULES AND REGULATIONS:
PM: RULE 404, SEE APPENDIX B FOR EMISSION LIMITS

FACILITY PERMIT TO OPERATE LOMA LINDA UNIV

PERMIT TO OPERATE

Permit No. F10748
A/N 334804

Equipment Description:

INTERNAL COMBUSTION ENGINE, CATERPILLAR, MODEL NO. 3508 DITA (900 KW), SERIAL NO. 23Z07043, 8 CYLINDERS, TURBOCHARGED, AFTERCOOLED, 1337 BHP, DIESEL FUELED, DRIVING AN EMERGENCY ELECTRICAL GENERATOR.

Conditions:

1. OPERATION OF THIS EQUIPMENT MUST BE CONDUCTED IN COMPLIANCE WITH ALL DATA AND SPECIFICATIONS SUBMITTED WITH THE APPLICATION UNDER WHICH THIS PERMIT IS ISSUED UNLESS OTHERWISE NOTED BELOW.
[RULE 204]
2. THIS EQUIPMENT MUST BE PROPERLY MAINTAINED AND KEPT IN GOOD OPERATING CONDITION AT ALL TIMES.
[RULE 204]
3. THIS ENGINE SHALL NOT BE OPERATED MORE THAN 200 HOURS IN A YEAR WHICH INCLUDES NO MORE THAN 50 HOURS FOR PERFORMANCE AND MAINTENANCE TESTING.
[RULE 1304(a)-MODELING AND OFFSET, RULE 1110.2, RULE 1470]
4. OPERATION BEYOND THE 50 HOURS PER YEAR ALLOTTED FOR ENGINE MAINTENANCE AND TESTING SHALL BE ALLOWED ONLY IN THE EVENT OF A LOSS OF GRID POWER OR UP TO 50 MINUTES PRIOR TO A ROTATING OUTAGE, PROVIDED THAT THE UTILITY DISTRIBUTION COMPANY HAS ORDERED ROTATING OUTAGES IN THE CONTROL AREA WHERE THE ENGINE IS LOCATED OR HAS INDICATED THAT IT EXPECTS TO ISSUE SUCH AN ORDER AT A CERTAIN TIME, AND THE ENGINE IS LOCATED IN A UTILITY SERVICE BLOCK THAT IS SUBJECT TO THE ROTATING OUTAGE. ENGINE OPERATION SHALL BE TERMINATED IMMEDIATELY AFTER THE UTILITY DISTRIBUTION COMPANY ADVISES THAT A ROTATING OUTAGE IS NO LONGER IMMINENT OR IN EFFECT.
[RULE 1304(a)-MODELING AND OFFSET, RULE 1110.2, RULE 1470]
5. AN ENGINE OPERATING LOG SHALL BE KEPT AND MAINTAINED ON FILE TO RECORD WHEN THIS ENGINE IS STARTED MANUALLY. THE LOG SHALL LIST THE DATE OF OPERATION, THE TIMER READING IN HOURS AT THE BEGINNING AND END OF OPERATION, AND THE REASON FOR OPERATION OF THIS ENGINE. THE LOG SHALL BE KEPT FOR A MINIMUM OF FIVE CALENDAR YEARS PRIOR TO THE CURRENT YEAR AND MADE AVAILABLE TO DISTRICT PERSONNEL UPON REQUEST. THE TOTAL HOURS OF OPERATION (BOTH MANUAL AND AUTOMATIC) FOR THE PREVIOUS CALENDAR YEAR SHALL BE RECORDED ANYTIME DURING THE FIRST 15 DAYS OF JANUARY OF EACH YEAR.
[RULE 1303(b)(2)-OFFSET, RULE 1110.2, RULE 1470]
6. THIS ENGINE SHALL COMPLY WITH RULE 1470.
[RULE 1470]

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7. THE FUEL INJECTION TIMING OF THIS ENGINE SHALL BE SET AND MAINTAINED AT 4 DEGREES RETARDED RELATIVE TO PRODUCTION TIMING AS ESTABLISHED BY CATERPILLAR IN PRODUCT NEWS BULLETIN REQUIREMENTS TO COMPLY WITH SCAQMD CERTIFIED EQUIPMENT.
[RULE 1303(a)(1)-BACT]

Periodic Monitoring:

8. THE OPERATOR SHALL INSTALL AND MAINTAIN A NON-RESETTABLE ELAPSED TIME METER TO ACCURATELY INDICATE THE ELAPSED OPERATING TIME OF THE ENGINE.
[RULE 3004 (a)(4)]

Emissions And Requirements:

9. THIS EQUIPMENT IS SUBJECT TO THE APPLICABLE REQUIREMENTS OF THE FOLLOWING RULES AND REGULATIONS:
PM: RULE 404, SEE APPENDIX B FOR EMISSION LIMITS

FACILITY PERMIT TO OPERATE LOMA LINDA UNIV

PERMIT TO OPERATE

Permit No. F10749
A/N 334805

Equipment Description:

INTERNAL COMBUSTION ENGINE, CATERPILLAR, MODEL NO. 3508 DITA (900 KW), SERIAL NO. 23Z07079, 8 CYLINDERS, TURBOCHARGED, AFTERCOOLED, 1337 BHP, DIESEL FUELED, DRIVING AN EMERGENCY ELECTRICAL GENERATOR.

Conditions:

1. OPERATION OF THIS EQUIPMENT MUST BE CONDUCTED IN COMPLIANCE WITH ALL DATA AND SPECIFICATIONS SUBMITTED WITH THE APPLICATION UNDER WHICH THIS PERMIT IS ISSUED UNLESS OTHERWISE NOTED BELOW.
[RULE 204]
2. THIS EQUIPMENT MUST BE PROPERLY MAINTAINED AND KEPT IN GOOD OPERATING CONDITION AT ALL TIMES.
[RULE 204]
3. THIS ENGINE SHALL NOT BE OPERATED MORE THAN 200 HOURS IN A YEAR WHICH INCLUDES NO MORE THAN 50 HOURS FOR PERFORMANCE AND MAINTENANCE TESTING.
[RULE 1304(a)-MODELING AND OFFSET, RULE 1110.2, RULE 1470]
4. OPERATION BEYOND THE 50 HOURS PER YEAR ALLOTTED FOR ENGINE MAINTENANCE AND TESTING SHALL BE ALLOWED ONLY IN THE EVENT OF A LOSS OF GRID POWER OR UP TO 50 MINUTES PRIOR TO A ROTATING OUTAGE, PROVIDED THAT THE UTILITY DISTRIBUTION COMPANY HAS ORDERED ROTATING OUTAGES IN THE CONTROL AREA WHERE THE ENGINE IS LOCATED OR HAS INDICATED THAT IT EXPECTS TO ISSUE SUCH AN ORDER AT A CERTAIN TIME, AND THE ENGINE IS LOCATED IN A UTILITY SERVICE BLOCK THAT IS SUBJECT TO THE ROTATING OUTAGE. ENGINE OPERATION SHALL BE TERMINATED IMMEDIATELY AFTER THE UTILITY DISTRIBUTION COMPANY ADVISES THAT A ROTATING OUTAGE IS NO LONGER IMMINENT OR IN EFFECT.
[RULE 1304(a)-MODELING AND OFFSET, RULE 1110.2, RULE 1470]
5. AN ENGINE OPERATING LOG SHALL BE KEPT AND MAINTAINED ON FILE TO RECORD WHEN THIS ENGINE IS STARTED MANUALLY. THE LOG SHALL LIST THE DATE OF OPERATION, THE TIMER READING IN HOURS AT THE BEGINNING AND END OF OPERATION, AND THE REASON FOR OPERATION OF THIS ENGINE. THE LOG SHALL BE KEPT FOR A MINIMUM OF FIVE CALENDAR YEARS PRIOR TO THE CURRENT YEAR AND MADE AVAILABLE TO DISTRICT PERSONNEL UPON REQUEST. THE TOTAL HOURS OF OPERATION (BOTH MANUAL AND AUTOMATIC) FOR THE PREVIOUS CALENDAR YEAR SHALL BE RECORDED ANYTIME DURING THE FIRST 15 DAYS OF JANUARY OF EACH YEAR.
[RULE 1303(b)(2)-OFFSET, RULE 1110.2, RULE 1470]
6. THIS ENGINE SHALL COMPLY WITH RULE 1470.
[RULE 1470]

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7. THE FUEL INJECTION TIMING OF THIS ENGINE SHALL BE SET AND MAINTAINED AT 4 DEGREES RETARDED RELATIVE TO PRODUCTION TIMING AS ESTABLISHED BY CATERPILLAR IN PRODUCT NEWS BULLETIN REQUIREMENTS TO COMPLY WITH SCAQMD CERTIFIED EQUIPMENT.
[RULE 1303(a)(1)-BACT]

Periodic Monitoring:

8. THE OPERATOR SHALL INSTALL AND MAINTAIN A NON-RESETTABLE ELAPSED TIME METER TO ACCURATELY INDICATE THE ELAPSED OPERATING TIME OF THE ENGINE.
[RULE 3004 (a)(4)]

Emissions And Requirements:

9. THIS EQUIPMENT IS SUBJECT TO THE APPLICABLE REQUIREMENTS OF THE FOLLOWING RULES AND REGULATIONS:
PM: RULE 404, SEE APPENDIX B FOR EMISSION LIMITS

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PERMIT TO CONSTRUCT/OPERATE

**Permit No. F73156
A/N 435937**

Equipment Description:

(located at Del Webb Library)

INTERNAL COMBUSTION ENGINE, PERKINS, DIESEL-FUELED, EMERGENCY ELECTRICAL GENERATION, MODEL NO. GCD325, TURBOCHARGED, AFTERCOOLED, 6 CYCLINDERS, FOUR CYCLE, 325 BHP.

Conditions:

1. OPERATION OF THIS EQUIPMENT MUST BE CONDUCTED IN COMPLIANCE WITH ALL DATA AND SPECIFICATIONS SUBMITTED WITH THE APPLICATION UNDER WHICH THIS PERMIT IS ISSUED UNLESS OTHERWISE NOTED BELOW.
[RULE 204]
2. THIS EQUIPMENT MUST BE PROPERLY MAINTAINED AND KEPT IN GOOD OPERATING CONDITION AT ALL TIMES.
[RULE 204]
3. THIS ENGINE SHALL NOT BE OPERATED MORE THAN 200 HOURS IN A YEAR WHICH INCLUDES NO MORE THAN 50 HOURS FOR PERFORMANCE AND MAINTENANCE TESTING.
[RULE 1304(a)-MODELING AND OFFSET, RULE 1110.2, RULE 1470]
4. OPERATION BEYOND THE 50 HOURS PER YEAR ALLOTTED FOR ENGINE MAINTENANCE AND TESTING SHALL BE ALLOWED ONLY IN THE EVENT OF A LOSS OF GRID POWER OR UP TO 50 MINUTES PRIOR TO A ROTATING OUTAGE, PROVIDED THAT THE UTILITY DISTRIBUTION COMPANY HAS ORDERED ROTATING OUTAGES IN THE CONTROL AREA WHERE THE ENGINE IS LOCATED OR HAS INDICATED THAT IT EXPECTS TO ISSUE SUCH AN ORDER AT A CERTAIN TIME, AND THE ENGINE IS LOCATED IN A UTILITY SERVICE BLOCK THAT IS SUBJECT TO THE ROTATING OUTAGE. ENGINE OPERATION SHALL BE TERMINATED IMMEDIATELY AFTER THE UTILITY DISTRIBUTION COMPANY ADVISES THAT A ROTATING OUTAGE IS NO LONGER IMMINENT OR IN EFFECT.
[RULE 1304(a)-MODELING AND OFFSET, RULE 1110.2, RULE 1470]
5. AN ENGINE OPERATING LOG SHALL BE KEPT AND MAINTAINED ON FILE TO RECORD WHEN THIS ENGINE IS STARTED MANUALLY. THE LOG SHALL LIST THE DATE OF OPERATION, THE TIMER READING IN HOURS AT THE BEGINNING AND END OF OPERATION, AND THE REASON FOR OPERATION OF THIS ENGINE. THE LOG SHALL BE KEPT FOR A MINIMUM OF FIVE CALENDAR YEARS PRIOR TO THE CURRENT YEAR AND MADE AVAILABLE TO DISTRICT PERSONNEL UPON REQUEST. THE TOTAL HOURS OF OPERATION (BOTH MANUAL AND AUTOMATIC) FOR THE PREVIOUS CALENDAR YEAR SHALL BE RECORDED ANYTIME DURING THE FIRST 15 DAYS OF JANUARY OF EACH YEAR.
[RULE 1303(b)(2)-OFFSET, RULE 1110.2, RULE 1470]

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6. THIS ENGINE SHALL COMPLY WITH RULE 1470.
[RULE 1470]

Periodic Monitoring:

7. THE OPERATOR SHALL INSTALL AND MAINTAIN A NON-RESETTABLE ELAPSED TIME METER TO ACCURATELY INDICATE THE ELAPSED OPERATING TIME OF THE ENGINE.
[RULE 3004 (a)(4)]

Emissions And Requirements:

8. THIS EQUIPMENT IS SUBJECT TO THE APPLICABLE REQUIREMENTS OF THE FOLLOWING RULES AND REGULATIONS:

CO: 2.6 GRAMS/BHP-HR, RULE 1303(a)(1)-BACT
NO_x + NMHC: 4.8 GRAMS/BHP-HR, RULE 1303(a)(1)-BACT
PM: 0.15 GRAM/BHP-HR, RULE 1303(a)(1)-BACT
PM: RULE 404, SEE APPENDIX B FOR EMISSION LIMITS

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PERMIT TO OPERATE

**Permit No. F81875
A/N 456510**

Equipment Description:

INTERNAL COMBUSTION ENGINE, CATERPILLAR, MODEL NO. 3306 ATAAC, DIESEL-FUELED, EMERGENCY ELECTRICAL GENERATION, TURBOCHARGED, AFTERCOOLED, 377 BHP.

Conditions:

1. OPERATION OF THIS EQUIPMENT SHALL BE CONDUCTED IN ACCORDANCE WITH ALL DATA AND SPECIFICATIONS SUBMITTED WITH THE APPLICATION UNDER WHICH THIS PERMIT IS ISSUED UNLESS OTHERWISE NOTED BELOW.
[RULE 204]
2. THIS EQUIPMENT SHALL BE PROPERLY MAINTAINED AND KEPT IN GOOD OPERATING CONDITION AT ALL TIMES.
[RULE 204]
3. THIS ENGINE SHALL NOT BE OPERATED MORE THAN A TOTAL OF 200 HOURS IN ANY ONE YEAR WHICH INCLUDES NO MORE THAN 50 HOURS FOR MAINTENANCE AND PERFORMANCE TESTING.
[RULE 1304(a)-MODELING AND OFFSET, RULE 1110.2, RULE 1470]
4. OPERATION BEYOND THE 50 HOURS PER YEAR ALLOTTED FOR ENGINE MAINTENANCE AND TESTING SHALL BE ALLOWED ONLY IN THE EVENT OF A LOSS OF GRID POWER OR UP TO 30 MINUTES PRIOR TO A ROTATING OUTAGE, PROVIDED THAT THE UTILITY DISTRIBUTION COMPANY HAS ORDERED ROTATING OUTAGES IN THE CONTROL AREA WHERE THE ENGINE IS LOCATED OR HAS INDICATED THAT IT EXPECTS TO ISSUE SUCH AN ORDER AT A CERTAIN TIME, AND THE ENGINE IS LOCATED IN A UTILITY SERVICE BLOCK THAT IS SUBJECT TO THE ROTATING OUTAGE. ENGINE OPERATION SHALL BE TERMINATED IMMEDIATELY AFTER THE UTILITY DISTRIBUTION COMPANY ADVISES THAT A ROTATING OUTAGE IS NO LONGER IMMINENT OR IN EFFECT.
[RULE 1304(a)-MODELING AND OFFSET, RULE 1110.2, RULE 1470]
5. AN ENGINE OPERATING LOG SHALL BE KEPT AND MAINTAINED ON FILE TO RECORD WHEN THIS ENGINE IS STARTED MANUALLY. THE LOG SHALL LIST THE DATE OF OPERATION, THE TIMER READING IN HOURS AT THE BEGINNING AND END OF OPERATION, AND THE REASON FOR OPERATION OF THIS ENGINE. THE LOG SHALL BE KEPT FOR A MINIMUM OF FIVE CALENDAR YEARS PRIOR TO THE CURRENT YEAR AND MADE AVAILABLE TO DISTRICT PERSONNEL UPON REQUEST. THE TOTAL HOURS OF OPERATION (BOTH MANUAL AND AUTOMATIC) FOR THE PREVIOUS CALENDAR YEAR SHALL BE RECORDED ANYTIME DURING THE FIRST 15 DAYS OF JANUARY OF EACH YEAR.
[RULE 1303(b)(2)-OFFSET, RULE 1110.2, RULE 1470]

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6. THIS ENGINE SHALL NOT BE USED AS PART OF AN INTERRUPTIBLE SERVICE CONTRACT IN WHICH A FACILITY RECEIVES A PAYMENT OR REDUCED RATES IN RETURN FOR REDUCING ELECTRIC LOAD ON THE GRID WHEN REQUESTED TO DO SO BY THE UTILITY OR THE GRID OPERATOR.
[RULE 1303(a)(1)-BACT]

7. THIS ENGINE SHALL COMPLY WITH RULE 1470.
[RULE 1470]

Periodic Monitoring:

8. THE OPERATOR SHALL INSTALL AND MAINTAIN A NON-RESETTABLE ELAPSED TIME METER TO ACCURATELY INDICATE THE ELAPSED OPERATING TIME OF THE ENGINE.
[RULE 3004 (a)(4)]

Emissions And Requirements:

9. THIS EQUIPMENT IS SUBJECT TO THE APPLICABLE REQUIREMENTS OF THE FOLLOWING RULES AND REGULATIONS:
- CO: 8.5 GRAMS/BHP-HR, RULE 1303(a)(1)-BACT
 - NOx: 6.9 GRAMS/BHP-HR, RULE 1303(a)(1)-BACT
 - PM₁₀: 0.38 GRAM/BHP-HR, RULE 1303(a)(1)-BACT
 - PM: RULE 404, SEE APPENDIX B FOR EMISSION LIMITS
 - ROG: 1.0 GRAMS/BHP-HR, RULE 1303(a)(1)-BACT

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PERMIT TO OPERATE

Permit No. F95797
A/N 459899

Equipment Description:

BOILER, MURRAY-TRANE, WATER-TUBE TYPE, MODEL NO. WBD4-3-57, SERIAL NO. 10786, WITH ONE BURNER, COEN COMPANY, MODEL NO. DAZ, NATURAL GAS FIRED, WITH AMBER 363 FUEL OIL STAND-BY, RATED AT 49,000,000 BTU/HR, AND EQUIPPED WITH FLUE GAS RECIRCULATION.

Conditions:

1. OPERATION OF THIS EQUIPMENT MUST BE CONDUCTED IN COMPLIANCE WITH ALL DATA AND SPECIFICATIONS SUBMITTED WITH THE APPLICATION UNDER WHICH THIS PERMIT IS ISSUED UNLESS OTHERWISE NOTED BELOW.
[RULE 204]
2. THIS EQUIPMENT MUST BE PROPERLY MAINTAINED AND KEPT IN GOOD OPERATING CONDITION AT ALL TIMES.
[RULE 204]
3. THIS BOILER SHALL BE FIRED WITH NATURAL GAS ONLY, EXCEPT DURING TESTING, MAINTENANCE, NATURAL GAS CURTAILMENT OR AN EMERGENCY EVENT, AT WHICH TIME AMBER 363 FUEL OIL MAY BE USED.
[RULE 1303(b)(2)-OFFSET]
4. THE OPERATOR SHALL COMPLY WITH ALL THE APPLICABLE REQUIREMENTS OF RULE 1146.
[RULE 1146]
5. WHEN FIRING ON NATURAL GAS, THIS BOILER SHALL NOT EMIT MORE THAN 30 PPM OF OXIDES OF NITROGEN (NOX), CALCULATED AS NO₂, AND NOT MORE THAN 400 PPM OF CARBON MONOXIDE, ALL MEASURED BY VOLUME ON A DRY BASIS AT 3% O₂ AND AVERAGED OVER A PERIOD OF 15 CONSECUTIVE MINUTES.
6. WHEN FIRING ON AMBER 363 FUEL OIL, THIS BOILER SHALL NOT EMIT MORE THAN 40 PPM OF OXIDES OF NITROGEN (NOX), CALCULATED AS NO₂, AND NOT MORE THAN 400 PPM OF CARBON MONOXIDE, ALL MEASURED BY VOLUME ON A DRY BASIS AT 3% O₂ AND AVERAGED OVER A PERIOD OF 15 CONSECUTIVE MINUTES.
[RULE 1146]
7. WHENEVER THE BOILER IS FIRED USING NATURAL GAS, THE USE OF THIS FUEL SHALL NOT EXCEED 190,476,190 CUBIC FEET IN ANY ONE CALENDAR YEAR.
[RULE 1146]
7. WHENEVER THE BOILER IS FIRED USING AMBER 363 FUEL OIL, THE USE OF THIS FUEL SHALL NOT EXCEED 783,285 GALLONS IN ANY ONE CALENDAR YEAR.
[RULE 1146]

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8. THE AMBER 363 FUEL OIL SUPPLIED TO THE BURNER SHALL CONTAIN NO MORE THAN 0.0015 PERCENT BY WEIGHT SULFUR.
[RULE 431.2]
9. THE OPERATOR SHALL HAVE THE BURNER EQUIPPED WITH A CONTROL SYSTEM TO AUTOMATICALLY REGULATE THE COMBUSTION AIR, FUEL AND RECIRCULATED FLUE GAS AS THE BOILER LOAD VARIES. THE CONTROL SYSTEM SHALL BE ADJUSTED AND TUNED AT LEAST ONCE A YEAR ACCORDING TO THE MANUFACTURER'S SPECIFICATIONS TO MAINTAIN ITS ABILITY TO REPEAT THE SAME PERFORMANCE AT THE SAME FIRING RATE.
[RULE 1146]

Periodic Monitoring:

10. THE OPERATOR SHALL INSTALL AND MAINTAIN NON-RESETTABLE TOTALIZING FUEL FLOW METERS TO MEASURE THE VOLUME OF NATURAL GAS USED IN CUBIC FEET AND THE VOLUME OF AMBER 363 FUEL OIL USED IN GALLONS.
[RULE 3004(a)(4)-Periodic Monitoring]
11. RECORDS OF FUEL USAGE, ADJUSTMENTS, TUNE-UPS AND CALIBRATIONS AS STATED IN CONDITION NOS. 6, 7, 9 AND 10 SHALL BE KEPT FOR AT LEAST FIVE YEARS AND BE MADE AVAILABLE TO DISTRICT PERSONNEL UPON REQUEST. [RULE 3004(a)(4)-Periodic Monitoring]
12. THE COMBUSTION BURNER SHALL BE INSPECTED AND MAINTAINED PER MANUFACTURER SPECIFICATIONS. RECORDS SHALL BE MAINTAINED FOR THE INSPECTIONS AND MAINTENANCE OF THE BURNER.
[RULE 3004(a)(4)-Periodic Monitoring]
13. ALL RECORDS REQUIRED BY THIS PERMIT SHALL BE KEPT FOR A MINIMUM OF FIVE YEARS AND BE MADE AVAILABLE TO DISTRICT PERSONNEL UPON REQUEST.
[RULE 3004(a)(4)-Periodic Monitoring]
14. THE OPERATOR SHALL DETERMINE COMPLIANCE WITH THE NO_x EMISSION LIMIT BY CONDUCTING A SOURCE TEST AT LEAST ONCE EVERY YEAR USING AQMD METHOD 100.1 OR 7.1. THE TEST SHALL BE CONDUCTED WHEN THE EQUIPMENT IS OPERATING UNDER NORMAL CONDITIONS TO DEMONSTRATE COMPLIANCE WITH RULE 1146 CONCENTRATION LIMIT. THE OPERATOR SHALL COMPLY WITH ALL GENERAL TESTING, REPORTING, AND RECORDKEEPING REQUIREMENTS IN SECTIONS E AND K OF THIS PERMIT.

[RULE 3004(a)(4)-Periodic Monitoring]
15. THE OPERATOR SHALL DETERMINE COMPLIANCE WITH THE CO EMISSION LIMIT BY CONDUCTING A SOURCE TEST AT LEAST ONCE EVERY YEAR USING AQMD METHOD 100.1 OR 10.1. THE TEST SHALL BE CONDUCTED WHEN THE EQUIPMENT IS OPERATING UNDER NORMAL CONDITIONS TO DEMONSTRATE COMPLIANCE WITH RULE 1146 CONCENTRATION LIMIT. THE OPERATOR SHALL COMPLY WITH ALL GENERAL TESTING, REPORTING, AND RECORDKEEPING REQUIREMENTS IN SECTIONS E AND K OF THIS PERMIT.

[RULE 3004(a)(4)-Periodic Monitoring]

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16. THE OPERATOR SHALL CONDUCT AN INSPECTION FOR VISIBLE EMISSION FROM ALL STACKS AND OTHER EMISSION POINTS OF THIS EQUIPMENT WHENEVER THIS EQUIPMENT HAS COMBUSTED ONE MILLION GALLONS OF AMBER 363 FUEL OIL, TO BE COUNTED CUMULATIVELY OVER A FIVE YEAR PERIOD. THE INSPECTION SHALL BE CONDUCTED WHILE THE EQUIPMENT IS IN OPERATION AND DURING DAYLIGHT HOURS. IF ANY VISIBLE EMISSIONS (NOT INCLUDING CONDENSED WATER VAPOR) ARE DETECTED THAT LAST MORE THAN THREE MINUTES IN ANY ONE HOUR, THE OPERATOR SHALL EITHER:
- A. TAKE CORRECTIVE ACTION(S) THAT ELIMINATE(S) THE VISIBLE EMISSIONS WITHIN 24 HOURS AND REPORT THE VISIBLE EMISSIONS AS A POTENTIAL DEVIATION IN THE SAME FASHION AS DEVIATIONS ARE REQUIRED TO BE REPORTED IN SECTION K OF THIS PERMIT; OR
 - B. HAVE A CARB-CERTIFIED SMOKE READER DETERMINE COMPLIANCE WITH THE OPACITY STANDARD, USING EPA METHOD 9 OR THE PROCEDURES IN THE CARB MANUAL "VISIBLE EMISSION EVALUATION", WITHIN THREE BUSINESS DAYS AND REPORT ANY DEVIATIONS TO AQMD.

IN ADDITION, THE OPERATOR SHALL KEEP THE RECORDS IN ACCORDANCE WITH THE RECORDKEEPING REQUIREMENTS IN SECTION K OF THIS PERMIT AND THE FOLLOWING RECORDS:

- A. STACK OR EMISSION POINT IDENTIFICATION;
 - B. DESCRIPTION OF ANY CORRECTIVE ACTION(S) TAKEN TO ABATE VISIBLE EMISSIONS;
 - C. DATE AND TIME VISIBLE EMISSION WAS ABATED; AND
 - D. VISIBLE EMISSION OBSERVATION RECORD BY A CERTIFIED SMOKE READER.
- [RULE 3004(a)(4)-Periodic Monitoring]

17. IF ANNUAL AMBER 363 FUEL OIL USAGE EXCEEDS 2,000,000 GALLONS IN ANY ONE YEAR, THEN OPERATOR SHALL DETERMINE COMPLIANCE WITH THE PARTICULATE MATTER (PM) EMISSION LIMIT(S) BY CONDUCTING A SOURCE TEST AT LEAST ONCE EVERY FIVE YEARS USING AQMD METHOD 5.2. THE TEST SHALL BE CONDUCTED WHEN THE EQUIPMENT IS OPERATING UNDER NORMAL CONDITIONS TO DEMONSTRATE COMPLIANCE WITH RULE 409 LIMIT. THE OPERATOR SHALL COMPLY WITH ALL GENERAL TESTING, REPORTING, AND RECORDKEEPING REQUIREMENTS IN SECTIONS E AND K OF THIS PERMIT. FOR THE PURPOSE OF DETERMINING COMPLIANCE WITH RULE 409 LIMIT, THE EMISSIONS SHALL BE MEASURED AND AVERAGED OVER A 60 MINUTE TIME PERIOD.

THE OPERATOR SHALL CONDUCT AN ANNUAL MAINTENANCE INSPECTION CHECK OF THE OPERATING PRESSURE, TEMPERATURE, AIR SUPPLY, VENT, SMOKE SPOT, BURNER CONDITION, HEAT-TRANSFER SURFACE CONDITION, WATER TREATMENT, BLOWDOWN AND LEAKAGE.

THE OPERATOR SHALL KEEP THE RECORDS IN ACCORDANCE WITH THE RECORDKEEPING REQUIREMENTS IN SECTION K OF THIS PERMIT AND THE FOLLOWING RECORDS:

- A. DATE WHEN ANNUAL MAINTENANCE INSPECTION WAS CONDUCTED.
- [RULE 3004(a)(4)-Periodic Monitoring]

18. FOR UNITS WITH A HEAT INPUT GREATER THAN 10 MMBTU/HR AND ANNUAL AMBER 363 FUEL OIL USAGE GREATER THAN 1,000,000 GALLONS, OR GREATER THAN 336 HOURS OF OPERATION

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BUT NOT EXCEEDING 2,000,000 GALLONS IN ANY ONE YEAR, OPERATOR SHALL CONDUCT AN ANNUAL MAINTENANCE INSPECTION CHECK OF THE OPERATING PRESSURE, TEMPERATURE, AIR SUPPLY, VENT, SMOKE SPOT, BURNER CONDITION, HEAT-TRANSFER SURFACE CONDITION, WATER TREATMENT, BLOWDOWN AND LEAKAGE.

THE OPERATOR SHALL KEEP THE RECORDS IN ACCORDANCE WITH THE RECORDKEEPING REQUIREMENTS IN SECTION K OF THIS PERMIT AND THE FOLLOWING RECORDS:

A. DATE WHEN ANNUAL MAINTENANCE INSPECTION WAS CONDUCTED.
[RULE 3004(a)(4)-Periodic Monitoring]

Emissions And Requirements:

19. THIS EQUIPMENT IS SUBJECT TO THE APPLICABLE REQUIREMENTS OF THE FOLLOWING RULES AND REGULATIONS:
- NOx: 30 PPMV, RULE 1146, NATURAL GAS
 - NOx: 40 PPMV, RULE 1146, FUEL OIL
 - CO: 400 PPMV, RULE 1146
 - CO: 2000 PPMV, RULE 407
 - SOX: 500 PPMV, RULE 407
 - PM: 0.1 GR/SCF, RULE 409

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PERMIT TO CONSTRUCT/OPERATE

Permit No. G3941
A/N 478849

Equipment Description:

CREMATORY, NO. 1, AMERICAN CREMATORY, MODEL A-200HT, WITH A 500,000 BTU PER HOUR, NATURAL GAS FIRED, ECLIPSE THERMJET, MODEL, TJ0050, PRIMARY BURNER, A 1,000,000 BTU PER HOUR, NATURAL GAS FIRED, ECLIPSE THERMJET, MODEL, TJ0100, SECONDARY CHAMBER BURNER, AND A 5 H.P. COMBUSTION AIR BLOWER.

Conditions:

1. OPERATION OF THIS EQUIPMENT MUST BE CONDUCTED IN COMPLIANCE WITH ALL DATA AND SPECIFICATIONS SUBMITTED WITH THE APPLICATION UNDER WHICH THIS PERMIT IS ISSUED UNLESS OTHERWISE NOTED BELOW.
[RULE 204]
2. THIS EQUIPMENT MUST BE PROPERLY MAINTAINED AND KEPT IN GOOD OPERATING CONDITION AT ALL TIMES.
[RULE 204]
3. THIS EQUIPMENT SHALL BE USED ONLY TO CREMATE HUMAN ANATOMICAL PARTS OR WHOLE BODIES.
[RULE 1303 (b)(2)-OFFSET]
4. THE SECONDARY CHAMBER BURNER SHALL BE USED THROUGHOUT THE PREHEATING AND CREMATION CYCLE.
[RULE 1303 (a)-BACT]
5. A TEMPERATURE OF NOT LESS THAN 1500 DEGREES FAHRENHEIT SHALL BE MAINTAINED IN THE SECONDARY CHAMBER WHEN THE PRIMARY CHAMBER IS IN OPERATION.
[RULE 1303 (a)-BACT]
6. A TEMPERATURE INDICATING AND RECORDING DEVICE SHALL BE INSTALLED AND MAINTAINED IN THE SECONDARY CHAMBER.
[RULE 1303 (a)-BACT]
7. THE TEMPERATURE INDICATING AND RECORDING DEVICE LOCATED IN THE SECONDARY CHAMBER SHALL MEASURE THE TEMPERATURE ON A CONTINUOUS BASIS. THE INSTRUMENT SHALL BE CALIBRATED ACCORDING TO THE MANUFACTURER'S RECOMMENDATIONS ON AN ANNUAL BASIS.
[RULE 1303 (a)-BACT]
8. THE MAXIMUM THROUGHPUT OF THE CREMATORY SHALL NOT EXCEED 9,167 POUNDS OF ANATOMICAL PARTS AND HUMAN BODIES IN ANY ONE MONTH.
[RULE 1303 (b)(2)-OFFSET, RULE 1401]

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9. THE MAXIMUM NATURAL GAS FUEL USAGE OF THE CREMATORY SHALL NOT EXCEED 130,957 SCF IN ANY ONE MONTH.
[RULE 1303 (b)(2)-OFFSET, RULE 1401]
10. THE OPERATOR SHALL MEASURE AND RECORD THE WEIGHT OF EACH CHARGE OF HUMAN ANATOMICAL PARTS AND BODIES PRIOR TO INCINERATION.
[RULE 1303 (b)(2)-OFFSET, RULE 1401]
11. THE OPERATOR SHALL INSTALL AND MAINTAIN A DEDICATED TOTALIZING FUEL FLOW METER, WITH AN ACCURACY OF +/- 5%, TO CONTINUOUSLY MEASURE THE NATURAL GAS FUEL USAGE BEING SUPPLIED TO THE CREMATORY. THE INSTRUMENT SHALL BE CALIBRATED ACCORDING TO THE MANUFACTURER'S RECOMMENDATIONS ON AN ANNUAL BASIS. A COMPUTER THAT COLLECTS, SUMS, AND STORES ELECTRONIC DATA FROM CONTINUOUS FUEL FLOW METERS IS AN ACCEPTABLE TOTALIZER. THE TOTALIZING FUEL FLOW METER MUST CONTINUOUSLY OPERATE WHEN THE UNIT IS OPERATING.
[RULE 1303 (b)(2)-OFFSET]
12. THE OPERATOR SHALL KEEP RECORDS IN A MANNER APPROVED BY THE DISTRICT FOR THE FOLLOWING PARAMETERS OR ITEMS:
- A. MASS OF HUMAN ANATOMICAL PARTS AND BODIES INCINERATED.
 - B. NATURAL GAS FUEL USAGE OF THE CREMATORY.
 - C. NAME AND CONTACT INFORMATION OF PERSONNEL OPERATING THE CREMATORY.
 - D. CALIBRATION RECORDS FOR TEMPERATURE AND FUEL FLOW MONITORING DEVICES.
- RECORDS SHALL BE RETAINED FOR A PERIOD OF FIVE YEARS AND MADE AVAILABLE TO DISTRICT PERSONNEL UPON REQUEST.
[RULE 1303(a)-BACT, RULE 1303 (b)(2)-OFFSET, RULE 1401]

Periodic Monitoring:

13. THE OPERATOR SHALL CONDUCT AN INSPECTION FOR VISIBLE EMISSIONS FROM ALL STACKS AND OTHER EMISSION POINTS OF THIS EQUIPMENT WHENEVER THERE IS A PUBLIC COMPLAINT OF VISIBLE EMISSIONS, WHENEVER VISIBLE EMISSIONS ARE OBSERVED, AND ON A MONTHLY BASIS, AT LEAST, UNLESS THE EQUIPMENT DID NOT OPERATE DURING THE ENTIRE MONTHLY PERIOD. THE ROUTINE MONTHLY INSPECTION SHALL BE CONDUCTED WHILE THE EQUIPMENT IS IN OPERATION AND DURING DAYLIGHT HOURS. IF ANY VISIBLE EMISSIONS (NOT INCLUDING CONDENSED WATER VAPOR) ARE DETECTED THAT LAST MORE THAN THREE MINUTES IN ANY ONE-HOUR, THE OPERATOR SHALL EITHER:
- A. VERIFY AND CERTIFY WITHIN 24 HOURS THAT THE EQUIPMENT CAUSING THE EMISSION AND ANY ASSOCIATED AIR POLLUTION CONTROL EQUIPMENT ARE OPERATING NORMALLY ACCORDING TO THEIR DESIGN AND STANDARD PROCEDURES AND UNDER THE SAME CONDITIONS UNDER WHICH COMPLIANCE WAS ACHIEVED IN THE PAST;
 - B. TAKE CORRECTIVE ACTION(S) THAT ELIMINATES THE VISIBLE EMISSIONS WITHIN 24 HOURS AND REPORT THE VISIBLE EMISSIONS AS A POTENTIAL DEVIATION IN ACCORDANCE WITH THE REPORTING REQUIREMENTS IN SECTION K OF THIS PERMIT; OR

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- C. HAVE A CARB-CERTIFIED SMOKE READER DETERMINE COMPLIANCE WITH THE OPACITY STANDARD, USING EPA METHOD 9 OR THE PROCEDURES IN THE CARB MANUAL "VISIBLE EMISSION EVALUATION", WITHIN THREE BUSINESS DAYS AND REPORT ANY DEVIATIONS TO AQMD.

THE OPERATOR SHALL KEEP THE RECORDS IN ACCORDANCE WITH THE RECORDKEEPING REQUIREMENTS IN SECTION K OF THIS PERMIT AND THE FOLLOWING RECORDS:

- A. STACK OR EMISSION POINT IDENTIFICATION;
- B. DESCRIPTION OF ANY CORRECTIVE ACTIONS TAKEN TO ABATE VISIBLE EMISSIONS;
- C. DATE AND TIME VISIBLE EMISSION WAS ABATED; AND
- D. VISIBLE EMISSION OBSERVATION RECORDED BY A CERTIFIED SMOKE READER.
[RULE 3004 (a)(4)]

Emissions And Requirements:

14. THIS EQUIPMENT IS SUBJECT TO THE APPLICABLE REQUIREMENTS OF THE FOLLOWING RULES AND REGULATIONS:

PM: RULE 404, SEE APPENDIX B FOR EMISSION LIMITS
PM: 0.1 GR/SCF, RULE 409
PM: 0.1 GR/SCF RULE 473
CO: 2000 PPMV, RULE 407

FACILITY PERMIT TO OPERATE LOMA LINDA UNIV

PERMIT TO CONSTRUCT/OPERATE

**Permit No. G3942
A/N 480890**

Equipment Description:

CREMATORY, NO. 2, AMERICAN CREMATORY, MODEL A-200HT, WITH A 500,000 BTU PER HOUR, NATURAL GAS FIRED, ECLIPSE THERMJET, MODEL, TJ0050, PRIMARY BURNER, A 1,000,000 BTU PER HOUR, NATURAL GAS FIRED, ECLIPSE THERMJET, MODEL, TJ0100, SECONDARY CHAMBER BURNER, AND A 5 H.P. COMBUSTION AIR BLOWER.

Conditions:

1. OPERATION OF THIS EQUIPMENT MUST BE CONDUCTED IN COMPLIANCE WITH ALL DATA AND SPECIFICATIONS SUBMITTED WITH THE APPLICATION UNDER WHICH THIS PERMIT IS ISSUED UNLESS OTHERWISE NOTED BELOW.
[RULE 204]
2. THIS EQUIPMENT MUST BE PROPERLY MAINTAINED AND KEPT IN GOOD OPERATING CONDITION AT ALL TIMES.
[RULE 204]
3. THIS EQUIPMENT SHALL BE USED ONLY TO CREMATE HUMAN ANATOMICAL PARTS OR WHOLE BODIES.
[RULE 1303 (b)(2)-OFFSET]
4. THE SECONDARY CHAMBER BURNER SHALL BE USED THROUGHOUT THE PREHEATING AND CREMATION CYCLE.
[RULE 1303 (a)-BACT]
5. A TEMPERATURE OF NOT LESS THAN 1500 DEGREES FAHRENHEIT SHALL BE MAINTAINED IN THE SECONDARY CHAMBER WHEN THE PRIMARY CHAMBER IS IN OPERATION.
[RULE 1303 (a)-BACT]
6. A TEMPERATURE INDICATING AND RECORDING DEVICE SHALL BE INSTALLED AND MAINTAINED IN THE SECONDARY CHAMBER.
[RULE 1303 (a)-BACT]
7. THE TEMPERATURE INDICATING AND RECORDING DEVICE LOCATED IN THE SECONDARY CHAMBER SHALL MEASURE THE TEMPERATURE ON A CONTINUOUS BASIS. THE INSTRUMENT SHALL BE CALIBRATED ACCORDING TO THE MANUFACTURER'S RECOMMENDATIONS ON AN ANNUAL BASIS.
[RULE 1303 (a)-BACT]
8. THE MAXIMUM THROUGHPUT OF THE CREMATORY SHALL NOT EXCEED 9,167 POUNDS OF ANATOMICAL PARTS AND HUMAN BODIES IN ANY ONE MONTH.
[RULE 1303 (b)(2)-OFFSET, RULE 1401]

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9. THE MAXIMUM NATURAL GAS FUEL USAGE OF THE CREMATORY SHALL NOT EXCEED 130,957 SCF IN ANY ONE MONTH.
[RULE 1303 (b)(2)-OFFSET, RULE 1401]
10. THE OPERATOR SHALL MEASURE AND RECORD THE WEIGHT OF EACH CHARGE OF HUMAN ANATOMICAL PARTS AND BODIES PRIOR TO INCINERATION.
[RULE 1303 (b)(2)-OFFSET, RULE 1401]
11. THE OPERATOR SHALL INSTALL AND MAINTAIN A DEDICATED TOTALIZING FUEL FLOW METER, WITH AN ACCURACY OF +/- 5%, TO CONTINUOUSLY MEASURE THE NATURAL GAS FUEL USAGE BEING SUPPLIED TO THE CREMATORY. THE INSTRUMENT SHALL BE CALIBRATED ACCORDING TO THE MANUFACTURER'S RECOMMENDATIONS ON AN ANNUAL BASIS. A COMPUTER THAT COLLECTS, SUMS, AND STORES ELECTRONIC DATA FROM CONTINUOUS FUEL FLOW METERS IS AN ACCEPTABLE TOTALIZER. THE TOTALIZING FUEL FLOW METER MUST CONTINUOUSLY OPERATE WHEN THE UNIT IS OPERATING.
[RULE 1303 (b)(2)-OFFSET]
12. THE OPERATOR SHALL KEEP RECORDS IN A MANNER APPROVED BY THE DISTRICT FOR THE FOLLOWING PARAMETERS OR ITEMS:
- A. MASS OF HUMAN ANATOMICAL PARTS AND BODIES INCINERATED.
 - B. NATURAL GAS FUEL USAGE OF THE CREMATORY.
 - C. NAME AND CONTACT INFORMATION OF PERSONNEL OPERATING THE CREMATORY.
 - D. CALIBRATION RECORDS FOR TEMPERATURE AND FUEL FLOW MONITORING DEVICES.

RECORDS SHALL BE RETAINED FOR A PERIOD OF FIVE YEARS AND MADE AVAILABLE TO DISTRICT PERSONNEL UPON REQUEST.

[RULE 1303(a)-BACT, RULE 1303 (b)(2)-OFFSET, RULE 1401]

Periodic Monitoring:

13. THE OPERATOR SHALL CONDUCT AN INSPECTION FOR VISIBLE EMISSIONS FROM ALL STACKS AND OTHER EMISSION POINTS OF THIS EQUIPMENT WHENEVER THERE IS A PUBLIC COMPLAINT OF VISIBLE EMISSIONS, WHENEVER VISIBLE EMISSIONS ARE OBSERVED, AND ON A MONTHLY BASIS, AT LEAST, UNLESS THE EQUIPMENT DID NOT OPERATE DURING THE ENTIRE MONTHLY PERIOD. THE ROUTINE MONTHLY INSPECTION SHALL BE CONDUCTED WHILE THE EQUIPMENT IS IN OPERATION AND DURING DAYLIGHT HOURS. IF ANY VISIBLE EMISSIONS (NOT INCLUDING CONDENSED WATER VAPOR) ARE DETECTED THAT LAST MORE THAN THREE MINUTES IN ANY ONE-HOUR, THE OPERATOR SHALL EITHER:
- A. VERIFY AND CERTIFY WITHIN 24 HOURS THAT THE EQUIPMENT CAUSING THE EMISSION AND ANY ASSOCIATED AIR POLLUTION CONTROL EQUIPMENT ARE OPERATING NORMALLY ACCORDING TO THEIR DESIGN AND STANDARD PROCEDURES AND UNDER THE SAME CONDITIONS UNDER WHICH COMPLIANCE WAS ACHIEVED IN THE PAST;
 - B. TAKE CORRECTIVE ACTION(S) THAT ELIMINATES THE VISIBLE EMISSIONS WITHIN 24 HOURS AND REPORT THE VISIBLE EMISSIONS AS A POTENTIAL DEVIATION IN ACCORDANCE WITH THE REPORTING REQUIREMENTS IN SECTION K OF THIS PERMIT; OR

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- C. HAVE A CARB-CERTIFIED SMOKE READER DETERMINE COMPLIANCE WITH THE OPACITY STANDARD, USING EPA METHOD 9 OR THE PROCEDURES IN THE CARB MANUAL "VISIBLE EMISSION EVALUATION", WITHIN THREE BUSINESS DAYS AND REPORT ANY DEVIATIONS TO AQMD.

THE OPERATOR SHALL KEEP THE RECORDS IN ACCORDANCE WITH THE RECORDKEEPING REQUIREMENTS IN SECTION K OF THIS PERMIT AND THE FOLLOWING RECORDS:

- D. STACK OR EMISSION POINT IDENTIFICATION;
E. DESCRIPTION OF ANY CORRECTIVE ACTIONS TAKEN TO ABATE VISIBLE EMISSIONS;
F. DATE AND TIME VISIBLE EMISSION WAS ABATED; AND
G. VISIBLE EMISSION OBSERVATION RECORDED BY A CERTIFIED SMOKE READER.
[RULE 3004 (a)(4)]

Emissions And Requirements:

14. THIS EQUIPMENT IS SUBJECT TO THE APPLICABLE REQUIREMENTS OF THE FOLLOWING RULES AND REGULATIONS:

PM: RULE 404, SEE APPENDIX B FOR EMISSION LIMITS
PM: 0.1 GR/SCF, RULE 409
PM: 0.1 GR/SCF RULE 473
CO: 2000 PPMV, RULE 407

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PERMIT TO OPERATE

**Permit No. F299255
A/N 480391**

Equipment Description:

COGENERATION SYSTEM NO. 1 CONSISTING OF:

1. GAS TURBINE, DETROIT DIESEL ALLISON, MODEL 501-KH, 59353000 BTU/HR, NATURAL GAS OR DIESEL FIRED WITH STEAM AND WATER INJECTION, DRIVING A 6054 KILOWATT ELECTRICAL GENERATOR.
2. SUPERHEATER, UNFIRED, 21780 LBS/HR, MAXIMUM STEAM OUTPUT.
3. DUCT BURNER, COEN, 44211000 BTU/HR, LOW NOX BURNER, NATURAL GAS FIRED ONLY.
4. WASTE HEAT BOILER, ABCO, 47000 LBS/HR MAXIMUM STEAM OUTPUT, WITH AN EVAPORATOR, ECONOMIZER AND FEEDWATER HEATER.

Conditions:

1. OPERATION OF THIS EQUIPMENT MUST BE CONDUCTED IN COMPLIANCE WITH ALL DATA AND SPECIFICATIONS SUBMITTED WITH THE APPLICATION UNDER WHICH THIS PERMIT IS ISSUED UNLESS OTHERWISE NOTED BELOW.
[RULE 204]
2. THIS EQUIPMENT MUST BE PROPERLY MAINTAINED AND KEPT IN GOOD OPERATING CONDITION AT ALL TIMES.
[RULE 204]
3. THIS EQUIPMENT SHALL BE OPERATED AND MAINTAINED BY PERSONNEL PROPERLY TRAINED IN ITS OPERATION.
[RULE 204]
4. THE DUCT BURNER SHALL BE ONLY FIRED WITH NATURAL GAS.
[RULE 1134, RULE 1303(a)(1)-BACT]
5. A CONTINUOUS MONITORING SYSTEM SHALL BE INSTALLED AND OPERATED TO MEASURE THE COMBINED GAS TURBINE AND DUCT BURNER EXHAUST FOR NOX AND O₂ CONCENTRATIONS ON A DRY BASIS. THE SYSTEM SHALL ALSO CONVERT THE ACTUAL NOX CONCENTRATIONS TO CORRECTED NOX CONCENTRATIONS AT 15% OXYGEN ON A DRY BASIS AND CONTINUOUSLY RECORD THE DRY NOX CONCENTRATIONS, DRY OXYGEN CONCENTRATIONS AND CORRECTED NOX CONCENTRATIONS AT 15% OXYGEN DRY. IN ADDITION, THE SYTEM SHALL MONITOR AND RECORD THE DAILY NOX EMISSIONS IN POUNDS PER DAY FROM EACH COGENERATION SYSTEM. THIS SYSTEM SHALL COMPLY WITH THE REQUIREMENTS OF RULE 218.

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A REPORT SHALL BE SUBMITTED TO THE DISTRICT ON A MONTHLY BASIS. THIS MONTHLY REPORTS SHALL INCLUDE, BUT IS NOT LIMITED TO THE FOLLOWING:

1. DAY OF THE MONTH
 2. MONITOR "ON" HOURS
 3. GAS TURBINE OPERATING HOURS
 4. HOUR OF PEAK NOX
 5. MAXIMUM NOX EMISSIONS (PPMVD AT 15% O₂)
 6. MAXIMUM NOX EMISSIONS (POUNDS PER DAY)
 7. AVERAGE NOX EMISSIONS (PPMVD AT 15% O₂)
 8. AVERAGE NOX EMISSIONS (POUNDS PER DAY)
 9. TOTAL NOX EMISSIONS (POUNDS PER DAY)
 10. EXHAUST FLOW RATE (DSCFM)
 11. PERCENT OF DUCT BURNER FUEL
 12. ANY START UP, SHUTDOWN OR MALFUNCTION OF THE MONITOR
[RULE 1134, RULE 1303(b)(2)-OFFSET, RULE 218]
6. A CONTINUOUS MONITORING SYSTEM SHALL BE INSTALLED AND OPERATED TO MONITOR AND RECORD THE FUEL CONSUMPTION AND THE RATIO OF WATER TO FUEL BEING FIRED IN THE TURBINE. THIS SYSTEM SHALL BE ACCURATE TO WITHIN PLUS MINUS 5 PERCENT AND SHALL BE APPROVED BY THE EXECUTIVE OFFICER PRIOR TO INSTALLATION.
[RULE 1134, RULE 1303(b)(2)-OFFSET, RULE 218]
7. THE OPERATOR SHALL KEEP RECORDS OF RESULTS FROM THE MONITORS REQUIRED BY PERMIT CONDITION NOS. 5 AND 6. THE RECORDS SHALL BE MAINTAINED ON FILE FOR AT LEAST FIVE YEARS AND SHALL BE MADE AVAILABLE UPON REQUEST TO DISTRICT PERSONNEL.
[RULE 1134, RULE 1303(b)(2)-OFFSET]
8. WHEN FIRING DIESEL FUEL, EMISSIONS OF OXIDES OF NITROGEN AS NO₂ FROM THE COMBINED TURBINE AND DUCT BURNER EXHAUST SHALL NOT EXCEED 42 PPMV, CALCULATED DRY, AT 15% OXYGEN.
[RULE 1303(a)(1)-BACT]
9. WHEN FIRING NATURAL GAS, EMISSIONS OF OXIDES OF NITROGEN AS NO₂ FROM THE COMBINED TURBINE AND DUCT BURNER EXHAUST SHALL NOT EXCEED 21 PPMV, CALCULATED DRY, AT 15% OXYGEN.
[RULE 1134]
10. OXIDES OF SULFUR EMISSIONS REPORTED AS SO₂ FROM THIS COGENERATION PERMIT UNIT SHALL NOT EXCEED 2 POUNDS PER DAY WHILE THE TURBINE IS FIRING NATURAL GAS AND 74 POUNDS PER DAY WHILE THE TURBINE IS FIRING DIESEL FUEL. THE COMBINED SOX EMISSIONS REPORTED AS SO₂ FROM COGENERATION SYSTEM NUMBERS 1 AND 2 SHALL NOT EXCEED 3 POUNDS PER DAY WHILE THE TURBINES ARE FIRING NATURAL GAS AND 136 POUNDS PER DAY WHILE THE TURBINES ARE FIRING DIESEL FUEL.
[RULE 1303(b)(2)-OFFSET]
11. OXIDES OF NITROGEN EMISSIONS REPORTED AS NO₂ FROM THIS COGENERATION PERMIT UNIT SHALL NOT EXCEED 191 POUNDS PER DAY WHILE THE TURBINE IS FIRING NATURAL GAS AND 229 POUNDS PER DAY WHILE THE TURBINE IS FIRING DIESEL FUEL. THE COMBINED NOX

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EMISSIONS REPORTED AS NO₂ FROM COGENERATION SYSTEM NUMBERS 1 AND 2 SHALL NOT EXCEED 282 POUNDS PER DAY WHILE THE TURBINES ARE FIRING NATURAL GAS AND 339 POUNDS PER DAY WHILE THE TURBINES ARE FIRING DIESEL FUEL.
[RULE 1303(b)(2)-OFFSET]

12. CARBON MONOXIDE EMISSIONS FROM THIS COGENERATION PERMIT UNIT SHALL NOT EXCEED 182 POUNDS PER DAY WHILE THE TURBINE IS FIRING NATURAL GAS AND 466 POUNDS PER DAY WHILE THE TURBINE IS FIRING DIESEL FUEL. THE COMBINED CO EMISSIONS FROM COGENERATION SYSTEM NUMBERS 1 AND 2 SHALL NOT EXCEED 211 POUNDS PER DAY WHILE THE TURBINES ARE FIRING NATURAL GAS AND 552 POUNDS PER DAY WHILE THE TURBINES ARE FIRING DIESEL FUEL.
[RULE 1303(b)(2)-OFFSET]

13. ORGANIC EMISSIONS FROM THIS COGENERATION PERMIT UNIT SHALL NOT EXCEED 36 POUNDS PER DAY WHILE THE TURBINE IS FIRING NATURAL GAS AND 36 POUNDS PER DAY WHILE THE TURBINE IS FIRING DIESEL FUEL. THE COMBINED ORGANIC EMISSIONS FROM COGENERATION SYSTEM NUMBERS 1 AND 2 SHALL NOT EXCEED 72 POUNDS PER DAY WHILE THE TURBINES ARE FIRING NATURAL GAS AND 72 POUNDS PER DAY WHILE THE TURBINES ARE FIRING DIESEL FUEL.
[RULE 1303(b)(2)-OFFSET]

14. PARTICULATE EMISSIONS FROM THIS COGENERATION PERMIT UNIT SHALL NOT EXCEED 36 POUNDS PER DAY WHILE THE TURBINE IS FIRING NATURAL GAS AND 62 POUNDS PER DAY WHILE THE TURBINE IS FIRING DIESEL FUEL. THE COMBINED PARTICULATE EMISSIONS FROM COGENERATION SYSTEM NUMBERS 1 AND 2 SHALL NOT EXCEED 72 POUNDS PER DAY WHILE THE TURBINES ARE FIRING NATURAL GAS AND 125 POUNDS PER DAY WHILE THE TURBINES ARE FIRING DIESEL FUEL.
[RULE 1303(b)(2)-OFFSET]

15. DIESEL FUEL MAY BE BURNED IN THE TURBINE ONLY IN THE EVENT OF A NATURAL GAS CURTAILMENT OR IN THE EVENT OF AN EMERGENCY FAILURE OR MAINTENANCE REQUIREMENTS OF THE NATURAL GAS DELIVERY SYSTEM FOR BOILER TESTING WHICH IS NOT TO EXCEED ONE HALF HOUR PER MONTH.
[RULE 1303(b)(2)-OFFSET]

16. DAILY RECORDS OF DIESEL FUEL CONSUMPTION SHALL BE MAINTAINED AND MADE AVAILABLE UPON REQUEST TO DISTRICT PERSONNEL.
[RULE 1303(b)(2)-OFFSET]

17. THE MAXIMUM TOTAL QUANTITY OF NATURAL GAS USED IN ANY ONE HOUR SHALL NOT EXCEED 56530 CUBIC FEET FOR THE GAS TURBINE AND 42110 CUBIC FEET FOR THE DUCT BURNER.
[RULE 1303(b)(2)-OFFSET]

18. THE BOILER REFERENCED IN PERMIT NO. F32184 (A/N 252359) MAY BE IN OPERATION WHEN ONLY ONE OF THE COGENERATION SYSTEMS NO. 1 OR 2 IS OPERATING.
[RULE 1303(b)(2)-OFFSET]

19. WHEN BOTH COGENERATION SYSTEM NOS. 1 AND 2 ARE IN SIMULTANEOUS OPERATION, THE BOILER REFERENCED IN PERMIT NO. F32184 (A/N 252359) CANNOT BE OPERATED.

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[RULE 1303(b)(2)-OFFSET]

20. RECORDS OF DAILY OPERATION OF THE EXISTING BOILER AND THE COGENERATION SYSTEMS SHALL BE MAINTAINED BY LOMA LINDA UNIVERSITY AND MADE AVAILABLE TO THE DISTRICT UPON REQUEST.

[RULE 1303(b)(2)-OFFSET]

Periodic Monitoring:

21. THE OPERATOR SHALL DETERMINE COMPLIANCE WITH THE CO MASS EMISSION LIMIT(S) EITHER BY: (a) CONDUCTING A SOURCE TEST AT LEAST ONCE EVERY FIVE YEARS USING AQMD METHOD 100.1 OR 10.1; OR (b) CONDUCTING A TEST AT LEAST ANNUALLY USING A PORTABLE ANALYZER AND AQMD-APPROVED TEST METHOD.. THE TEST SHALL BE CONDUCTED WHEN THE EQUIPMENT IS OPERATING UNDER NORMAL CONDITIONS TO DEMONSTRATE COMPLIANCE WITH THE MASS EMISSION LIMITS IN CONDITION NO. 11. THE OPERATOR SHALL COMPLY WITH ALL GENERAL TESTING, REPORTING, AND RECORDKEEPING REQUIREMENTS IN SECTIONS E AND K OF THIS PERMIT.

[RULE 3004 (a)(4)]

22. THE OPERATOR SHALL CONDUCT AN INSPECTION FOR VISIBLE EMISSION FROM ALL STACKS AND OTHER EMISSION POINTS OF THIS EQUIPMENT ON AN ANNUAL BASIS WHENEVER THIS EQUIPMENT IS FIRED ON FUEL OIL FOR TRAINING/TESTING PURPOSE; AND AFTER EVERY 400 CUMULATIVE HOURS OF OPERATION ON DIESEL FUEL OR AFTER EVERY TWO MILLION GALLONS OF DIESEL FUEL COMBUSTED, TO BE COUNTED CUMULATIVELY OVER A FIVE YEAR PERIOD. THE INSPECTION SHALL BE CONDUCTED WHILE THE EQUIPMENT IS IN OPERATION AND DURING DAYLIGHT HOURS. IF ANY VISIBLE EMISSIONS (NOT INCLUDING CONDENSED WATER VAPOR) ARE DETECTED THAT LAST MORE THAN THREE MINUTES IN ANY ONE HOUR, THE OPERATOR SHALL EITHER:
- A. TAKE CORRECTIVE ACTION(S) THAT ELIMINATES THE VISIBLE EMISSIONS WITHIN 24 HOURS AND REPORT THE VISIBLE EMISSIONS AS A POTENTIAL DEVIATION IN THE SAME FASHION AS DEVIATIONS ARE REQUIRED TO BE REPORTED IN SECTION K OF THIS PERMIT; OR
 - B. HAVE A CARB-CERTIFIED SMOKE READER DETERMINE COMPLIANCE WITH THE OPACITY STANDARD, USING EPA METHOD 9 OR THE PROCEDURES IN THE CARB MANUAL "VISIBLE EMISSION EVALUATION", WITHIN THREE BUSINESS DAYS AND REPORT ANY DEVIATIONS TO AQMD.

IN ADDITION, THE OPERATOR SHALL KEEP THE RECORDS IN ACCORDANCE WITH THE RECORDKEEPING REQUIREMENTS IN SECTION K OF THIS PERMIT AND THE FOLLOWING RECORDS:

- A. STACK OR EMISSION POINT IDENTIFICATION;
- B. DESCRIPTION OF ANY CORRECTIVE ACTIONS TAKEN TO ABATE VISIBLE EMISSIONS;
- C. DATE AND TIME VISIBLE EMISSION WAS ABATED; AND
- D. VISIBLE EMISSION OBSERVATION RECORD BY A CERTIFIED SMOKE READER.

[RULE 3004 (a)(4)]

23. THE OPERATOR SHALL CONDUCT SOURCE TEST(S) IN ACCORDANCE WITH THE FOLLOWING SPECIFICATIONS:

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- A. THE TEST SHALL BE CONDUCTED AT LEAST ONCE DURING THE LIFE OF THE PERMIT.
- B. THE TEST SHALL BE CONDUCTED TO DETERMINE THE PARTICULATE EMISSIONS USING EPA METHOD 5.2 MEASURED OVER A 60 MINUTE AVERAGING TIME PERIOD.
- C. THE TEST SHALL BE CONDUCTED TO DEMONSTRATE COMPLIANCE WITH CONDITION NO. 13 (NATURAL GAS ONLY).
[RULE 3004 (a)(4)]

Emissions And Requirements:

24. THIS EQUIPMENT IS SUBJECT TO THE APPLICABLE REQUIREMENTS OF THE FOLLOWING RULES AND REGULATIONS:

NOx: 42 PPMV, RULE 1303(a)(1)-BACT
NOx: 21 PPMV, RULE 1134
CO: 2000 PPMV, RULE 407
SOx: 500 PPMV, RULE 407
PM: 0.1 GR/SCF, RULE 409
SOx: 2 LBS/DAY (ON NATURAL GAS), RULE 1303(b)(2)-OFFSET
SOx: 3 LBS/DAY (COMBINED COGEN UNITS 1 &2, ON NATURAL GAS), RULE 1303(b)(2)-OFFSET
SOx: 74 LBS/DAY (ON DIESEL), RULE 1303(b)(2)-OFFSET
SOx: 136 LBS/DAY (COMBINED COGEN UNITS 1 &2, ON DIESEL), RULE 1303(b)(2)-OFFSET
NOx: 191 LBS/DAY (ON NATURAL GAS), RULE 1303(b)(2)-OFFSET
NOx: 282 LBS/DAY (COMBINED COGEN UNITS 1 &2, ON NATURAL GAS), RULE 1303(b)(2)-OFFSET
NOx: 229 LBS/DAY (ON DIESEL), RULE 1303(b)(2)-OFFSET
NOx: 339 LBS/DAY (COMBINED COGEN UNITS 1 &2, ON DIESEL), RULE 1303(b)(2)-OFFSET
CO: 182 LBS/DAY (ON NATURAL GAS), RULE 1303(b)(2)-OFFSET
CO: 211 LBS/DAY (COMBINED COGEN UNITS 1 &2, ON NATURAL GAS), RULE 1303(b)(2)-OFFSET
CO: 466 LBS/DAY (ON DIESEL), RULE 1303(b)(2)-OFFSET
CO: 552 LBS/DAY (COMBINED COGEN UNITS 1 &2, ON DIESEL), RULE 1303(b)(2)-OFFSET
ROG: 36 LBS/DAY (ON NATURAL GAS), RULE 1303(b)(2)-OFFSET
ROG: 72 LBS/DAY (COMBINED COGEN UNITS 1 &2, ON NATURAL GAS), RULE 1303(b)(2)-OFFSET
ROG: 36 LBS/DAY (ON DIESEL), RULE 1303(b)(2)-OFFSET
ROG: 72 LBS/DAY (COMBINED COGEN UNITS 1 &2, ON DIESEL), RULE 1303(b)(2)-OFFSET
PM: 36 LBS/DAY (ON NATURAL GAS), RULE 1303(b)(2)-OFFSET
PM: 72 LBS/DAY (COMBINED COGEN UNITS 1 &2, ON NATURAL GAS), RULE 1303(b)(2)-OFFSET
PM: 62 LBS/DAY (ON DIESEL), RULE 1303(b)(2)-OFFSET
PM: 125 LBS/DAY (COMBINED COGEN UNITS 1 &2, ON DIESEL), RULE 1303(b)(2)-OFFSET
NOx: 150 PPM, 40 CFR60 SUBPART GG
SOx: 150 PPM, 40 CFR60 SUBPART GG

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PERMIT TO OPERATE

Permit No. F99256
A/N 480393

Equipment Description:

COGENERATION SYSTEM NO. 2 CONSISTING OF:

1. GAS TURBINE, DETROIT DIESEL ALLISON, MODEL 501-KH, 59353000 BTU/HR, NATURAL GAS OR DIESEL FIRED WITH STEAM AND WATER INJECTION, DRIVING A 6054 KILOWATT ELECTRICAL GENERATOR.
2. SUPERHEATER, UNFIRED, 21780 LBS/HR, MAXIMUM STEAM OUTPUT.
3. DUCT BURNER, COEN, 44211000 BTU/HR, LOW NOX BURNER, NATURAL GAS FIRED ONLY.
4. WASTE HEAT BOILER, ABCO, 47000 LBS/HR MAXIMUM STEAM OUTPUT, WITH AN EVAPORATOR, ECONOMIZER AND FEEDWATER HEATER.

Conditions:

1. OPERATION OF THIS EQUIPMENT MUST BE CONDUCTED IN COMPLIANCE WITH ALL DATA AND SPECIFICATIONS SUBMITTED WITH THE APPLICATION UNDER WHICH THIS PERMIT IS ISSUED UNLESS OTHERWISE NOTED BELOW.
[RULE 204]
2. THIS EQUIPMENT MUST BE PROPERLY MAINTAINED AND KEPT IN GOOD OPERATING CONDITION AT ALL TIMES.
[RULE 204]
3. THIS EQUIPMENT SHALL BE OPERATED AND MAINTAINED BY PERSONNEL PROPERLY TRAINED IN ITS OPERATION.
[RULE 204]
4. THE DUCT BURNER SHALL BE ONLY FIRED WITH NATURAL GAS.
[RULE 1134, RULE 1303(a)(1)-BACT]
5. A CONTINUOUS MONITORING SYSTEM SHALL BE INSTALLED AND OPERATED TO MEASURE THE COMBINED GAS TURBINE AND DUCT BURNER EXHAUST FOR NOX AND O₂ CONCENTRATIONS ON A DRY BASIS. THE SYSTEM SHALL ALSO CONVERT THE ACTUAL NOX CONCENTRATIONS TO CORRECTED NOX CONCENTRATIONS AT 15% OXYGEN ON A DRY BASIS AND CONTINUOUSLY RECORD THE DRY NOX CONCENTRATIONS, DRY OXYGEN CONCENTRATIONS AND CORRECTED NOX CONCENTRATIONS AT 15% OXYGEN DRY. IN ADDITION, THE SYTEM SHALL MONITOR AND RECORD THE DAILY NOX EMISSIONS IN POUNDS PER DAY FROM EACH COGENERATION SYSTEM. THIS SYSTEM SHALL COMPLY WITH THE REQUIREMENTS OF RULE 218.

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A REPORT SHALL BE SUBMITTED TO THE DISTRICT ON A MONTHLY BASIS. THIS MONTHLY REPORTS SHALL INCLUDE, BUT IS NOT LIMITED TO THE FOLLOWING:

1. DAY OF THE MONTH
 2. MONITOR "ON" HOURS
 3. GAS TURBINE OPERATING HOURS
 4. HOUR OF PEAK NOX
 5. MAXIMUM NOX EMISSIONS (PPMVD AT 15% O₂)
 6. MAXIMUM NOX EMISSIONS (POUNDS PER DAY)
 7. AVERAGE NOX EMISSIONS (PPMVD AT 15% O₂)
 8. AVERAGE NOX EMISSIONS (POUNDS PER DAY)
 9. TOTAL NOX EMISSIONS (POUNDS PER DAY)
 10. EXHAUST FLOW RATE (DSCFM)
 11. PERCENT OF DUCT BURNER FUEL
 12. ANY START UP, SHUTDOWN OR MALFUNCTION OF THE MONITOR
[RULE 1134, RULE 1303(b)(2)-OFFSET, RULE 218]
6. A CONTINUOUS MONITORING SYSTEM SHALL BE INSTALLED AND OPERATED TO MONITOR AND RECORD THE FUEL CONSUMPTION AND THE RATIO OF WATER TO FUEL BEING FIRED IN THE TURBINE. THIS SYSTEM SHALL BE ACCURATE TO WITHIN PLUS MINUS 5 PERCENT AND SHALL BE APPROVED BY THE EXECUTIVE OFFICER PRIOR TO INSTALLATION.
[RULE 1134, RULE 1303(b)(2)-OFFSET, RULE 218]
7. THE OPERATOR SHALL KEEP RECORDS OF RESULTS FROM THE MONITORS REQUIRED BY PERMIT CONDITION NOS. 5 AND 6. THE RECORDS SHALL BE MAINTAINED ON FILE FOR AT LEAST FIVE YEARS AND SHALL BE MADE AVAILABLE UPON REQUEST TO DISTRICT PERSONNEL.
[RULE 1134, RULE 1303(b)(2)-OFFSET]
8. WHEN FIRING DIESEL FUEL, EMISSIONS OF OXIDES OF NITROGEN AS NO₂ FROM THE COMBINED TURBINE AND DUCT BURNER EXHAUST SHALL NOT EXCEED 42 PPMV, CALCULATED DRY, AT 15% OXYGEN.
[RULE 1303(a)(1)-BACT]
9. WHEN FIRING NATURAL GAS, EMISSIONS OF OXIDES OF NITROGEN AS NO₂ FROM THE COMBINED TURBINE AND DUCT BURNER EXHAUST SHALL NOT EXCEED 21 PPMV, CALCULATED DRY, AT 15% OXYGEN.
[RULE 1134]
10. OXIDES OF SULFUR EMISSIONS REPORTED AS SO₂ FROM THIS COGENERATION PERMIT UNIT SHALL NOT EXCEED 2 POUNDS PER DAY WHILE THE TURBINE IS FIRING NATURAL GAS AND 74 POUNDS PER DAY WHILE THE TURBINE IS FIRING DIESEL FUEL. THE COMBINED SOX EMISSIONS REPORTED AS SO₂ FROM COGENERATION SYSTEM NUMBERS 1 AND 2 SHALL NOT EXCEED 3 POUNDS PER DAY WHILE THE TURBINES ARE FIRING NATURAL GAS AND 136 POUNDS PER DAY WHILE THE TURBINES ARE FIRING DIESEL FUEL.
[RULE 1303(b)(2)-OFFSET]
11. OXIDES OF NITROGEN EMISSIONS REPORTED AS NO₂ FROM THIS COGENERATION PERMIT UNIT SHALL NOT EXCEED 191 POUNDS PER DAY WHILE THE TURBINE IS FIRING NATURAL GAS AND 229 POUNDS PER DAY WHILE THE TURBINE IS FIRING DIESEL FUEL. THE COMBINED NOX

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EMISSIONS REPORTED AS NO₂ FROM COGENERATION SYSTEM NUMBERS 1 AND 2 SHALL NOT EXCEED 282 POUNDS PER DAY WHILE THE TURBINES ARE FIRING NATURAL GAS AND 339 POUNDS PER DAY WHILE THE TURBINES ARE FIRING DIESEL FUEL.
[RULE 1303(b)(2)-OFFSET]

12. CARBON MONOXIDE EMISSIONS FROM THIS COGENERATION PERMIT UNIT SHALL NOT EXCEED 182 POUNDS PER DAY WHILE THE TURBINE IS FIRING NATURAL GAS AND 466 POUNDS PER DAY WHILE THE TURBINE IS FIRING DIESEL FUEL. THE COMBINED CO EMISSIONS FROM COGENERATION SYSTEM NUMBERS 1 AND 2 SHALL NOT EXCEED 211 POUNDS PER DAY WHILE THE TURBINES ARE FIRING NATURAL GAS AND 552 POUNDS PER DAY WHILE THE TURBINES ARE FIRING DIESEL FUEL.
[RULE 1303(b)(2)-OFFSET]
13. ORGANIC EMISSIONS FROM THIS COGENERATION PERMIT UNIT SHALL NOT EXCEED 36 POUNDS PER DAY WHILE THE TURBINE IS FIRING NATURAL GAS AND 36 POUNDS PER DAY WHILE THE TURBINE IS FIRING DIESEL FUEL. THE COMBINED ORGANIC EMISSIONS FROM COGENERATION SYSTEM NUMBERS 1 AND 2 SHALL NOT EXCEED 72 POUNDS PER DAY WHILE THE TURBINES ARE FIRING NATURAL GAS AND 72 POUNDS PER DAY WHILE THE TURBINES ARE FIRING DIESEL FUEL.
[RULE 1303(b)(2)-OFFSET]
14. PARTICULATE EMISSIONS FROM THIS COGENERATION PERMIT UNIT SHALL NOT EXCEED 36 POUNDS PER DAY WHILE THE TURBINE IS FIRING NATURAL GAS AND 62 POUNDS PER DAY WHILE THE TURBINE IS FIRING DIESEL FUEL. THE COMBINED PARTICULATE EMISSIONS FROM COGENERATION SYSTEM NUMBERS 1 AND 2 SHALL NOT EXCEED 72 POUNDS PER DAY WHILE THE TURBINES ARE FIRING NATURAL GAS AND 125 POUNDS PER DAY WHILE THE TURBINES ARE FIRING DIESEL FUEL.
[RULE 1303(b)(2)-OFFSET]
15. DIESEL FUEL MAY BE BURNED IN THE TURBINE ONLY IN THE EVENT OF A NATURAL GAS CURTAILMENT OR IN THE EVENT OF AN EMERGENCY FAILURE OR MAINTENANCE REQUIREMENTS OF THE NATURAL GAS DELIVERY SYSTEM FOR BOILER TESTING WHICH IS NOT TO EXCEED ONE HALF HOUR PER MONTH.
[RULE 1303(b)(2)-OFFSET]
16. DAILY RECORDS OF DIESEL FUEL CONSUMPTION SHALL BE MAINTAINED AND MADE AVAILABLE UPON REQUEST TO DISTRICT PERSONNEL.
[RULE 1303(b)(2)-OFFSET]
17. THE MAXIMUM TOTAL QUANTITY OF NATURAL GAS USED IN ANY ONE HOUR SHALL NOT EXCEED 56530 CUBIC FEET FOR THE GAS TURBINE AND 42110 CUBIC FEET FOR THE DUCT BURNER.
[RULE 1303(b)(2)-OFFSET]
18. THE BOILER REFERENCED IN PERMIT NO. F32184 (A/N 252359) MAY BE IN OPERATION WHEN ONLY ONE OF THE COGENERATION SYSTEMS NO. 1 OR 2 IS OPERATING.
[RULE 1303(b)(2)-OFFSET]
19. WHEN BOTH COGENERATION SYSTEM NOS. 1 AND 2 ARE IN SIMULTANEOUS OPERATION, THE BOILER REFERENCED IN PERMIT NO. F32184 (A/N 252359) CANNOT BE OPERATED.

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[RULE 1303(b)(2)-OFFSET]

20. RECORDS OF DAILY OPERATION OF THE EXISTING BOILERS AND THE COGENERATION SYSTEMS SHALL BE MAINTAINED BY LOMA LINDA UNIVERSITY AND MADE AVAILABLE TO THE DISTRICT UPON REQUEST.
[RULE 1303(b)(2)-OFFSET]

Periodic Monitoring:

21. THE OPERATOR SHALL DETERMINE COMPLIANCE WITH THE CO EMISSION LIMIT(S) EITHER BY: (a) CONDUCTING A SOURCE TEST AT LEAST ONCE EVERY FIVE YEARS USING AQMD METHOD 100.1 OR 10.1; OR (b) CONDUCTING A TEST AT LEAST ANNUALLY USING A PORTABLE ANALYZER AND AQMD-APPROVED TEST METHOD.. THE TEST SHALL BE CONDUCTED WHEN THE EQUIPMENT IS OPERATING UNDER NORMAL CONDITIONS TO DEMONSTRATE COMPLIANCE WITH THE EMISSION LIMITS IN CONDITION NO. 11. THE OPERATOR SHALL COMPLY WITH ALL GENERAL TESTING, REPORTING, AND RECORDKEEPING REQUIREMENTS IN SECTIONS E AND K OF THIS PERMIT.
[RULE 3004 (a)(4)]

22. THE OPERATOR SHALL CONDUCT AN INSPECTION FOR VISIBLE EMISSION FROM ALL STACKS AND OTHER EMISSION POINTS OF THIS EQUIPMENT ON AN ANNUAL BASIS WHENEVER THIS EQUIPMENT IS FIRED ON FUEL OIL FOR TRAINING/TESTING PURPOSE; AND AFTER EVERY 400 CUMULATIVE HOURS OF OPERATION ON DIESEL FUEL OR AFTER EVERY TWO MILLION GALLONS OF DIESEL FUEL COMBUSTED, TO BE COUNTED CUMULATIVELY OVER A FIVE YEAR PERIOD. THE INSPECTION SHALL BE CONDUCTED WHILE THE EQUIPMENT IS IN OPERATION AND DURING DAYLIGHT HOURS. IF ANY VISIBLE EMISSIONS (NOT INCLUDING CONDENSED WATER VAPOR) ARE DETECTED THAT LAST MORE THAN THREE MINUTES IN ANY ONE HOUR, THE OPERATOR SHALL EITHER:
- A. TAKE CORRECTIVE ACTION(S) THAT ELIMINATES THE VISIBLE EMISSIONS WITHIN 24 HOURS AND REPORT THE VISIBLE EMISSIONS AS A POTENTIAL DEVIATION IN THE SAME FASHION AS DEVIATIONS ARE REQUIRED TO BE REPORTED IN SECTION K OF THIS PERMIT; OR
 - B. HAVE A CARB-CERTIFIED SMOKE READER DETERMINE COMPLIANCE WITH THE OPACITY STANDARD, USING EPA METHOD 9 OR THE PROCEDURES IN THE CARB MANUAL "VISIBLE EMISSION EVALUATION", WITHIN THREE BUSINESS DAYS AND REPORT ANY DEVIATIONS TO AQMD.

IN ADDITION, THE OPERATOR SHALL KEEP THE RECORDS IN ACCORDANCE WITH THE RECORDKEEPING REQUIREMENTS IN SECTION K OF THIS PERMIT AND THE FOLLOWING RECORDS:

- A. STACK OR EMISSION POINT IDENTIFICATION;
 - B. DESCRIPTION OF ANY CORRECTIVE ACTIONS TAKEN TO ABATE VISIBLE EMISSIONS;
 - C. DATE AND TIME VISIBLE EMISSION WAS ABATED; AND
 - D. VISIBLE EMISSION OBSERVATION RECORD BY A CERTIFIED SMOKE READER.
- [RULE 3004 (a)(4)]
23. THE OPERATOR SHALL CONDUCT SOURCE TEST(S) IN ACCORDANCE WITH THE FOLLOWING SPECIFICATIONS:
- A. THE TEST SHALL BE CONDUCTED AT LEAST ONCE DURING THE LIFE OF THE PERMIT.

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- B. THE TEST SHALL BE CONDUCTED TO DETERMINE THE PARTICULATE EMISSIONS USING EPA METHOD 5.2 MEASURED OVER A 60 MINUTE AVERAGING TIME PERIOD.
- C. THE TEST SHALL BE CONDUCTED TO DEMONSTRATE COMPLIANCE WITH CONDITION NO. 13 (NATURAL GAS ONLY).
[RULE 3004 (a)(4)]

Emissions And Requirements:

24. THIS EQUIPMENT IS SUBJECT TO THE APPLICABLE REQUIREMENTS OF THE FOLLOWING RULES AND REGULATIONS:

NOx: 42 PPMV, RULE 1303(a)(1)-BACT
NOx: 21 PPMV, RULE 1134
CO: 2000 PPMV, RULE 407
SOx: 500 PPMV, RULE 407
PM: 0.1 GR/SCF, RULE 409
SOx: 2 LBS/DAY (ON NATURAL GAS), RULE 1303(b)(2)-OFFSET
SOx: 3 LBS/DAY (COMBINED COGEN UNITS 1 &2, ON NATURAL GAS), RULE 1303(b)(2)-OFFSET
SOx: 74 LBS/DAY (ON DIESEL), RULE 1303(b)(2)-OFFSET
SOx: 136 LBS/DAY (COMBINED COGEN UNITS 1 &2, ON DIESEL), RULE 1303(b)(2)-OFFSET
NOx: 191 LBS/DAY (ON NATURAL GAS), RULE 1303(b)(2)-OFFSET
NOx: 282 LBS/DAY (COMBINED COGEN UNITS 1 &2, ON NATURAL GAS), RULE 1303(b)(2)-OFFSET
NOx: 229 LBS/DAY (ON DIESEL), RULE 1303(b)(2)-OFFSET
NOx: 339 LBS/DAY (COMBINED COGEN UNITS 1 &2, ON DIESEL), RULE 1303(b)(2)-OFFSET
CO: 182 LBS/DAY (ON NATURAL GAS), RULE 1303(b)(2)-OFFSET
CO: 211 LBS/DAY (COMBINED COGEN UNITS 1 &2, ON NATURAL GAS), RULE 1303(b)(2)-OFFSET
CO: 466 LBS/DAY (ON DIESEL), RULE 1303(b)(2)-OFFSET
CO: 552 LBS/DAY (COMBINED COGEN UNITS 1 &2, ON DIESEL), RULE 1303(b)(2)-OFFSET
ROG: 36 LBS/DAY (ON NATURAL GAS), RULE 1303(b)(2)-OFFSET
ROG: 72 LBS/DAY (COMBINED COGEN UNITS 1 &2, ON NATURAL GAS), RULE 1303(b)(2)-OFFSET
ROG: 36 LBS/DAY (ON DIESEL), RULE 1303(b)(2)-OFFSET
ROG: 72 LBS/DAY (COMBINED COGEN UNITS 1 &2, ON DIESEL), RULE 1303(b)(2)-OFFSET
PM: 36 LBS/DAY (ON NATURAL GAS), RULE 1303(b)(2)-OFFSET
PM: 72 LBS/DAY (COMBINED COGEN UNITS 1 &2, ON NATURAL GAS), RULE 1303(b)(2)-OFFSET
PM: 62 LBS/DAY (ON DIESEL), RULE 1303(b)(2)-OFFSET
PM: 125 LBS/DAY (COMBINED COGEN UNITS 1 &2, ON DIESEL), RULE 1303(b)(2)-OFFSET
NOx: 150 PPM, 40 CFR60 SUBPART GG
SOx: 150 PPM, 40 CFR60 SUBPART GG

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PERMIT TO CONSTRUCT/OPERATE

Permit No. G7654
A/N 494678

Equipment Description:

INTERNAL COMBUSTION ENGINE, CATERPILLAR, MODEL C-27, DIESEL-FUELED, EMERGENCY ELECTRICAL GENERATION, 12 CYLINDERS, TURBOCHARGED, AFTERCOOLED, RATED AT 998 BHP, EQUIPPED WITH A DIESEL PARTICULATE FILTER, CLEANAIR SYSTEMS, MODEL PERMIT, AND A BACKPRESSURE MONITOR, DATA LOGGER AND ALARM SYSTEM.

Conditions:

1. OPERATION OF THIS EQUIPMENT SHALL BE CONDUCTED IN ACCORDANCE WITH ALL DATA AND SPECIFICATIONS SUBMITTED WITH THE APPLICATION UNDER WHICH THIS PERMIT IS ISSUED UNLESS OTHERWISE NOTED BELOW.
[RULE 204]
2. THIS EQUIPMENT SHALL BE PROPERLY MAINTAINED AND KEPT IN GOOD OPERATING CONDITION AT ALL TIMES.
[RULE 204]
3. THIS ENGINE SHALL NOT BE OPERATED MORE THAN A TOTAL OF 200 HOURS IN ANY ONE YEAR WHICH INCLUDES NO MORE THAN 50 HOURS FOR MAINTENANCE AND PERFORMANCE TESTING.
[RULE 1304(a)-MODELING, RULE 1110.2, RULE 1470]
4. ENGINE OPERATION FOR MAINTENANCE AND TESTING PURPOSES SHALL NOT EXCEED 4.2 HOURS IN ANY ONE MONTH.
[RULE 1303(b)(2)-OFFSET]
5. OPERATION BEYOND THE 50 HOURS PER YEAR ALLOTTED FOR ENGINE MAINTENANCE AND TESTING SHALL BE ALLOWED ONLY IN THE EVENT OF A LOSS OF GRID POWER OR UP TO 30 MINUTES PRIOR TO A ROTATING OUTAGE, PROVIDED THAT THE UTILITY DISTRIBUTION COMPANY HAS ORDERED ROTATING OUTAGES IN THE CONTROL AREA WHERE THE ENGINE IS LOCATED OR HAS INDICATED THAT IT EXPECTS TO ISSUE SUCH AN ORDER AT A CERTAIN TIME, AND THE ENGINE IS LOCATED IN A UTILITY SERVICE BLOCK THAT IS SUBJECT TO THE ROTATING OUTAGE. ENGINE OPERATION SHALL BE TERMINATED IMMEDIATELY AFTER THE UTILITY DISTRIBUTION COMPANY ADVISES THAT A ROTATING OUTAGE IS NO LONGER IMMINENT OR IN EFFECT.
[RULE 1304(a)-MODELING AND OFFSET, RULE 1110.2, RULE 1470]
6. THE ENGINE SHALL NOT BE OPERATED FOR NON-EMERGENCY USE BETWEEN THE HOURS OF 7:30 A.M. AND 3:30 P.M. ON DAYS WHEN SCHOOL IS IN SESSION.
[RULE 1470]

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7. THIS EQUIPMENT SHALL NOT BE OPERATED UNLESS ITS EXHAUST IS VENTED TO A DIESEL PARTICULATE FILTER SYSTEM WHICH IS IN FULL OPERATION AND IN GOOD OPERATING CONDITION AT ALL TIMES.
[RULE 1470]
8. THIS ENGINE SHALL NOT BE OPERATED IN IDLE MODE FOR MORE THAN 240 CONSECUTIVE MINUTES.
[RULE 1470]
9. THE OPERATOR SHALL INSTALL A BACKPRESSURE AND TEMPERATURE MONITOR AND ALARM SYSTEM THAT CONTINUOUSLY RECORDS AND DATA LOGS THE TEMPERATURE AND BACKPRESSURE OF THE EXHAUST AS WELL AS DATE AND TIME OF EQUIPMENT OPERATION.
[RULE 1470]
10. THE BACKPRESSURE AND TEMPERATURE MONITOR AND ALARM SYSTEM SHALL BE PROGRAMMED TO INTERFACE WITH THE ENGINE CONTROL SYSTEM TO AUTOMATICALLY SHUT THE ENGINE DOWN WHENEVER THE BACKPRESSURE EXCEEDS THE MAXIMUM BACKPRESSURE SETTING SPECIFIED BY THE FILTER MANUFACTURER.
[RULE 1470]
11. THE ALARM SYSTEM SHALL BE CAPABLE OF NOTIFYING THE OPERATOR WHEN HIGH BACKPRESSURE IS APPROACHED THROUGH VISUAL WARNING LIGHTS, SOUNDING AN AUDIBLE ALARM, OR BE SENDING A REMOTE ALARM SIGNAL TO THE OPERATOR.
[RULE 1470]
12. THE OPERATOR SHALL REGENERATE THE DIESEL PARTICULATE FILTER AFTER EVERY 10 COLD START-UPS OR WHENEVER THE BACKPRESSURE MONITOR AND ALARM SYSTEM DISPLAYS A WARNING SIGNAL, SOUNDS AN AUDIBLE ALARM, OR SENDS A REMOTE ALARM SIGNAL TO THE OPERATOR. IN ORDER TO ACHIEVE FILTER REGENERATION, THE OPERATOR SHALL RUN THE ENGINE UNTIL THE EXHAUST TEMPERATURE EXCEEDS 300 DEGREES CELSIUS (572 DEGREES FAHRENHEIT) OR ABOVE 40% LOAD UNTIL THE BACKPRESSURE MONITORING SYSTEM INDICATES A NORMAL BACKPRESSURE READING.
[RULE 1470]
13. THE OPERATOR SHALL KEEP RECORDS IN A MANNER APPROVED BY THE DISTRICT FOR THE FOLLOWING PARAMETERS OR ITEMS:
 - A. DATA COLLECTED FROM THE DATA LOGGER THAT INCLUDES THE BACKPRESSURE IN INCHES OF WATER COLUMN, TEMPERATURE IN FAHRENHEIT AND THE DATE AND TIME OF ENGINE OPERATION
 - B. BACKPRESSURE SET POINTS USED TO PROGRAM THE BACKPRESSURE MONITOR AND ALARM SYSTEM
 - C. DATE AND TIME CATALYST CLEANING OR REPLACEMENT

RECORDS SHALL BE RETAINED FOR A PERIOD OF FIVE YEARS AND MADE AVAILABLE TO DISTRICT PERSONNEL UPON REQUEST.
[RULE 1470]

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14. AN ENGINE OPERATING LOG SHALL BE MAINTAINED WHICH SHALL ON A MONTHLY BASIS INCLUDE MANUAL AND AUTOMATIC OPERATION AND SHALL LIST ALL ENGINE OPERATIONS IN EACH OF THE FOLLOWING AREAS:

- A. EMERGENCY USE HOURS OF OPERATION
- B. MAINTENANCE AND TESTING HOURS
- C. OTHER OPERATING HOURS (DESCRIBE THE REASON FOR OPERATION)

IN ADDITION, EACH TIME THE ENGINE IS STARTED MANUALLY, THE LOG SHALL INCLUDE THE DATE OF OPERATION AND THE TIMER READING IN HOURS AT THE BEGINNING AND END OF OPERATION. THE LOG SHALL BE KEPT FOR A MINIMUM OF FIVE CALENDAR YEARS PRIOR TO THE CURRENT YEAR AND MADE AVAILABLE TO DISTRICT PERSONNEL UPON REQUEST. THE TOTAL HOURS OF OPERATION FOR THE PREVIOUS CALENDAR YEAR SHALL BE RECORDED SOMETIME DURING THE FIRST 15 DAYS OF JANUARY OF EACH YEAR.

[RULE 1303(b)(2)-OFFSET, RULE 1110.2, RULE 1470]

15. THIS ENGINE SHALL NOT BE USED AS PART OF AN INTERRUPTIBLE SERVICE CONTRACT IN WHICH A FACILITY RECEIVES A PAYMENT OR REDUCED RATES IN RETURN FOR REDUCING ELECTRIC LOAD ON THE GRID WHEN REQUESTED TO DO SO BY THE UTILITY OR GRID OPERATOR.
[RULE 1303(a)-BACT]
16. THE OPERATOR SHALL COMPLY WITH ALL APPLICABLE RECORDKEEPING, REPORTING AND MONITORING REQUIREMENTS OF RULE 1470.
[RULE 1470]

Periodic Monitoring:

17. THE OPERATOR SHALL INSTALL AND MAINTAIN A NON-RESETTABLE ELAPSED TIME METER TO ACCURATELY INDICATE THE ELAPSED OPERATING TIME OF THE ENGINE.
[RULE 3004 (a)(4)]

Emissions And Requirements:

18. THIS EQUIPMENT IS SUBJECT TO THE APPLICABLE REQUIREMENTS OF THE FOLLOWING RULES AND REGULATIONS:
- NO_x+NMHC: 4.8 GRAMS/BHP-HR, RULE 1303(a)(1)-BACT
 - CO: 2.6 GRAMS/BHP-HR, RULE 1303(a)(1)-BACT
 - PM: 0.15 GRAM/BHP-HR, RULE 1303(a)(1)-BACT
 - PM: 0.01 GRAM/BHP-HR, RULE 1470
 - PM: RULE 404, SEE APPENDIX B FOR EMISSION LIMITS

FACILITY PERMIT TO OPERATE LOMA LINDA UNIV

PERMIT TO CONSTRUCT/OPERATE

**Permit No. G3943
A/N 494679**

Equipment Description:

INTERNAL COMBUSTION ENGINE, CATERPILLAR, MODEL C-9, DIESEL-FUELED, EMERGENCY ELECTRICAL GENERATION, 6 CYLINDERS, TURBOCHARGED, AFTERCOOLED, RATED AT 398 BHP.

Conditions:

1. OPERATION OF THIS EQUIPMENT SHALL BE CONDUCTED IN ACCORDANCE WITH ALL DATA AND SPECIFICATIONS SUBMITTED WITH THE APPLICATION UNDER WHICH THIS PERMIT IS ISSUED UNLESS OTHERWISE NOTED BELOW.
[RULE 204]
2. THIS EQUIPMENT SHALL BE PROPERLY MAINTAINED AND KEPT IN GOOD OPERATING CONDITION AT ALL TIMES.
[RULE 204]
3. THIS ENGINE SHALL NOT BE OPERATED MORE THAN A TOTAL OF 200 HOURS IN ANY ONE YEAR WHICH INCLUDES NO MORE THAN 50 HOURS FOR MAINTENANCE AND PERFORMANCE TESTING.
[RULE 1304(a)-MODELING, RULE 1110.2, RULE 1470]
4. ENGINE OPERATION FOR MAINTENANCE AND TESTING PURPOSES SHALL NOT EXCEED 4.2 HOURS IN ANY ONE MONTH.
[RULE 1303(b)(2)-OFFSET]
5. OPERATION BEYOND THE 50 HOURS PER YEAR ALLOTTED FOR ENGINE MAINTENANCE AND TESTING SHALL BE ALLOWED ONLY IN THE EVENT OF A LOSS OF GRID POWER OR UP TO 30 MINUTES PRIOR TO A ROTATING OUTAGE, PROVIDED THAT THE UTILITY DISTRIBUTION COMPANY HAS ORDERED ROTATING OUTAGES IN THE CONTROL AREA WHERE THE ENGINE IS LOCATED OR HAS INDICATED THAT IT EXPECTS TO ISSUE SUCH AN ORDER AT A CERTAIN TIME, AND THE ENGINE IS LOCATED IN A UTILITY SERVICE BLOCK THAT IS SUBJECT TO THE ROTATING OUTAGE. ENGINE OPERATION SHALL BE TERMINATED IMMEDIATELY AFTER THE UTILITY DISTRIBUTION COMPANY ADVISES THAT A ROTATING OUTAGE IS NO LONGER IMMINENT OR IN EFFECT.
[RULE 1304(a)-MODELING AND OFFSET, RULE 1110.2, RULE 1470]
6. AN ENGINE OPERATING LOG SHALL BE MAINTAINED WHICH SHALL ON A MONTHLY BASIS INCLUDE MANUAL AND AUTOMATIC OPERATION AND SHALL LIST ALL ENGINE OPERATIONS IN EACH OF THE FOLLOWING AREAS:
 - A. EMERGENCY USE HOURS OF OPERATION
 - B. MAINTENANCE AND TESTING HOURS

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C. OTHER OPERATING HOURS (DESCRIBE THE REASON FOR OPERATION)

IN ADDITION, EACH TIME THE ENGINE IS STARTED MANUALLY, THE LOG SHALL INCLUDE THE DATE OF OPERATION AND THE TIMER READING IN HOURS AT THE BEGINNING AND END OF OPERATION. THE LOG SHALL BE KEPT FOR A MINIMUM OF FIVE CALENDAR YEARS PRIOR TO THE CURRENT YEAR AND MADE AVAILABLE TO DISTRICT PERSONNEL UPON REQUEST. THE TOTAL HOURS OF OPERATION FOR THE PREVIOUS CALENDAR YEAR SHALL BE RECORDED SOMETIME DURING THE FIRST 15 DAYS OF JANUARY OF EACH YEAR.
[RULE 1303(b)(2)-OFFSET, RULE 1110.2, RULE 1470]

7. THIS ENGINE SHALL NOT BE USED AS PART OF AN INTERRUPTIBLE SERVICE CONTRACT IN WHICH A FACILITY RECEIVES A PAYMENT OR REDUCED RATES IN RETURN FOR REDUCING ELECTRIC LOAD ON THE GRID WHEN REQUESTED TO DO SO BY THE UTILITY OR GRID OPERATOR.
[RULE 1303(a)-BACT]
8. THE OPERATOR SHALL COMPLY WITH ALL APPLICABLE RECORDKEEPING, REPORTING AND MONITORING REQUIREMENTS OF RULE 1470.
[RULE 1470]

Periodic Monitoring:

9. THE OPERATOR SHALL INSTALL AND MAINTAIN A NON-RESETTABLE ELAPSED TIME METER TO ACCURATELY INDICATE THE ELAPSED OPERATING TIME OF THE ENGINE.
[RULE 3004 (a)(4)]

Emissions And Requirements:

10. THIS EQUIPMENT IS SUBJECT TO THE APPLICABLE REQUIREMENTS OF THE FOLLOWING RULES AND REGULATIONS:
NOx+NMHC: 3.0 GRAMS/BHP-HR, RULE 1303(a)(1)-BACT
CO: 2.6 GRAMS/BHP-HR, RULE 1303(a)(1)-BACT
PM: 0.15 GRAMS/BHP-HR, RULE 1303(a)(1)-BACT
PM: 0.15 GRAMS/BHP-HR, RULE 1470
PM: RULE 404, SEE APPENDIX B FOR EMISSION LIMITS

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PERMIT TO CONSTRUCT

**Permit No. TBD
A/N 531846**

Equipment Description:

MODIFICATION OF INCINERATOR, PATHOLOGICAL, MULTIPLE CHAMBER, ECO LAIRE E.C.P. INC., MODEL 100 PWI, 100 POUNDS PER HOUR CAPACITY, 6' DIA. X 8' H. (PRIMARY CHAMBER), 4'-6" DIA. X 8' L., SECONDARY CHAMBER WITH TWO 800,000 BTU/HR PRIMARY GAS BURNERS WITH A 1.3 HP UNDERFIRE BLOWER AND A 1,200,000 BTU/HR SECONDARY GAS BURNER WITH A 3 HP BLOWER BY REPLACING THE EXISTING PRIMARY BURNERS WITH TWO MAXON M-PAKT BURNERS, EACH RATED AT 900,000 BTU/HR.

Conditions:

1. OPERATION OF THIS EQUIPMENT MUST BE CONDUCTED IN COMPLIANCE WITH ALL DATA AND SPECIFICATIONS SUBMITTED WITH THE APPLICATION UNDER WHICH THIS PERMIT IS ISSUED UNLESS OTHERWISE NOTED BELOW.
[RULE 204]
2. THIS EQUIPMENT MUST BE PROPERLY MAINTAINED AND KEPT IN GOOD OPERATING CONDITION AT ALL TIMES.
[RULE 204]
3. THIS EQUIPMENT SHALL NOT EMIT MORE THAN 60 PPM OF OXIDES OF NITROGEN (NOX), CALCULATED AS NO₂, MEASURED BY VOLUME ON A DRY BASIS AT 3% O₂.
[RULE 1147]
4. THE COMBUSTION BURNERS SHALL BE INSPECTED AND MAINTAINED PER THE MANUFACTURER'S SCHEDULE AND SPECIFICATIONS. RECORDS SHALL BE KEPT ON FILE FOR INSPECTIONS AND MAINTENANCE, INCLUDING THE SCHEDULE AND INSTRUCTIONS, FOR AT LEAST THREE YEARS.
[RULE 1147]
5. THIS EQUIPMENT SHALL NOT BURN ANY CHLORINATED MATERIALS, INCLUDING BUT NOT LIMITED TO PLASTICS, PACKAGING, TEXTILES, FABRIC, CONTAINERS, TUBING OR ANY OTHER GENERAL REFUSE THAT MAY CONTAIN, OR MAY BE CONTAMINATED WITH, CHLORINATED COMPOUNDS.
[RULE 1406]
6. THE TOTAL QUANTITY OF MATERIAL CHARGED TO THIS INCINERATOR SHALL NOT EXCEED 100 POUNDS PER HOUR OR 800 POUNDS PER DAY.
[RULE 1303(b)(2)-OFFSET]
7. A TEMPERATURE OF NOT LESS THAN 2000 DEGREES F SHALL BE MAINTAINED IN THE AFTERBURNER CHAMBER WHEN THE INCINERATOR IS IN OPERATION.
[RULE 1303(a)-BACT]

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8. THE CHARGING DOOR SHALL REMAIN CLOSED EXCEPT DURING CHARGING.
[RULE 1303(a)-BACT]
9. THE PRIMARY GAS BURNER SHALL AUTOMATICALLY SHUT OFF WHEN THE CHARGING DOOR IS OPENED.
[RULE 1303(a)-BACT]
10. THE EQUIPMENT SHALL BE PROPERLY MAINTAINED AND KEPT IN GOOD OPERATING CONDITION AT ALL TIMES AND OPERATED BY PERSONNEL PROPERLY TRAINED IN ITS OPERATION.
[RULE 1303(a)-BACT]
11. COMPLETE RECORDS OF THE AMOUNT OF MATERIAL PROCESSED PER DAY IN THIS INCINERATOR SHALL BE MAINTAINED IN A FORM APPROVED IN WRITING BY THE EXECUTIVE OFFICER. SUCH RECORDS SHALL BE MAINTAINED FOR A PERIOD OF NOT LESS THAN FIVE YEARS AND MADE AVAILABLE TO THE DISTRICT UPON REQUEST.
[RULE 1303(a)-BACT]
12. THIS UNIT SHALL OPERATE AS A CO-FIRED COMBUSTOR AND SHALL BE LIMITED TO BURNING MEDICAL/INFECTIOUS WASTE, AS DEFINED IN 40 CFR 62.14490, THAT IS LESS THAN 10 PERCENT OF THE WEIGHT OF WHICH IS COMPRISED, IN AGGREGATE, OF THE MATERIAL BURNED IN THE INCINERATOR. THE PERCENTAGE SHALL BE MEASURED ON A CALENDAR QUARTER BASIS.
[40 CFR SUBPART Ce]
13. THE FACILITY SHALL MAINTAIN RECORDS ON A CALENDAR QUARTER BASIS OF THE WEIGHT OF MATERIAL PROCESSED AND THE WEIGHT OF THE MEDICAL/INFECTIOUS WASTE COMBUSTED TO DEMONSTRATE THAT THE UNIT CONTINUES TO MEET THE DEFINITION OF A CO-FIRED COMBUSTOR IN 40 CFR 62.14490.
[40 CFR SUBPART Ce]
14. THIS EQUIPMENT SHALL COMPLY WITH RULE 1147.
[RULE 1147]
15. THE OWNER OR OPERATOR OF THIS EQUIPMENT SHALL CONDUCT SOURCE TESTS ON THE EQUIPMENT UNDER THE FOLLOWING CONDITIONS:
 - A. A SOURCE TEST PROTOCOL SHALL BE SUBMITTED FOR THE EXECUTIVE OFFICER'S REVIEW AND APPROVAL PRIOR TO THE COMMENCEMENT OF TESTING.
 - B. SOURCE TESTING SHALL BE CONDUCTED WITHIN 30 DAYS AFTER ACHIEVING MAXIMUM PRODUCTION RATE AT WHICH THE EQUIPMENT WILL BE OPERATED, BUT NO LATER THAN 90 DAYS AFTER INITIAL START-UP.
 - C. THE SOURCE TESTS SHALL BE PERFORMED TO VERIFY COMPLIANCE WITH THE NOX EMISSION LIMIT SPECIFIED IN CONDITION NO. 3.
 - D. THE SOURCE TESTS SHALL BE CONDUCTED IN ACCORDANCE WITH SCAQMD METHOD 100.1

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- E. THE TESTS SHALL BE PERFORMED WHEN THE UNIT IS OPERATING AT NORMAL CONDITIONS. THE SAMPLING DURATION SHALL BE AT LEAST 15 AND NO MORE THAN 60 CONSECUTIVE MINUTES.
- F. TWO COMPLETE COPIES OF SOURCE TEST REPORTS (INCLUDE THE APPLICATION NUMBER AND A COPY OF THE PERMIT IN THE REPORT) SHALL BE SUBMITTED TO THE DISTRICT (ADDRESSED TO SOUTH COAST AIR QUALITY MANAGEMENT DISTRICT, ATTN: MARCEL SAULIS, P.O. BOX 4941, DIAMOND BAR, CA 91765). THE RESULTS SHALL BE SUBMITTED WITHIN 45 DAYS AFTER THE SOURCE TEST IS COMPLETED. THE REPORT SHALL INCLUDE, BUT NOT BE LIMITED TO EMISSION RATES IN POUNDS PER HOUR AND CONCENTRATIONS IN PPMV AT THE OUTLET OF THE UNIT, MEASURED ON A DRY BASIS AT 3% OXYGEN. THE FOLLOWING OPERATING DATA SHALL ALSO BE INCLUDED FOR EACH FIRING RATE:
- I. THE EXHAUST FLOW RATES IN ACTURAL CUBIC FEET PER MINUTE (ACFM).
 - II. THE FIRING RATES IN BTU PER HOUR.
 - III. THE OXYGEN CONTENT OF THE EXHAUST GASES IN PERCENT.
 - IV. THE FUEL FLOW RATE.
- G. A TESTING LABORATORY CERTIFIED BY THE CALIFORNIA AIR RESOURCES BOARD IN THE REQUIRED TEST METHODS FOR CRITERIA POOLUTANTS TO BE MEASURED, AND IN COMPLIANCE WITH DISTRICT RULE 304 (NO CONFLICT OF INTEREST) SHALL CONDUCT THE TEST.
- H. SAMPLING FACILITIES SHALL COMPLY WITH THE DISTRICT GUIDELINES FOR CONSTRUCTION OF SAMPLING AND TESTING FACILITIES PURSUANT TO RULE 217. [RULE 1147, RULE 304, RULE 217]

Periodic Monitoring:

16. THE OPERATOR SHALL CONDUCT AN INSPECTION FOR VISIBLE EMISSIONS FROM ALL STACKS AND OTHER EMISSION POINTS OF THIS EQUIPMENT WHENEVER THERE IS A PUBLIC COMPLAINT OF VISIBLE EMISSIONS, WHENEVER VISIBLE EMISSIONS ARE OBSERVED, AND ON A MONTHLY BASIS, AT LEAST, UNLESS THE EQUIPMENT DID NOT OPERATE DURING THE ENTIRE MONTHLY PERIOD. THE ROUTINE MONTHLY INSPECTION SHALL BE CONDUCTED WHILE THE EQUIPMENT IS IN OPERATION AND DURING DAYLIGHT HOURS. IF ANY VISIBLE EMISSIONS (NOT INCLUDING CONDENSED WATER VAPOR) ARE DETECTED THAT LAST MORE THAN THREE MINUTES IN ANY ONE-HOUR, THE OPERATOR SHALL EITHER:
- A. VERIFY AND CERTIFY WITHIN 24 HOURS THAT THE EQUIPMENT CAUSING THE EMISSION AND ANY ASSOCIATED AIR POLLUTION CONTROL EQUIPMENT ARE OPERATING NORMALLY ACCORDING TO THEIR DESIGN AND STANDARD PROCEDURES AND UNDER THE SAME CONDITIONS UNDER WHICH COMPLIANCE WAS ACHIEVED IN THE PAST;
 - B. TAKE CORRECTIVE ACTION(S) THAT ELIMINATES THE VISIBLE EMISSIONS WITHIN 24 HOURS AND REPORT THE VISIBLE EMISSIONS AS A POTENTIAL DEVIATION IN ACCORDANCE WITH THE REPORTING REQUIREMENTS IN SECTION K OF THIS PERMIT; OR
 - C. HAVE A CARB-CERTIFIED SMOKE READER DETERMINE COMPLIANCE WITH THE OPACITY STANDARD, USING EPA METHOD 9 OR THE PROCEDURES IN THE CARB MANUAL "VISIBLE EMISSION EVALUATION", WITHIN THREE BUSINESS DAYS AND REPORT ANY DEVIATIONS TO AQMD.

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THE OPERATOR SHALL KEEP THE RECORDS IN ACCORDANCE WITH THE RECORDKEEPING REQUIREMENTS IN SECTION K OF THIS PERMIT AND THE FOLLOWING RECORDS:

- A. STACK OR EMISSION POINT IDENTIFICATION;
- B. DESCRIPTION OF ANY CORRECTIVE ACTIONS TAKEN TO ABATE VISIBLE EMISSIONS;
- C. DATE AND TIME VISIBLE EMISSION WAS ABATED; AND
- D. VISIBLE EMISSION OBSERVATION RECORDED BY A CERTIFIED SMOKE READER.
[RULE 3004 (a)(4)]

Emissions And Requirements:

17. THIS EQUIPMENT IS SUBJECT TO THE APPLICABLE REQUIREMENTS OF THE FOLLOWING RULES AND REGULATIONS:
- NOX: 60 PPMV, RULE 1147
 - PM: 0.1 GR/SCF RULE 473
 - CO: 2000 PPMV, RULE 407
 - SOX: 500 PPMV, RULE 407
 - PM: 0.1 GR/SCF, RULE 409
 - PM: RULE 404, SEE APPENDIX B FOR EMISSION LIMITS

FACILITY PERMIT TO OPERATE LOMA LINDA UNIV

RULE 219 EQUIPMENT

Equipment Description:

RULE 219 EXEMPT EQUIPMENT, COATING EQUIPMENT, PORTABLE, ARCHITECTURAL COATINGS.

Periodic Monitoring:

1. THE OPERATOR SHALL KEEP RECORDS, IN A MANNER APPROVED BY THE DISTRICT, FOR THE FOLLOWING PARAMETER(S) OR ITEM(S):

FOR ARCHITECTURAL APPLICATIONS WHERE NO THINNERS, REDUCERS, OR OTHER VOC CONTAINING MATERIALS ARE ADDED, MAINTAIN SEMI-ANNUAL RECORDS OF ALL COATINGS CONSISTING OF (a) COATING TYPE, (b) VOC CONTENT AS SUPPLIED IN GRAMS PER LITER (g/l) OF MATERIALS FOR LOW-SOLIDS COATINGS, (c) VOC CONTENT AS SUPPLIED IN g/l OF COATING, LESS WATER AND EXEMPT SOLVENT, FOR OTHER COATING.

FOR OTHER ARCHITECTURAL APPLICATIONS WHERE THINNERS, REDUCERS, OR OTHER VOC CONTAINING MATERIALS ARE ADDED, MAINTAIN DAILY RECORDS FOR EACH COATING CONSISTING OF (a) COATING TYPE, (b) VOC CONTENT AS APPLIED IN GRAMS PER LITER (g/l) OF MATERIALS USED FOR LOW-SOLIDS COATINGS, (c) VOC CONTENT AS APPLIED IN g/l OF COATING, LESS WATER AND EXEMPT SOLVENT, FOR OTHER COATING.

[RULE 3004 (a) (4)]

Emissions And Requirements:

2. THIS EQUIPMENT IS SUBJECT TO THE APPLICABLE REQUIREMENTS OF THE FOLLOWING RULES AND REGULATIONS:

VOC: RULE 1113, SEE APPENDIX B FOR EMISSION LIMITS

VOC: RULE 1171, SEE APPENDIX B FOR EMISSION LIMITS

FACILITY PERMIT TO OPERATE LOMA LINDA UNIV

RULE 219 EQUIPMENT

Equipment Description:

RULE 219 EXEMPT EQUIPMENT, COATING EQUIPMENT, LOW USE OR EMISSIONS

Emissions And Requirements:

1. THIS EQUIPMENT IS SUBJECT TO THE APPLICABLE REQUIREMENTS OF THE FOLLOWING RULES AND REGULATIONS:
 - VOC: RULE 1171, SEE APPENDIX B FOR EMISSION LIMITS
 - VOC: RULE 1107, SEE APPENDIX B FOR EMISSION LIMITS
 - VOC: RULE 1136, SEE APPENDIX B FOR EMISSION LIMITS
 - VOC: RULE 109
 - PM: RULE 481

FACILITY PERMIT TO OPERATE LOMA LINDA UNIV

RULE 219 EQUIPMENT

Equipment Description:

RULE 219 EXEMPT EQUIPMENT, SPRAY COATING ENCLOSURES, < 8 FT3 INTERNAL VOLUME.

Emissions And Requirements:

1. THIS EQUIPMENT IS SUBJECT TO THE APPLICABLE REQUIREMENTS OF THE FOLLOWING RULES AND REGULATIONS:
 - VOC: RULE 1107 SEE APPENDIX B FOR EMISSION LIMITS
 - VOC: RULE 1136, SEE APPENDIX B FOR EMISSION LIMITS
 - VOC: RULE 1171, SEE APPENDIX B FOR EMISSION LIMITS
 - PM: RULE 481

FACILITY PERMIT TO OPERATE LOMA LINDA UNIV

RULE 219 EQUIPMENT

Equipment Description:

RULE 219 EXEMPT EQUIPMENT, REFRIGERATION UNITS

Emissions And Requirements:

1. THIS EQUIPMENT IS SUBJECT TO THE APPLICABLE REQUIREMENTS OF THE FOLLOWING RULES AND REGULATIONS:
REFRIGERANT: RULE 1415

FACILITY PERMIT TO OPERATE LOMA LINDA UNIV

RULE 219 EQUIPMENT

Equipment Description:

RULE 219 EXEMPT EQUIPMENT, REFRIGERANT RECOVERY AND/OR RECYCLING UNITS.

Emissions And Requirements:

1. THIS EQUIPMENT IS SUBJECT TO THE APPLICABLE REQUIREMENTS OF THE FOLLOWING RULES AND REGULATIONS:
REFRIGERANT: RULE 1415

**FACILITY PERMIT TO OPERATE
LOMA LINDA UNIV**

RULE 219 EQUIPMENT

Equipment Description:

RULE 219 EXEMPT EQUIPMENT, FIRE EXTINGUISHING EQUIPMENT

Emissions And Requirements:

1. THIS EQUIPMENT IS SUBJECT TO THE APPLICABLE REQUIREMENTS OF THE FOLLOWING RULES AND REGULATIONS:

HALON: RULE 1418

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ENGINEERING EVALUATION

COMPANY NAME AND ADDRESS

Loma Linda University Medical Center
25027 Mound Street
Loma Linda, CA 92562

CONTACT(S): Donna Gurule, Environmental Health & Safety Officer, (909) 558-4164
Henry Cairus, Environmental Health Supervisor, (909) 651-4018

EQUIPMENT LOCATION

AQMD ID 800234
25027 Mound Street
Loma Linda, CA 92354

BACKGROUND/SUMMARY

Loma Linda University Medical Center (LLUMC) operates a university and teaching hospital under a Title V operating permit. An application (A/N 531864) was submitted to modify their existing incinerator (A/N 139146/ PTO# D03504), along with an application (A/N 532404) for a TV de minimis revision. Prior to issuance, a 45 day EPA review will be required.

The incinerator is subject to AQMD Rule 1147 which outlines a compliance schedule to come into compliance with a more stringent NOx limit. Emission limits for incinerators that operate with process temperatures greater than or equivalent to 1200 °F is 60 ppmvd-NOx. The incinerator at LLUMC was installed prior to 1992; therefore, LLUMC was required to submit their application for Permit to Construct prior to 12/1/11 and to be in compliance prior to 7/1/12.

The incinerator at LLUMC is a two chamber unit that uses a primary chamber fired with two burners and a secondary chamber fired with its own burner. LLUMC is proposing to replace the existing two burners for the primary chamber with new burners that are rated higher than the existing units. The burner for the secondary chamber will not be replaced.

In addition to the retrofit of the incinerator, the Title V permit will be corrected by removing three (3) emergency engines (A/N 178908/PTO# D08202, A/N 348570/PTO# F18408, A/N 508687/PTO# G7398) that were put on the permit that should be a part of another LLUMC facility (ID 1846).

COMPLIANCE REVIEW

A review of the District Enforcement database reveals that the facility received a Notice to Comply (E07399) to provide source tests for the turbines and boiler. The information was provided to District Enforcement staff by the imposed deadline. The compliance status of the facility is being monitored by enforcement.

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EMISSION CALCULATIONS

The emissions are shown in the tables below for the post-modification (POSTMOD) potential to emit and the pre-modification (PREMOD) potential to emit.

Table 1 Data for POSTMOD Emissions

Parameter	Value	Units	Source
Heat Input	3	MMBtu/hr	Manufacturer ^(a)
Gas HHV	1050	MMBtu/MMscf	AQMD default
Operating Schedule	24	hrs/day	Worst-case
	8760	hrs/yr	
Fd	8710	dscf/MMBtu	Fd for natural gas at 68°F
SMV	385.44	scf/lb-mole	v = RT/P at 68°F and 14.7 psia
NOx MW	46	lb/lb-mole	calculated as NO2
CO MW	28	lb/lb-mole	

^(a) The heat input is based on all burners (0.9 MMBtu/hr x 2 + 1.2 MMBtu/hr) firing at maximum capacity

Table 2 Emission Factors

Pollutant	Emission Factor (ppmvd @ 3% O2)	Emission Factor (lb/MMBtu) ^(a)	Source
NOx	60	0.073	Manufacturer
SOx	-	0.00064	0.25 gr-H2S/100scf gas
PM10	-	0.00724	AP-42 1.4-2
CO	2000	1.48	Rule 407
ROG	-	0.00524	AP-42 1.4-2

^(a) EF (lb/MMBtu) = ppmvd x 1E-6 x MW (lb/lb-mole) + SMV (scf/lb-mole) x Fd (dscf/MMBtu) x 20.9/ (20.9-3)

Table 3 POSTMOD Emission Rates

Pollutant	lb/hr ^(a)	lb/day ^(b)	lb/yr ^(c)	30-DA ^(d)
NOx	0.22	5.26	1,918	5.33
SOx	0	0.05	17	0.05
PM10	0.02	0.52	190	0.53
CO	4.44	106.56	38,894	108.04
ROG	0.02	0.38	138	0.38

^(a) EF (lb/MMBtu) x Heat Input (MMBtu/hr)

^(b) Rate (lb/hr) x Schedule (hrs/day)

^(c) Rate (lb/hr) x Schedule (hrs/yr)

^(d) Rate (lb/hr) x Schedule (hrs/mo) /30

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Table 4 Data for PREMOD^(a)

Parameter	Value	Units	Source
Heat Input	2.8	MMBtu/hr	A/N 139146 ^(b)
NOx EF	0.0952	lb/MMBtu	A/N 139146

^(a) The heat input and NOx emission factor (EF)

^(b) The heat input is based on all burners (0.8 MMBtu/hr x 2 + 1.2 MMBtu/hr) firing at max. capacity

Table 5 PREMOD Emission Rate

Pollutant	lb/hr ^(a)	lb/day ^(b)	lb/yr ^(c)	30-DA ^(d)
NOx	0.27	6.40	2,335	6.49
SOx	0	0.04	16	0.04
PM10	0.02	0.49	178	0.49
CO	4.14	99.46	36,301	100.84
ROG	0.01	0.35	129	0.36

^(a) EF (lb/MMBtu) x Heat Input (MMBtu/hr)

^(b) Rate (lb/hr) x Schedule (hrs/day)

^(c) Rate (lb/hr) x Schedule (hrs/yr)

^(d) Rate (lb/hr) x Schedule (hrs/mo) /30

Table 6 Change in 30-DA Emissions

Pollutant	PREMOD	POSTMOD	Difference ^(a)
NOx	6.49	5.33	-1.16
SOx	0.04	0.05	0
PM10	0.49	0.53	0.04
CO	100.84	108.04	7.20
ROG	0.36	0.38	0.03

^(a) Difference = POSTMOD - PREMOD

RULES EVALUATION

RULE 212-STANDARDS FOR APPROVING PERMITS AND ISSUING PUBLIC NOTICES

Rule 212 requires that a person shall not build, erect, install, alter, or replace any equipment, the use of which may cause the issuance of air contaminants or the use of which may eliminate, reduce, or control the issuance of air contaminants without first obtaining written authorization for such construction from the Executive Officer. Rule 212(c) states that a project requires written notification if there is an emission increase for ANY criteria pollutant in excess of the daily maximums specified in Rule 212(g), if the equipment is located within 1,000 feet of the outer boundary of a school, or if the MICR is equal to or greater than one in a million (1×10^6) during a lifetime (70 years) for facilities with more than one permitted unit, source under Regulation XX, or equipment under Regulation XXX, unless the applicant

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demonstrates to the satisfaction of the Executive Officer that the total facility-wide maximum individual cancer risk is below ten in a million (10×10^6) using the risk assessment procedures and toxic air contaminants specified under Rule 1402; or, ten in a million (10×10^6) during a lifetime (70 years) for facilities with a single permitted unit, source under Regulation XX, or equipment under Regulation XXX. There are no schools within 1,000 feet of the equipment. The emission increase will not be greater than the thresholds that would require a public notice. The MICR is less than 1 in a million. Therefore, a public notice will not be required for this project.

RULE 401 - VISIBLE EMISSIONS

This rule limits visible emissions to opacity of less than 20 percent (Ringlemann No.1), as published by the United States Bureau of Mines. It is unlikely, that there will be visible emissions from the lean burn engines. However, in the unlikely event that visible emissions do occur, anything greater than 20 percent opacity is not expected to last for greater than 3 minutes. During normal operation, no visible emissions are expected.

RULE 402 - NUISANCE

This rule requires that a person not discharge from any source whatsoever such quantities of air contaminants or other material which cause injury, detriment, nuisance, or annoyance to any considerable number of persons or to the public, or which cause, or have a natural tendency to cause injury or damage to business or property. A review of the District database reveals that there have not been any complaints received by the District within the last two years in regards to this facility. Inspections are conducted on an annual basis at this facility and it is expected that LLUMC will continue to comply with Rule 402.

RULE 407 – LIQUID AND GASEOUS AIR CONTAMINANTS

This rule limits CO emissions to 2,000 ppmvd and SO₂ emissions to 500 ppmvd, averaged over 15 minutes. The incinerator is subject to the requirements of this rule. The incinerator has a 2,000 ppmvd CO limit. Continued compliance with this rule is required. The unit also must comply with Rule 431.1, thus it is exempt from the SO₂ limit in Rule 407. The applicant will be required to comply with Rule 431.1 and thus the SO₂ limit in Rule 407 will not apply.

RULE 409 – COMBUSTION CONTAMINANTS

This rule restricts the discharge of contaminants from the combustion of fuel to 0.1 grain per cubic foot of gas, calculated to 12% CO₂, averaged over 15 minutes. Continued compliance with this rule is expected.

RULE 431.1-SULFUR CONTENT OF GASEOUS FUELS

The equipment will use natural gas that will comply with the 16 ppm sulfur limit, calculated as H₂S, specified in this rule. Natural gas will be supplied by the Southern California Gas Company which has a H₂S content of less 0.25 gr/100scf, which is equivalent to a concentration of about 4 ppm. It is also much less than the 1 gr/100scf limit typical of pipeline quality natural gas. Continued compliance is expected.

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RULE 1147 – NOX REDUCTIONS FROM MISCELLANEOUS SOURCES

The purpose of this rule is to reduce NOx emissions from gaseous and liquid fuel fired combustion equipment that require a District permit and are not specifically required to comply with a NOx emission limit by other District Regulation XI rules. The incinerator is subject to the requirements of this rule.

LLUMC were issued permits for crematories prior to January 1, 2010. The crematories were manufactured after 1997; therefore, in accordance with Table 2, the units shall be in compliance with the emission limits of Table 1, July 1 of the year the units are 15 years old.

The incinerator was manufactured prior to 1992 and in accordance with the compliance schedule in Table 2, LLUMC has until July 1, 2012 to be in compliance with the NOx emission limits in Table 1.

The incinerator has a process temperature that exceeds 1200°F; therefore, it is subject to a NOx concentration limit of 60 ppmvd. LLUMC is proposing to retrofit the unit and install a burner that will meet the limit. A source test will be required to verify the concentration limit.

NEW SOURCE REVIEW (NSR)

RULE 1303(a) – BACT

LLUMC will be retrofitting the incinerator to comply with the NOx emission limits of Rule 1147. The facility will be removing two burners each rated at 0.8 MMBtu/hr and will be installing two burners each rated at 0.9 MMBtu/hr. The higher rating will result in an increase in emissions greater than 1 lb/day for CO, which triggers BACT.

Incinerator BACT for CO is a multiple chamber starved air design with a residence time greater than or equal to 0.5 seconds at a temperature greater than or equal to 1800°F. The incinerator at LLUMC is multiple chamber starved air design with a residence time of 2 seconds at 2200°F. Therefore, the unit complies with BACT.

RULE 1303(b)(1) – MODELING

Table A-1 of Rule 1303 lists the allowable limits that do not necessitate detailed air quality analyses for sources based on the range of heat input – modeling is not required for ROG. The increase in PM10 and CO emissions do not justify more detailed modeling analysis; therefore, compliance with this rule is expected.

RULE 1303(b)(2) - OFFSETS

Table 6 shows the change in emissions from the modification of the incinerator by installing new burners. The NOx emissions will decrease, but there is an increase in PM10, CO and ROG emissions. The increase in PM10 and ROG 30-DA emissions is less than 0.42 lbs/day; however, the increase in CO is greater than 0.42 lb/day. The basin is in attainment for CO; therefore, no emission offsets are required for CO any other pollutant as a result of this project.

or

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RULE 1401 – NEW SOURCE REVIEW OF TOXIC AIR CONTAMINANTS

This rule is applicable to applications deemed complete on or after June 1, 1990 and it imposes specific limits for maximum individual cancer risk (MICR), cancer burden, and non-cancer acute and chronic hazard indices from new permit units, relocations, or modifications to existing permit units which emit toxic air contaminants (TAC) listed in Table I of Rule 1401. The rule establishes allowable risks for permit units requiring new permit pursuant to Rules 201 or 203. The new burners will have a higher heat input than the existing burners; therefore, the project is subject to the requirements of this rule. The incinerator will have an increase in 0.2 MMBtu/hr, but it will not increase in the amount of pathological specimens that are incinerated.

The District Rule 1401 calculator was used to determine the HRA. The project passed a Tier 1 risk analysis. Therefore, compliance with this rule is expected.

RULE 1406 – CONTROL OF DIOXIN EMISSIONS FROM MEDICAL WASTE INCINERATORS

The purpose of the rule is to reduce dioxin emissions from medical waste incinerators. The incinerator at LLUMC does not incinerate anything that can generate dioxins and is therefore exempt from the requirements of the rule.

40 CFR PART 60 SUBPART Ce – EMISSION GUIDELINES AND COMPLIANCE TIMES FOR HOSPITAL/MEDICAL/INFECTIOUS WASTE INCINERATORS CONSTRUCTED ON OR BEFORE JUNE 20, 1996

The incinerator at LLUMC was constructed prior to June 20, 1996 and primarily incinerates pathological animal specimens, and the occasional human body part.

§62.14490 defines “*medical/infectious waste*” as...

“any waste generated in the diagnosis, treatment, or immunization of human beings or animals, in research pertaining thereto, or in the production or testing of biologicals that is listed in paragraphs (1) through (7) of this definition. The definition of medical/infectious waste does not include hazardous waste identified or listed under the regulations in part 261 of this chapter; household waste, as defined in §261.4(b)(1) of this chapter; ash from incineration of medical/infectious waste, once the incineration process has been completed; human corpses, remains, and anatomical parts that are intended for interment; and domestic sewage materials identified in §261.4(a)(1) of this chapter.

(1) Cultures and stocks of infectious agents and associated biologicals, including: cultures from medical and pathological laboratories; cultures and stocks of infectious agents from research and industrial laboratories; wastes from the production of biologicals; discarded live and attenuated vaccines; and culture dishes and devices used to transfer, inoculate, and mix cultures.

(2) Human pathological waste, including tissues, organs, and body parts and body fluids that are removed during surgery or autopsy, or other medical procedures, and specimens of body fluids and their containers.

(3) Human blood and blood products including:
(i) Liquid waste human blood;

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- (ii) Products of blood;
- (iii) Items saturated and/or dripping with human blood; or
- (iv) Items that were saturated and/or dripping with human blood that are now caked with dried human blood; including serum, plasma, and other blood components, and their containers, which were used or intended for use in either patient care, testing and laboratory analysis or the development of pharmaceuticals. Intravenous bags are also include in this category.

(4) Sharps that have been used in animal or human patient care or treatment or in medical, research, or industrial laboratories, including hypodermic needles, syringes (with or without the attached needle), pasteur pipettes, scalpel blades, blood vials, needles with attached tubing, and culture dishes (regardless of presence of infectious agents). Also included are other types of broken or unbroken glassware that were in contact with infectious agents, such as used slides and cover slips.

(5) Animal waste including contaminated animal carcasses, body parts, and bedding of animals that were known to have been exposed to infectious agents during research (including research in veterinary hospitals), production of biologicals or testing of pharmaceuticals.

(6) Isolation wastes including biological waste and discarded materials contaminated with blood, excretions, exudates, or secretions from humans who are isolated to protect others from certain highly communicable diseases, or isolated animals known to be infected with highly communicable diseases.

(7) Unused sharps including the following unused, discarded sharps: hypodermic needles, suture needles, syringes, and scalpel blades.”

The incinerator at LLUMC primarily incinerates pathological animal specimens and parts; however, per the facility, some of the items that are burned in the incinerator include: animals, and other products (bedding, bags, etc.) that may have been exposed to communicable diseases. In addition, LLUMC stated that they also burn human tissue on occasion. Therefore, a portion of the waste that the incinerator burns at LLUMC falls under the definition of “medical/infectious waste” of the subpart. Per discussions with LLUMC, a very small portion of the material combusted would be classified as “medical/infectious waste”. The amount incinerated would classify the LLUMC unit as a “co-fired combustor”.

§62.14490 defines “*Co-fired combustor*” as...

“a unit combusting hospital waste and/or medical/infectious waste with other fuels or wastes (e.g., coal, municipal solid waste) and subject to an enforceable requirement limiting the unit to combusting a fuel feed stream, 10 percent of less of the weight of which is comprised, in aggregate, of hospital waste and medical/infectious waste as measured on a calendar quarter basis...”

A co-fired combustor is exempt from the requirements of the subpart per §62.14400 (b)(2). In order to qualify, LLUMC must keep records on a calendar quarter basis of the weight of hospital waste and medical/infectious waste combusted as well as the weight of all other fuels and wastes combusted at the

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co-fired combustor. The records must reflect that the unit continues to meet the definition of co-fired combustor in 40 CFR 62.14490. Records must be presented to EPA or delegated authority upon request.

Conditions exist on the Title V permit that ensures the equipment operates as a co-fired combustor as defined in the subpart.

REGULATION XXX – TITLE V

LLUMC is a Title V facility with a Title V permit.

RULE 3003 – APPLICATIONS

The “de minimis significant permit revision” is expected to comply with all applicable requirements of this rule.

(i)(4) The de minimis significant permit revision will be issued only after the permit revision application has been found to comply with all conditions of this rule.

(j)(1) The permit revision will be forwarded to EPA for a 45 day review period.

RULE 3005 – PERMIT REVISION

(e) The proposed Title V permit revision satisfies all the applicable conditions listed in this rule. The modification constitutes a “de minimis significant permit revision” as defined in Rule 3000(b)(6).

RULE 3006 – PUBLIC PARTICIPATION

(b) The proposed “de minimis significant permit revision” is exempt from public participation.

PERMIT CONDITIONS

It is recommended that the permit be issued with the conditions shown in the draft permit following the completion of the EPA’s 45 day review period.

1. OPERATION OF THIS EQUIPMENT MUST BE CONDUCTED IN COMPLIANCE WITH ALL DATA AND SPECIFICATIONS SUBMITTED WITH THE APPLICATION UNDER WHICH THIS PERMIT IS ISSUED UNLESS OTHERWISE NOTED BELOW. [RULE 204]
2. THIS EQUIPMENT MUST BE PROPERLY MAINTAINED AND KEPT IN GOOD OPERATING CONDITION AT ALL TIMES. [RULE 204]
3. THIS EQUIPMENT SHALL NOT EMIT MORE THAN 60 PPM OF OXIDES OF NITROGEN (NOX), CALCULATED AS NO2, MEASURED BY VOLUME ON A DRY BASIS AT 3% O2. [RULE 1147]
4. THE COMBUSTION BURNERS SHALL BE INSPECTED AND MAINTAINED PER THE MANUFACTURER'S SCHEDULE AND SPECIFICATIONS. RECORDS SHALL BE KEPT ON FILE FOR INSPECTIONS AND MAINTENANCE, INCLUDING THE SCHEDULE AND INSTRUCTIONS, FOR AT LEAST THREE YEARS. [RULE 1147]
5. THIS EQUIPMENT SHALL NOT BURN ANY CHLORINATED MATERIALS, INCLUDING BUT NOT LIMITED TO PLASTICS, PACKAGING, TEXTILES, FABRIC, CONTAINERS, TUBING OR ANY OTHER GENERAL REFUSE THAT MAY CONTAIN, OR MAY BE CONTAMINATED WITH, CHLORINATED COMPOUNDS. [RULE 1406]
6. THE TOTAL QUANTITY OF MATERIAL CHARGED TO THIS INCINERATOR SHALL NOT EXCEED 100 POUNDS PER HOUR OR 800 POUNDS PER DAY. [RULE 1303(b)(2)-OFFSET]
7. A TEMPERATURE OF NOT LESS THAN 2000 DEGREES F SHALL BE MAINTAINED IN THE AFTERBURNER CHAMBER WHEN THE INCINERATOR IS IN OPERATION. [RULE 1303(a)-BACT]
8. THE CHARGING DOOR SHALL REMAIN CLOSED EXCEPT DURING CHARGING.

Conditions:

MODIFICATION OF INCINERATOR, PATHOLOGICAL, MULTIPLE CHAMBER, ECOLAIRE E.C.P. INC., MODEL 100 P.W.I, 100 POUNDS PER HOUR CAPACITY, 6' DIA. X 8' H. (PRIMARY CHAMBER), 4'-6" DIA. X 8' L., SECONDARY CHAMBER WITH TWO 800,000 BTU/HR PRIMARY GAS BURNERS WITH A 1.3 HP UNDERFIRE BLOWER AND A 1,200,000 BTU/HR SECONDARY GAS BURNER WITH A 3 HP BLOWER BY REPLACING THE EXISTING PRIMARY BURNERS WITH TWO MAXON M-PAKT BURNERS, EACH RATED AT 900,000 BTU/HR.

EQUIPMENT DESCRIPTION

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[RULE 1303(a)-BACT]

9. THE PRIMARY GAS BURNER SHALL AUTOMATICALLY SHUT OFF WHEN THE CHARGING DOOR IS OPENED.
[RULE 1303(a)-BACT]
10. THE EQUIPMENT SHALL BE PROPERLY MAINTAINED AND KEPT IN GOOD OPERATING CONDITION AT ALL TIMES AND OPERATED BY PERSONNEL PROPERLY TRAINED IN ITS OPERATION.
[RULE 1303(a)-BACT]
11. COMPLETE RECORDS OF THE AMOUNT OF MATERIAL PROCESSED PER DAY IN THIS INCINERATOR SHALL BE MAINTAINED IN A FORM APPROVED IN WRITING BY THE EXECUTIVE OFFICER. SUCH RECORDS SHALL BE MAINTAINED FOR A PERIOD OF NOT LESS THAN FIVE YEARS AND MADE AVAILABLE TO THE DISTRICT UPON REQUEST.
[RULE 1303(a)-BACT]
12. THIS UNIT SHALL OPERATE AS A CO-FIRED COMBUSTOR AND SHALL BE LIMITED TO BURNING MEDICAL/INFECTIOUS WASTE, AS DEFINED IN 40 CFR 62.14490, THAT IS LESS THAN 10 PERCENT OF THE WEIGHT OF WHICH IS COMPRISED, IN AGGREGATE, OF THE MATERIAL BURNED IN THE INCINERATOR. THE PERCENTAGE SHALL BE MEASURED ON A CALENDAR QUARTER BASIS.
[40 CFR SUBPART Ce]
13. THE FACILITY SHALL MAINTAIN RECORDS ON A CALENDAR QUARTER BASIS OF THE WEIGHT OF MATERIAL PROCESSED AND THE WEIGHT OF THE MEDICAL/INFECTIOUS WASTE COMBUSTED TO DEMONSTRATE THAT THE UNIT CONTINUES TO MEET THE DEFINITION OF A CO-FIRED COMBUSTOR IN 40 CFR 62.14490.
[40 CFR SUBPART Ce]
14. THIS EQUIPMENT SHALL COMPLY WITH RULE 1147.
[RULE 1147]
15. THE OWNER OR OPERATOR OF THIS EQUIPMENT SHALL CONDUCT SOURCE TESTS ON THE EQUIPMENT UNDER THE FOLLOWING CONDITIONS:
 - A. A SOURCE TEST PROTOCOL SHALL BE SUBMITTED FOR THE EXECUTIVE OFFICER'S REVIEW AND APPROVAL PRIOR TO THE COMMENCEMENT OF TESTING.
 - B. SOURCE TESTING SHALL BE CONDUCTED WITHIN 30 DAYS AFTER ACHIEVING MAXIMUM PRODUCTION RATE AT WHICH THE EQUIPMENT WILL BE OPERATED, BUT NO LATER THAN 90 DAYS AFTER INITIAL START-UP.

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- C. THE SOURCE TESTS SHALL BE PERFORMED TO VERIFY COMPLIANCE WITH THE NOX EMISSION LIMIT SPECIFIED IN CONDITION NO. 3.
- D. THE SOURCE TESTS SHALL BE CONDUCTED IN ACCORDANCE WITH SCAQMD METHOD 100.1
- E. THE TESTS SHALL BE PERFORMED WHEN THE UNIT IS OPERATING AT NORMAL CONDITIONS. THE SAMPLING DURATION SHALL BE AT LEAST 15 AND NO MORE THAN 60 CONSECUTIVE MINUTES.
- F. TWO COMPLETE COPIES OF SOURCE TEST REPORTS (INCLUDE THE APPLICATION NUMBER AND A COPY OF THE PERMIT IN THE REPORT) SHALL BE SUBMITTED TO THE DISTRICT (ADDRESSED TO SOUTH COAST AIR QUALITY MANAGEMENT DISTRICT, ATTN: MARCEL SAULIS, P.O. BOX 4941, DIAMOND BAR, CA 91765). THE RESULTS SHALL BE SUBMITTED WITHIN 45 DAYS AFTER THE SOURCE TEST IS COMPLETED. THE REPORT SHALL INCLUDE, BUT NOT BE LIMITED TO EMISSION RATES IN POUNDS PER HOUR AND CONCENTRATIONS IN PPMV AT THE OUTLET OF THE UNIT, MEASURED ON A DRY BASIS AT 3% OXYGEN. THE FOLLOWING OPERATING DATA SHALL ALSO BE INCLUDED FOR EACH FIRING RATE:
 - I. THE EXHAUST FLOW RATES IN ACTURAL CUBIC FEET PER MINUTE (ACFM).
 - II. THE FIRING RATES IN BTU PER HOUR.
 - III. THE OXYGEN CONTENT OF THE EXHAUST GASES IN PERCENT.
 - IV. THE FUEL FLOW RATE.
- G. A TESTING LABORATORY CERTIFIED BY THE CALIFORNIA AIR RESOURCES BOARD IN THE REQUIRED TEST METHODS FOR CRITERIA POOLUTANTS TO BE MEASURED, AND IN COMPLIANCE WITH DISTRICT RULE 304 (NO CONFLICT OF INTEREST) SHALL CONDUCT THE TEST.
- H. SAMPLING FACILITIES SHALL COMPLY WITH THE DISTRICT GUIDELINES FOR CONSTRUCTION OF SAMPLING AND TESTING FACILITIES PURSUANT TO RULE 217.
[RULE 1147, RULE 304, RULE 217]

Periodic Monitoring:

- 16. THE OPERATOR SHALL CONDUCT AN INSPECTION FOR VISIBLE EMISSIONS FROM ALL STACKS AND OTHER EMISSION POINTS OF THIS EQUIPMENT WHENEVER THERE IS A PUBLIC COMPLAINT OF VISIBLE EMISSIONS, WHENEVER VISIBLE EMISSIONS ARE OBSERVED, AND ON A MONTHLY BASIS, AT LEAST, UNLESS THE EQUIPMENT DID NOT OPERATE DURING THE ENTIRE MONTHLY PERIOD. THE ROUTINE MONTHLY INSPECTION SHALL BE CONDUCTED WHILE THE EQUIPMENT IS IN OPERATION AND DURING DAYLIGHT HOURS. IF ANY VISIBLE EMISSIONS (NOT INCLUDING CONDENSED WATER VAPOR) ARE DETECTED THAT LAST MORE THAN THREE MINUTES IN ANY ONE-HOUR, THE OPERATOR SHALL EITHER:

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- A. VERIFY AND CERTIFY WITHIN 24 HOURS THAT THE EQUIPMENT CAUSING THE EMISSION AND ANY ASSOCIATED AIR POLLUTION CONTROL EQUIPMENT ARE OPERATING NORMALLY ACCORDING TO THEIR DESIGN AND STANDARD PROCEDURES AND UNDER THE SAME CONDITIONS UNDER WHICH COMPLIANCE WAS ACHIEVED IN THE PAST;
- B. TAKE CORRECTIVE ACTION(S) THAT ELIMINATES THE VISIBLE EMISSIONS WITHIN 24 HOURS AND REPORT THE VISIBLE EMISSIONS AS A POTENTIAL DEVIATION IN ACCORDANCE WITH THE REPORTING REQUIREMENTS IN SECTION K OF THIS PERMIT; OR
- C. HAVE A CARB-CERTIFIED SMOKE READER DETERMINE COMPLIANCE WITH THE OPACITY STANDARD, USING EPA METHOD 9 OR THE PROCEDURES IN THE CARB MANUAL "VISIBLE EMISSION EVALUATION", WITHIN THREE BUSINESS DAYS AND REPORT ANY DEVIATIONS TO AQMD.

THE OPERATOR SHALL KEEP THE RECORDS IN ACCORDANCE WITH THE RECORDKEEPING REQUIREMENTS IN SECTION K OF THIS PERMIT AND THE FOLLOWING RECORDS:

- A. STACK OR EMISSION POINT IDENTIFICATION;
- B. DESCRIPTION OF ANY CORRECTIVE ACTIONS TAKEN TO ABATE VISIBLE EMISSIONS;
- C. DATE AND TIME VISIBLE EMISSION WAS ABATED; AND
- D. VISIBLE EMISSION OBSERVATION RECORDED BY A CERTIFIED SMOKE READER.
[RULE 3004 (a)(4)]

Emissions And Requirements:

- 17. THIS EQUIPMENT IS SUBJECT TO THE APPLICABLE REQUIREMENTS OF THE FOLLOWING RULES AND REGULATIONS:

NOX: 60 PPMV, RULE 1147
 PM: 0.1 GR/SCF RULE 473
 CO: 2000 PPMV, RULE 407
 SOX: 500 PPMV, RULE 407
 PM: 0.1 GR/SCF, RULE 409
 PM: RULE 404, SEE APPENDIX B FOR EMISSION LIMITS