

AIR QUALITY

MANAGEMENT DISTRICT

**STATEMENT OF BASIS FOR
INITIAL TITLE V FEDERAL OPERATING PERMIT**

TITLE V PERMIT NO.: TV2016-20-01

DATE: August 28, 2018

REVIEWING ENGINEER: Steve Mosunic

A. FACILITY INFORMATION

FACILITY NAME: RagingWire Data Centers, Inc.

LOCATION: 1200 Striker Ave.
Sacramento, CA 95834

1312 Striker Ave.
Sacramento, CA 95834

MAILING ADDRESS: 1200 Striker Ave.
Sacramento, CA 95834

RESPONSIBLE OFFICIAL: Phillip Sandino
V.P. Data Center Operations
(703) 840-7707

CONTACT PERSON: Nick Jones
Regional Director of Data Center Operations
(916) 286-4048

B. PURPOSE OF THIS STATEMENT OF BASIS

The Title V Federal Operating Permit is intended to be a document containing only enforceable terms and conditions as well as any additional information, such as the identification of emission units, emission points, emission sources and processes, which makes the terms meaningful. 40 CFR Part 70.7(a)(5) requires that each Title V permit have an accompanying "...statement that sets forth the legal and factual basis for the draft permit conditions". The purpose of this Statement of Basis is to satisfy the above requirement by providing pertinent details regarding the permit/application data and permit conditions in a more easily understandable format. This report

B. PURPOSE OF THIS STATEMENT OF BASIS (continued)

will also include background narrative and explanations of regulatory decisions made by the reviewer. It should be emphasized that this Statement of Basis, while based on information contained in the permit, is a separate document and is not itself an enforceable term and condition of the permit.

C. PERMIT ACTION HISTORY

This Statement of Basis is for the first renewal of RagingWire Data Centers, Inc. existing Title V Federal Operating Permit No. TV2010-20-01. The existing permit expired on September 13, 2016. The application was deemed complete on September 13, 2015. Between the issuance of this Title V permit renewal and the previous permit's expiration RagingWire Data Centers, Inc. is allowed to operate under a Title V Application shield.

The following permit actions have occurred since the initial Federal Operating Permit No. TV2010-20-01 was issued:

<u>Permit Action</u>	<u>Date</u>	<u>Permit No.</u>
Initial Permit issued:	09-13-2011	TV2010-20-01
1st Administrative Amendment	Subsumed*	TV2010-20-01A
2nd Administrative Amendment	Subsumed*	TV2010-20-01B
3rd Administrative Amendment	Subsumed*	TV2010-20-01C
1st Renewal Permit issued:	XX-XX-201X	TV2016-20-01
1st Administrative Amendment	Subsumed*	TV2016-20-01A

*Subsumed under permit TV2016-20-01

This first permit renewal action will be assigned the permit number TV2016-20-01. In addition, four administrative amendment (TV2010-20-01A, TV2010-20-01B, TV2010-20-01C, and TV2016-20-01A) were received to update the responsible official.

Since the last permit renewal, RagingWire Enterprise Solutions, Inc. changed their name to RagingWire Data Centers, Inc.

Also as part of this renewal, all permits previously listed under the Future Federally Enforceable requirements section will be moved to the Federally Enforceable Requirements section.

D. FACILITY DESCRIPTION

The following facility description is for informational purposes only and does not contain any applicable federally enforceable requirements.

The applicant operates two adjacent facilities that contain data process servers. Data process servers are electronic devices that provide digital storage and computing capabilities. The applicant provides a facility with specific environmental and electrical parameters to house these data process servers. To provide a high reliability of constant environmental and electrical parameters, IC engine driven electric generators are used in the event of loss of usable power from the serving utility. An organization that procures RagingWire Data Centers, Inc.'s services can for a fee place their data process servers at the facility.

In order to provide for the uninterrupted operation of the data servers as well as HVAC equipment, the facility has installed or is in the process of installing 40 standby IC engines. An IC engine that is designated standby or emergency is defined as an IC engine that is limited in the numbers of hours it can run to maintain integrity of the system or maintenance, and operate in the event of a power failure or emergency. These IC engines drive generators that provide power in the event that the serving utility cannot provide adequate quality of power to maintain the integrity of the data process servers or environmental control equipment. Data process servers, as with any electronic equipment optimally run at a constant temperature and humidity, but produce heat. To remove this heat the applicant has HVAC equipment to accomplish this task, such as cooling towers, air handlers, chillers, and heaters.

There are two buildings adjacent to each other where the applicant operates the business. One building is at 1200 Striker Ave, Sacramento, CA and the other is 1312 Striker Ave, Sacramento, CA. Since both buildings are located on contiguous properties, the emissions from the buildings will be aggregated and considered one facility. Sixteen IC engines are currently installed at 1200 Striker Ave., Sacramento, CA. Twenty - four IC engines will be installed at 1312 Striker Ave., Sacramento, CA.

The facility will contain 40 diesel fired IC engines. There are 2 air pollution control devices to control NOx emissions connected to 2 of the IC engines. A Selective Catalytic Reduction device (SCR) is an air emission control device that reduces the amount of NOx emissions from the exhaust of the IC engine by converting it to nitrogen and water in the presence of ammonia. The SCRs were installed to meet SMAQMD Rule 202 Section 301 (02-24-2005 version), *Best Available Control Technology* (BACT) requirements, not to meet federal emission standards set forth by the U.S. EPA tier emission standards in effect for the model year and horse power rating of the IC engine. Thirty-seven IC engines meet SMAQMD BACT requirements imposed at the time of application without the addition of emissions control equipment. The engine permitted under Permit No. 19408 is restricted in hours of operation in order to not trigger BACT requirements. The IC engines are permitted to operate for a limited amount of hours to preserve the integrity of the specific IC engine or the electrical infrastructure, defined as maintenance, as well as a disruption in power quality, defined as emergency. The IC engines are typically permitted by SMAQMD to operate 50 hours per year for maintenance. The IC engines are limited by local district permit to operate less than 200 hours per year for both emergency and maintenance per IC engine. To avoid triggering a major modification during the last project the overall facility was permitted by SMAQMD to not exceed 45.5 tons per year of NOx. Both these restrictions the exempted all the added IC engines from the requirement to provide offsets for the

D. FACILITY DESCRIPTION (continued)

emission increases. All the IC engines operate on diesel fuel certified by CARB. Currently diesel fuel certified by CARB has a sulfur content of 0.0015%.

To be considered emergency equipment and to avoid triggering offsets, SMAQMD Rule 202 Section 110.2 (02-24-2005 version) limits total usage of the IC engine to less than 200 hours per year. The State of California *Air Toxic Control Measure for Stationary Diesel Fueled Engines* (ATCM) limits maintenance and testing of each IC engine to 50 hours per year or less. All the IC engines at the facility are at a minimum compliant with this requirement. The applicant has built up the facility through a series of distinct projects. At times the applicant has taken various emission caps. The following is a summary.

Project Scope – IC Engine Permit No.	Quarterly Limiting Factor	Yearly Limiting Factor
P/O 19104	Project emission restriction of 5,000 lbs/qtr of NOx restricts quarterly operation to 100 hrs/qtr	200 hours
P/O 19408, 19409, 19410	Project emission restriction of 5,000 lbs/qtr of NOx restricts quarterly operation to 161 hrs/qtr total for these IC engines.	19408 – 200 hours 19409 - 200 hours 19410 – 122 hours
P/O 21579	Project emission restriction of 5,000 lbs/qtr of NOx restricts quarterly operation to 161 hrs/qtr total for this IC engine.	200 hours
P/O 20279, 20280, 20282, 20283, 20284, 20285, 20286, 20287, 20288	Project emission restriction of 5,000 lbs/qtr of NOx restricts quarterly operation to 161 hrs/qtr total for these IC engines.	Total emissions from this set of IC engines cannot exceed 20,000 lbs/year of NOx.
IC Engines Permitted at 1200 Striker Ave (16 Total) P/O 15495, 15963, 19104, 19408, 19409, 19410, 20279, 20280, 20282, 20283, 20284, 20285, 20286, 20287, 20288, 21579	Total emissions from this set of IC engines cannot exceed 24.4 tons (48,800 lbs) of NOx per quarter and per year.	Total emissions from this set of IC engines cannot exceed 24.4 tons (48,800 lbs) of NOx per quarter and per year.

D. FACILITY DESCRIPTION (continued)

Project Scope – IC Engine Permit No.	Quarterly Limiting Factor	Yearly Limiting Factor
IC Engines Permitted at 1312 Striker Ave (24 Total) P/O 21352, 21366, 21367, 21368, 21369, 21370, 21371, 21372, 22348, 22349, 22350, 22351, 22352, 22353, 22354, 22355, 22356, 22357, 22358, 22359, 22360, 22361, 22362, 22363	Total emissions from this set of IC engines cannot exceed 24.4 tons (48,800 lbs) of NOx per quarter and per year.	Total emissions from this set of IC engines cannot exceed 24.4 tons (48,800 lbs) of NOx per quarter and per year.
All IC engines permitted at 1200 Striker Ave & 1312 Striker Ave	Total emissions facility wide cannot exceed 45.5 tons (91,100 lbs) of NOx per quarter.	Total emissions facility wide cannot exceed 45.5 Tons (91,100 lbs) of NOx per year

Additionally the operation of multiple IC engines facility-wide is restricted to operate only for infrastructure upgrades necessitating multiple IC engine operation, during a once a year facility operational test, or during an emergency event.

Other equipment that are considered insignificant sources of air emissions are listed in the Insignificant Emission Units section of this Statement of Basis as well as the reasoning for the exemption. To operate a facility of this nature, there are several cooling towers, small natural gas fired heaters used for humidification, chillers, diesel and urea storage. The applicant has an office located at the facility that will have heating and cooling of the air space as well as a hot water heater. The operation has a support staff at this location that has office space heating. All the equipment considered insignificant per the adopted list and criteria document and SMAQMD rules are included in section F.

E. SIGNIFICANT EMISSIONS UNIT DESCRIPTION

This section contains a list of emissions units operated at the facility that are considered significant emission sources. They are listed under the federally enforceable requirements – equipment specific section of the Title V permit.

1. IC ENGINE, EMERGENCY USE

Permit No.: P/O 15495
Manufacturer: Caterpillar
Model No. 3516B
Serial No. 6HN01216
Engine BHP: 2,876 bhp @ 1,800 RPM
Fuel Type: CARB diesel
Driving: Electrical generator
Model Year: 2000
Tier: Tier 1
EPA Family No. YCPXL69.OERK (From CARB Executive order U-R-1-103)
Location: 1200 Striker Ave.

2. IC ENGINE, EMERGENCY USE

Permit No.: P/O 15963
Manufacturer: Caterpillar
Model No. 3516B
Serial No. 6HN01330
Engine BHP: 2,876 bhp @ 1,800 RPM
Fuel Type: CARB diesel
Driving: Electrical generator
Model Year: 2000
Tier: Tier 1
EPA Family No. YCPXL69.OERK (From CARB Executive order U-R-1-103)
Location: 1200 Striker Ave.

3. IC ENGINE, EMERGENCY USE

Permit No.: P/O 19104
Manufacturer: Caterpillar
Model No. 3516B
Serial No. 6HN.1254
Engine BHP: 2,876 bhp @ 1,800 RPM
Fuel Type: CARB diesel
Driving: Electrical generator
Model Year: 2000
Tier: Tier 1
EPA Family No. YCPXL69.OERK (From CARB Executive order U-R-1-103)
Location: 1200 Striker Ave.

E. SIGNIFICANT EMISSIONS UNIT DESCRIPTION (continued)
--

4. IC ENGINE, EMERGENCY USE

Permit No.: P/O 19409
Manufacturer: Cummins
Model No. XQSK60-G6 Non Road 1
Serial No. 33163718
Engine BHP: 2,922 bhp @ 1,800 RPM
Fuel Type: CARB diesel
Driving: Electrical generator
Model Year: 2006
Tier: Tier 1
EPA Family No. 5CEXL060.ABA
Location: 1200 Striker Ave.
Exhausted through SCR APC device (P/O 19585) to meet BACT standards

5. IC ENGINE, EMERGENCY USE

Permit No.: P/O 19410
Manufacturer: Cummins
Model No. XQSK60-G6 Non Road 1
Serial No. 33163622
Engine BHP: 2,922 bhp @ 1,800 RPM
Fuel Type: CARB diesel
Driving: Electrical generator
Model Year: 2006
Tier: Tier 1
EPA Family No. 5CEXL060.ABA
Location: 1200 Striker Ave.
Exhausted through SCR APC device (P/O 19586) to meet BACT standards

6. IC ENGINE, EMERGENCY USE

Permit No.: P/O 19408
Manufacturer: Cummins
Model No. 2000DQKC
Serial No. C040616638
Engine BHP: 2,922 bhp @ 1,800 RPM
Fuel Type: CARB diesel
Driving: Electrical generator
Model Year: 2004
Tier: Tier 1
EPA Family No. 5CEXL060.ABA
Location: 1200 Striker Ave.

E. SIGNIFICANT EMISSIONS UNIT DESCRIPTION (continued)
--

7. IC ENGINE, EMERGENCY USE

Permit No.: P/O 20279
Manufacturer: Cummins
Model No. QSKTA60-GE
Serial No. 33167241
Engine BHP: 2,922 bhp @ 1,800 RPM
Fuel Type: CARB diesel
Driving: Electrical generator
Model Year: 2007
Tier: Tier 2
EPA Family No. 7CEXL060AAD
Location: 1200 Striker Ave.

8. IC ENGINE, EMERGENCY USE

Permit No.: P/O 20280
Manufacturer: Cummins
Model No. QSKTA60-GE
Serial No. 33167380
Engine BHP: 2,922 bhp @ 1,800 RPM
Fuel Type: CARB diesel
Driving: Electrical generator
Model Year: 2007
Tier: Tier 2
EPA Family No. 7CEXL060AAD
Location: 1200 Striker Ave.

9. IC ENGINE, EMERGENCY USE

Permit No.: P/O 20282
Manufacturer: Cummins
Model No. QSKTA60-GE
Serial No. 75779-93
Engine BHP: 2,922 bhp @ 1,800 RPM
Fuel Type: CARB diesel
Driving: Electrical generator
Model Year: 2007
Tier: Tier 2
EPA Family No. 7CEXL060AAD
Location: 1200 Striker Ave.

E. SIGNIFICANT EMISSIONS UNIT DESCRIPTION (continued)
--

10. IC ENGINE, EMERGENCY USE

Permit No.: P/O 20283
Manufacturer: Cummins
Model No. QSKTA60-GE
Serial No. 75779-94
Engine BHP: 2,922 bhp @ 1,800 RPM
Fuel Type: CARB diesel
Driving: Electrical generator
Model Year: 2007
Tier: Tier 2
EPA Family No. 7CEXL060AAD
Location: 1200 Striker Ave.

11. IC ENGINE, EMERGENCY USE

Permit No.: P/O 20284
Manufacturer: Cummins
Model No. QSKTA60-GE
Serial No. 33176023
Engine BHP: 2,922 bhp @ 1,800 RPM
Fuel Type: CARB diesel
Driving: Electrical generator
Model Year: 2008
Tier: Tier 2
EPA Family No. 8CEXL060.AAD
Location: 1200 Striker Ave.

12. IC ENGINE, EMERGENCY USE

Permit No.: P/O 20285
Manufacturer: Cummins
Model No. QSKTA60-GE
Serial No. 33175727
Engine BHP: 2,922 bhp @ 1,800 RPM
Fuel Type: CARB diesel
Driving: Electrical generator
Model Year: 2008
Tier: Tier 2
EPA Family No. 8CEXL060.AAD
Location: 1200 Striker Ave.

E. SIGNIFICANT EMISSIONS UNIT DESCRIPTION (continued)
--

13. IC ENGINE, EMERGENCY USE

Permit No.: P/O 20286
Manufacturer: Cummins
Model No. QSKTA60-GE
Serial No. 33173817
Engine BHP: 2,922 bhp @ 1,800 RPM
Fuel Type: CARB diesel
Driving: Electrical generator
Model Year: 2008
Tier: Tier 2
EPA Family No. 8CEXL060.AAD
Location: 1200 Striker Ave.

14. IC ENGINE, EMERGENCY USE

Permit No.: P/O 20287
Manufacturer: Cummins
Model No. QSKTA60-GE
Serial No. 33175193
Engine BHP: 2,922 bhp @ 1,800 RPM
Fuel Type: CARB diesel
Driving: Electrical generator
Model Year: 2008
Tier: Tier 2
EPA Family No. 8CEXL060.AAD
Location: 1200 Striker Ave.

15. IC ENGINE, EMERGENCY USE

Permit No.: P/O 20288
Manufacturer: Cummins
Model No. QSKTA60-GE
Serial No. 33170830
Engine BHP: 2,922 bhp @ 1,800 RPM
Fuel Type: CARB diesel
Driving: Electrical generator
Model Year: 2007
Tier: Tier 2
EPA Family No. 7CEXL060AAD
Location: 1200 Striker Ave.

E. SIGNIFICANT EMISSIONS UNIT DESCRIPTION (continued)
--

16. IC ENGINE, EMERGENCY USE

Permit No.: P/O 21579
Manufacturer: Cummins
Model No. QSKTA60-GE
Serial No. 33175768
Engine BHP: 2,922 bhp @ 1,800 RPM
Fuel Type: CARB diesel
Driving: Electrical generator
Model Year: 2008
Tier: Tier 2
EPA Family No. 8CEXL060.AAD
Location: 1200 Striker Ave.

17. IC ENGINE, EMERGENCY USE

Permit No.: P/O 21352
Manufacturer: Cummins
Model No. QSKTA60-GE
Serial No. 33170876
Engine BHP: 2,922 bhp @ 1,800 RPM
Fuel Type: CARB diesel
Driving: Electrical generator
Model Year: 2007
Tier: Tier 2
EPA Family No. 7CEXL060.AAD
Location: 1312 Striker Ave.

18. IC ENGINE, EMERGENCY USE

Permit No.: P/O 21366
Manufacturer: Cummins
Model No. QSKTA60-GE
Serial No. 33171019
Engine BHP: 2,922 bhp @ 1,800 RPM
Fuel Type: CARB diesel
Driving: Electrical generator
Model Year: 2007
Tier: Tier 2
EPA Family No. 7CEXL060.AAD
Location: 1312 Striker Ave.

E. SIGNIFICANT EMISSIONS UNIT DESCRIPTION (continued)
--

19. IC ENGINE, EMERGENCY USE

Permit No.: P/O 21367
Manufacturer: Cummins
Model No. QSKTA60-G6
Serial No. 33183408
Engine BHP: 2,922 bhp @ 1,800 RPM
Fuel Type: CARB diesel
Driving: Electrical generator
Model Year: 2010
Tier: Tier 2
EPA Family No. ACEXL060.AAD
Location: 1312 Striker Ave.

20. IC ENGINE, EMERGENCY USE

Permit No.: P/O 21368
Manufacturer: Cummins
Model No. QSKTA60-G6
Serial No. 33176889
Engine BHP: 2,922 bhp @ 1,800 RPM
Fuel Type: CARB diesel
Driving: Electrical generator
Model Year: 2008
Tier: Tier 2
EPA Family No. 8CEXL060.AAD
Location: 1312 Striker Ave.

21. IC ENGINE, EMERGENCY USE

Permit No.: P/O 21369
Manufacturer: Cummins
Model No. QSKTA60-G9
Serial No. 33183548
Engine BHP: 2,922 bhp @ 1,800 RPM
Fuel Type: CARB diesel
Driving: Electrical generator
Model Year: 2010
Tier: Tier 2
EPA Family No. ACEXL060.AAD
Location: 1312 Striker Ave.

E. SIGNIFICANT EMISSIONS UNIT DESCRIPTION (continued)
--

22. IC ENGINE, EMERGENCY USE

Permit No.: P/O 21370
Manufacturer: Cummins
Model No. QSKA60-G6
Serial No. 33187888
Engine BHP: 2,922 bhp @ 1,800 RPM
Fuel Type: CARB diesel
Driving: Electrical generator
Model Year: 2011
Tier: Tier 2
EPA Family No. BCEXL060.AAD
Location: 1312 Striker Ave.

23. IC ENGINE, EMERGENCY USE

Permit No.: P/O 21371
Manufacturer: Cummins
Model No. QSKA60-G6
Serial No. 33192834
Engine BHP: 2,922 bhp @ 1,800 RPM
Fuel Type: CARB diesel
Driving: Electrical generator
Model Year: 2012
Tier: Tier 2
EPA Family No. CCEXL060.AAD
Location: 1312 Striker Ave.

24. IC ENGINE, EMERGENCY USE

Permit No.: P/O 21372
Manufacturer: Cummins
Model No. QSKA60-G6
Serial No. 33193284
Engine BHP: 2,922 bhp @ 1,800 RPM
Fuel Type: CARB diesel
Driving: Electrical generator
Model Year: 2012
Tier: Tier 2
EPA Family No. CCEXL060.AAD
Location: 1312 Striker Ave.

E. SIGNIFICANT EMISSIONS UNIT DESCRIPTION (continued)
--

25. IC ENGINE, EMERGENCY USE

Permit No.: P/O 22348
Manufacturer: Cummins
Model No. QSK60-G6
Serial No. 61113-343
Engine BHP: 2,922 bhp @ 1,800 RPM
Fuel Type: CARB diesel
Driving: Electrical generator
Model Year: 2013
Tier: Tier 2
EPA Family No. DCEXL060.AAD
Location: 1312 Striker Ave.

26. IC ENGINE, EMERGENCY USE

Permit No.: P/O 22349
Manufacturer: Cummins
Model No. QSK60-G6
Serial No. 33196078
Engine BHP: 2,922 bhp @ 1,800 RPM
Fuel Type: CARB diesel
Driving: Electrical generator
Model Year: 2013
Tier: Tier 2
EPA Family No. DCEXL060.AAD
Location: 1312 Striker Ave.

27. IC ENGINE, EMERGENCY USE

Permit No.: P/O 22350
Manufacturer: Cummins
Model No. QSK60-G6
Serial No. 33196316
Engine BHP: 2,922 bhp @ 1,800 RPM
Fuel Type: CARB diesel
Driving: Electrical generator
Model Year: 2013
Tier: Tier 2
EPA Family No. DCEXL060.AAD
Location: 1312 Striker Ave.

E. SIGNIFICANT EMISSIONS UNIT DESCRIPTION (continued)
--

28. IC ENGINE, EMERGENCY USE

Permit No.: P/O 22351
Manufacturer: Cummins
Model No. QSK60-G6
Serial No. 33196301
Engine BHP: 2,922 bhp @ 1,800 RPM
Fuel Type: CARB diesel
Driving: Electrical generator
Model Year: 2013
Tier: Tier 2
EPA Family No. DCEXL060.AAD
Location: 1312 Striker Ave.

29. IC ENGINE, EMERGENCY USE

Permit No.: P/O 22352
Manufacturer: Cummins
Model No. QSK60-G6
Serial No. 33198190
Engine BHP: 2,922 bhp @ 1,800 RPM
Fuel Type: CARB diesel
Driving: Electrical generator
Model Year: 2012
Tier: Tier 2
EPA Family No. CCEXL060.AAD
Location: 1312 Striker Ave.

30. IC ENGINE, EMERGENCY USE

Permit No.: P/O 22353
Manufacturer: Cummins
Model No. QSK60-G6
Serial No. 33197570
Engine BHP: 2,922 bhp @ 1,800 RPM
Fuel Type: CARB diesel
Driving: Electrical generator
Model Year: 2013
Tier: Tier 2
EPA Family No. DCEXL060.AAD
Location: 1312 Striker Ave.

E. SIGNIFICANT EMISSIONS UNIT DESCRIPTION (continued)

31. IC ENGINE, EMERGENCY USE

Permit No.: P/O 22354
Manufacturer: Cummins
Model No. QSK60-G6
Serial No. 33197808
Engine BHP: 2,922 bhp @ 1,800 RPM
Fuel Type: CARB diesel
Driving: Electrical generator
Model Year: 2012
Tier: Tier 2
EPA Family No. CCEXL060.AAD
Location: 1312 Striker Ave.

32. IC ENGINE, EMERGENCY USE

Permit No.: P/O 22355
Manufacturer: Cummins
Model No. QSK60-G6
Serial No. 33198524
Engine BHP: 2,922 bhp @ 1,800 RPM
Fuel Type: CARB diesel
Driving: Electrical generator
Model Year: 2012
Tier: Tier 2
EPA Family No. CCEXL060.AAD
Location: 1312 Striker Ave.

33. IC ENGINE, EMERGENCY USE

Permit No.: P/O 22356
Manufacturer: Cummins
Model No. QSK60-G6
Serial No. 33198266
Engine BHP: 2,922 bhp @ 1,800 RPM
Fuel Type: CARB diesel
Driving: Electrical generator
Model Year: 2012
Tier: Tier 2
EPA Family No. CCEXL060.AAD
Location: 1312 Striker Ave.

E. SIGNIFICANT EMISSIONS UNIT DESCRIPTION (continued)
--

34. IC ENGINE, EMERGENCY USE

Permit No.: P/O 22357
Manufacturer: Cummins
Model No. QSK60-G6
Serial No. 33197558
Engine BHP: 2,922 bhp @ 1,800 RPM
Fuel Type: CARB diesel
Driving: Electrical generator
Model Year: 2013
Tier: Tier 2
EPA Family No. DCEXL060.AAD
Location: 1312 Striker Ave.

35. IC ENGINE, EMERGENCY USE

Permit No.: P/O 22358
Manufacturer: Cummins
Model No. QSK60-G6
Serial No. 33197997
Engine BHP: 2,922 bhp @ 1,800 RPM
Fuel Type: CARB diesel
Driving: Electrical generator
Model Year: 2013
Tier: Tier 2
EPA Family No. DCEXL060.AAD
Location: 1312 Striker Ave.

36. IC ENGINE, EMERGENCY USE

Permit No.: P/O 22359
Manufacturer: Cummins
Model No. QSK60-G6
Serial No. 33197860
Engine BHP: 2,922 bhp @ 1,800 RPM
Fuel Type: CARB diesel
Driving: Electrical generator
Model Year: 2012
Tier: Tier 2
EPA Family No. CCEXL060.AAD
Location: 1312 Striker Ave.

E. SIGNIFICANT EMISSIONS UNIT DESCRIPTION (continued)
--

37. IC ENGINE, EMERGENCY USE

Permit No.: P/O 22360
Manufacturer: Cummins
Model No. QSK60-G6
Serial No. 33198332
Engine BHP: 2,922 bhp @ 1,800 RPM
Fuel Type: CARB diesel
Driving: Electrical generator
Model Year: 2012
Tier: Tier 2
EPA Family No. CCEXL060.AAD
Location: 1312 Striker Ave.

38. IC ENGINE, EMERGENCY USE

Permit No.: P/O 22361
Manufacturer: Cummins
Model No. QSK60-G6
Serial No. 33198010
Engine BHP: 2,922 bhp @ 1,800 RPM
Fuel Type: CARB diesel
Driving: Electrical generator
Model Year: 2012
Tier: Tier 2
EPA Family No. CCEXL060.AAD
Location: 1312 Striker Ave.

39. IC ENGINE, EMERGENCY USE

Permit No.: P/O 22362
Manufacturer: Cummins
Model No. QSK60-G6
Serial No. 33198596
Engine BHP: 2,922 bhp @ 1,800 RPM
Fuel Type: CARB diesel
Driving: Electrical generator
Model Year: 2012
Tier: Tier 2
EPA Family No. CCEXL060.AAD
Location: 1312 Striker Ave.

E. SIGNIFICANT EMISSIONS UNIT DESCRIPTION (continued)
--

40. IC ENGINE, EMERGENCY USE

Permit No.:	P/O 22363
Manufacturer:	Cummins
Model No.	QSK60-G6
Serial No.	33198517
Engine BHP:	2,922 bhp @ 1,800 RPM
Fuel Type:	CARB diesel
Driving:	Electrical generator
Model Year:	2012
Tier:	Tier 2
EPA Family No.	CCEXL060.AAD
Location:	1312 Striker Ave.

41. AIR POLLUTION CONTROL SELECTIVE CATALYTIC REDUCTION SYSTEM SERVING IC ENGINE P/O 19409

Permit No.: P/O 19585

A selective catalytic reduction (SCR) system is utilized for NO_x control on the IC engine exhaust. The SCR system is comprised of a reactor chamber, catalyst modules, urea storage system, urea injection system, monitoring equipment and sensors. The urea injection rate is controlled by monitoring the flow rate and temperature. The SCR system is designed to control NO_x at or below US EPA Tier II emission standards. The IC engine that the SCR is controlling meets US EPA Tier 1 emission standards without the benefit of an SCR and is in compliance with the emission standards for the specific model year.
Location: 1200 Striker Ave.

42. AIR POLLUTION CONTROL SELECTIVE CATALYTIC REDUCTION SYSTEM SERVING IC ENGINE P/O 19410

Permit No.: P/O 19586

A selective catalytic reduction (SCR) system is utilized for NO_x control on the IC engine exhaust. The SCR system is comprised of a reactor chamber, catalyst modules, urea storage system, urea injection system, monitoring equipment and sensors. The urea injection rate is controlled by monitoring the flow rate and temperature. The SCR system is designed to control NO_x at or below US EPA Tier II emission standards. The IC engine that the SCR is controlling meets US EPA Tier 1 emission standards without the benefit of an SCR and is in compliance with the emission standards for the specific model year.
Location: 1200 Striker Ave.

F. INSIGNIFICANT EMISSIONS UNIT DESCRIPTION

This section contains a list of emissions units operated at the facility that are considered insignificant emission sources and are listed as such in the Title V permit. The basis for determining whether equipment is an insignificant emission unit is made based on the SMAQMD “List and Criteria” document, Part B (List of Title V Insignificant Activities), Section 5 which was last revised on April 26, 2001.

Source Category	Exempt Equipment Description	Basis for Exemption (SMAQMD “List and Criteria”)
A. Fugitive Emission Sources Associated with Insignificant Activities	1. 5,000 gallon water storage tank 2. Chill water expansion tank 1,980 gallons with air separator 3. Chill water expansion tank 1,000 gallons with air separator	1 - 3. Insignificant air pollutant sources from these sources
B. Combustion and Heat Transfer Equipment	1. 250,000 BTU/hr heating unit and exclusively fired with natural gas. (qty 1) 2. 400,000 btu/hr heating unit for makeup air exclusively fired with natural gas - separate processes (qty 8) 3. 5 Hp pressure washer, fuel: gasoline 4. Forklift, fuel: propane 5. Propane Fired Barbeque	1 ,2, 5. <5,000,000 Btu and exclusively fired with natural gas or LPG (propane) 3,4. Piston-type internal combustion engine with rating <50 bhp.
C. Cooling Towers	1. Cooling Towers at 2,700 GPM - Quantity 3 2. Cooling Towers at 3,600 GPM - Quantity 3 3. Cooling Towers at 3,800 GPM - Quantity 9	1 – 3 <10,000 GPM and are not used to cool process water, water from barometric jets or water from barometric condensers
D. Printing and Reproduction Equipment	Office Printers, Fax and copiers	Insignificant pollution source
E. Food Processing Equipment	None	N/A
F. Plastic and / or Rubber Processing Equipment	None	N/A

F. INSIGNIFICANT EMISSIONS UNIT DESCRIPTION (continued)

Source Category	Exempt Equipment Description	Basis for Exemption (SMAQMD “List and Criteria”)
G. Storage Containers, Reservoirs, and Tanks – Fuel, Fuel Oil and Asphalt	1. See Table 3 for diesel fuel and motor oil	Diesel Fuel and motor oil storage capacity of <19,800 gallons with specific gravity >0.8251
H. Storage Containers, Reservoirs, and Tanks – General Organic and VOC-Containing Material	None	N/A
I. Storage Containers, Reservoirs, and Tanks – Inorganic Material	1. See Table 4	Insignificant air pollutant emissions source
J. Storage Containers, Reservoirs, and Tanks – Liquefied Gases	1. Carbon Dioxide Tanks 2. Propane Tanks	1 - 2. Insignificant air pollutant emissions
K. Compression and Storage of Dry Natural Gas	None	N/A
L. Transfer Equipment	1. Urea tank has two transfer systems for injection of urea for SCR units	Insignificant air pollutant emissions source
M. Adhesive Application	None	N/A
N. Surface Coating	None	N/A
O. Solvent Cleaning	None	N/A
P. Abrasive Blasting	None	N/A
Q. Brazing, Soldering, Welding and Cutting Torches	None	N/A

F. INSIGNIFICANT EMISSIONS UNIT DESCRIPTION (continued)

Source Category	Exempt Equipment Description	Basis for Exemption (SMAQMD “List and Criteria”)
R. Solder Leveler, Hydrosqueegee, Wave Solder Machine, or Drag Solder Machine	None	N/A
S. Metal Products	None	N/A
T. Aerosol Can Puncturing or Crushing	None	N/A
U. Biotechnology Manufacturing	None	N/A
V. Textile Dyeing, Stripping or Bleaching	None	N/A
W. Laboratory Fume Hoods and Vents	None	N/A
X. Refrigeration Units	1. 900 ton chillers Quantity 3 2. 1,200 ton chillers Quantity 3 3. 1,725 ton chillers Quantity 6	1 - 3. Not used in conjunction with air pollution control equipment

F. INSIGNIFICANT EMISSIONS UNIT DESCRIPTION (continued)

Table 3 – Tanks for Diesel Fuel

Tank / Container ID#	Contents	Capacity (gal)
Diesel Fuel Storage Tank	Diesel	10,000
Diesel Fuel Storage Tank qty 10	Diesel	12,000 each
Gen1 Belly Tank for Diesel Fuel	Diesel	1,000
Day Tank Diesel Fuel qty 40	Diesel	360 each

Table 4 Tanks and Containers for Other Products

Tank / Container ID#	Contents	Capacity (gal)
Transformer Oil Filled qty 5	Mineral Oil	2,233 each
T-6 Transformer Oil Filled	Mineral Oil	636
Voltage Regulator qty 9	Mineral Oil	303 each
Radiators associated with Emergency Diesel Generators @ 1200 Striker Ave and 1312 Striker Ave (qty 40)	Propylene Glycol	80 each
Urea Storage Tank for SCRs	Urea	1000
Lead acid batteries – 2400 jars @ 1200 Striker and 1860 jars @ 1312 Striker	Sulfuric Acid 10-30% by weight	10 each
Emergency Generators 1 L sumps qty 40	Lubricating Oil	74 each

G. ALTERNATE OPERATING SCENARIOS

None requested by the permit holder.

H. FACILITY EMISSIONS

The following table represents the maximum emission for each pollutant based on the US EPA Tier emission standard applicable when the IC engine was permitted and limiting factors for IC engine hours of operation and overall facility emission limits. Since there are different emission factors, for some of the IC engines, the maximum of a specific pollutant is derived by specific IC engine sets that may not necessarily match between pollutants.

Maximum Allowable Emissions tons per year								
Equipment	VOC	NOx	SOx	PM10	CO	Single HAP (A)	Total HAPs (A)	GHG CO2e
Total for 40 Standby IC engines	9.4	45.5	0.5	1.5	35	0.031	0.131	4,582

(A) The HAP values are based on the maximum fuel usage to achieve 45.5 tons/year of NOx and AP-42 emission factors for this source category. Ammonia slip for the SCR is estimated to be 10 PPM. They are not federally enforceable emission limits. The federally enforceable emission limits would be 9.9 tons/year for a single HAP and 24.9 tons/year for a combination of HAPs.

Maximum ROC Emissions When NOx Emissions Equal 45.5 Tons/Year

P/O No.	VOC (lbs/year)	NOx (lbs/year)	SOx (lbs/year)	PM10 (lbs/year)	CO (lbs/year)
15495	541	3,736	89	216	4,602
15963	0	0	0	0	0
19104	0	0	0	0	0
19408	0	0	0	0	0
19409	1,288	6,184	212	193	3,349
19410	1,288	6,184	212	193	3,349
20279, 20280, 20282 - 20288	4,184	19,912	20	620	10,788

H. FACILITY EMISSIONS (continued)

P/O No.	VOC (lbs/year)	NOx (lbs/year)	SOx (lbs/year)	PM10 (lbs/year)	CO (lbs/year)
21579	1,288	6,184	6	192	3,350
21352, 21366-21372, 22348 - 22363	10,164	48,800	47	1,515	26,436
Total lbs/year	18,753	91,000			
Total tons/year	9.4	45.5			
NOx at 1312 Striker (lbs/year)		48,800			
NOx at 1200 Striker (lbs/year)		42,200			

Maximum SOx Emissions when NOx Emissions Equal 45.5 Tons/Year

P/O No.	VOC (lbs/year)	NOx (lbs/year)	SOx (lbs/year)	PM10 (lbs/year)	CO (lbs/year)
15495	1,268	8,750	209	507	10,779
15963	1,268	8,750	203	127	10,779
19104	1,268	8,750	203	189	10,779
19408	0	0	0	0	0
19409	1,288	6,184	212	193	3,349
19410	1,288	6,184	212	193	3,349
20279, 20280, 20282 – 20288	0	0	0	0	0
21579	1,288	6,184	6	192	3,350
21352, 21366-21372, 22348 – 22363	9,622	46,198	45	1,367	25,026
Total lbs/year		91,000	1,090		
Total tons/year		45.5	0.545		
NOx at 1312 Striker (lbs/year)		46,198			
NOx at 1200 Striker (lbs/year)		44,802			

Maximum PM10 Emissions when NOx Emissions Equal 45.5 Tons/Year

H. FACILITY EMISSIONS (continued)

P/O No.	VOC (lbs/year)	NOx (lbs/year)	SOx (lbs/year)	PM10 (lbs/year)	CO (lbs/year)
15495	1,268	8,750	209	507	10,779
15963	0	0	0	0	0
19104	0	0	0	0	0
19408	0	0	0	0	0
19409	1,288	6,184	212	193	3,349
19410	1,288	6,184	212	193	3,349
20279, 20280, 20282 – 20288	3,130	14,898	15	464	8,071
21579	1,288	6,184	6	192	3,350
21352, 21366-21372, 22348 – 22363	10,164	48,800	47	1,515	26,436
Total lbs/year		91,000		3,064	
Total tons/year		45.5		1.5	
NOx at 1312 Striker (lbs/year)		48,800			
NOx at 1200 Striker (lbs/year)		42,200			

Maximum CO Emissions when NOx Emissions Equal 45.5 Tons/Year

P/O No.	VOC (lbs/year)	NOx (lbs/year)	SOx (lbs/year)	PM10 (lbs/year)	CO (lbs/year)
15495	1,268	8,750	209	507	10,779
15963	1,268	8,750	203	127	10,779
19104	1,268	8,750	203	189	10,779
19408	474	3,271	0.9	71	4,030
19409	1,288	6,184	212	193	3,349
19410	65	311	11	10	168
20279, 20280, 20282 - 20288	0	0	0	0	0

H. FACILITY EMISSIONS (continued)

P/O No.	VOC (lbs/year)	NOx (lbs/year)	SOx (lbs/year)	PM10 (lbs/year)	CO (lbs/year)
21579	1,288	6,184	6	192	3,350
21352, 21366-21372, 22348 - 22363	10,167	48,800	51	1,525	26,433
Total lbs/year		91,000			69,667
Total tons/year		45.5			35
NOx at 1312 Striker (lbs/year)		48,800			
NOx at 1200 Striker (lbs/year)		42,200			

Maximum Fuel Usage When NOx Emissions Equal 45.5 Tons/Year (A)

P/O No.	Gal/hr	NOx Emission Rate g/hp-hr	HP	NOx Emission Rate lb/hr	gal/lb NOx	NOx Emissions	Total gallons per year
15495	138.9	6.9	2,876	43.7	3.2	3,736	11,861
15963	138.9	6.9	2,876	43.7	3.2	0	0
19104	138.9	6.9	2,876	43.7	3.2	0	0
19408	136.6	6.9	2,922	44.4	3.1	0	0
19409	136.6	4.8	2,922	30.9	4.4	6,184	27,319
19410	136.6	4.8	2,922	30.9	4.4	6,184	27,319
20279, 20280, 20282 - 20288	137.9	4.8	2,922	30.9	4.5	19,912	88,802
21579	137.9	4.8	2,922	30.9	4.5	6,184	27,579
21352, 21366- 21372, 22348 - 22363	137.9	4.8	2,922	30.9	4.5	48,800	217,635
Total Fuel (gal)							400,515
Total lbs/year						91,000	
Total tons/year						45.5	
NOx at 1312 Striker (lbs/year)						48,800	
NOx at 1200 Striker (lbs/year)						36,016	

(A) This table is needed to calculate GHG emissions as well as HAP emissions

H. FACILITY EMISSIONS (continued)

HAP Emissions (A)

HAP	Emission Factor lbs/MMBTU	lbs/yr	tons/yr
Benzene	9.33E-04	48.4	0.024
1,3 Butadiene	3.91E-05	2.0	0.001
Acrolein	9.25E-05	4.8	0.0024
Total PAH*	1.68E-04	8.7	0.00436
Xylenes	2.85E-04	14.8	0.00739
Toluene	4.09E-04	21.2	0.0106
Acetaldehyde	7.67E-04	39.8	0.0199
Formaldehyde	1.18E-03	61.2	0.0306
Ammonia Slip (B)		62	0.031
Total		263	0.131

(A) Emission factors taken from U.S. EPA AP-42 Table 3.3-2 (10/96).

(B) Ammonia Slip estimated at 10 PPM.

Basis for Emission Calculations

Gal/year 400,515.3
Energy Content 129,500 BTU/gal
BTU/year 51,866,733,378
MMBTU/year 51,866.7

* Assumed all PAH are HAPs

H. FACILITY EMISSIONS (continued)

Ammonia Slip Calculation

Given: 10 PPM Ammonia Slip for the SCRs (P/O 19595 & 19596)
IC Engine limitation of 200 hrs/year each (P/O 19401 & 19410)
IC Engine Exhaust Rate = 14,920 ACFM @ 893 F
1 ATM Assumed Pressure
 $R = 0.730241 \text{ FT}^3\text{XATM}/(\text{LBmol}\cdot\text{R})$
MW of Ammonia = 17 lb/lbmol

$$\begin{aligned} \text{lb/year of ammonia emissions} &= (10 \text{ PPM}) \times (1\text{E-}6) \times (17 \text{ lb/lbmol}) \times (14,920 \text{ ft}^3/\text{min}) \\ &\quad \times (60 \text{ min/hr}) \times (400 \text{ hr/yr}) \div (0.730241 \text{ ft}^3 \times \text{ATM}/1 \text{ lb-mol}) \\ &\quad \div (1,352.07\text{R}/1 \text{ atm}) \\ &= 61.65 \text{ lb/yr} \end{aligned}$$

GHG Emission Calculation

From California Regulation for the Mandatory Reporting of Greenhouse Gas Emissions
California Code of Regulations subchapter 10, Article 2, section 95100 to 95133

Appendix A-5 Table 3

Distillate Fuel (#1, 2 & 4) conversion to CO₂e

10.4 Kg CO₂e per gallon of distillate Fuel

400,515 gallons/year X 10.4 Kg CO₂e/gallon X 2.2 lbs/Kg X 1 ton/ 2000 lbs = 4,582 Tons CO₂e

I. APPLICABLE FEDERALLY ENFORCEABLE REQUIREMENTS General Requirements
--

SMAQMD Rule 101 – General Provision and Definitions

SIP Approved: 08-09-2012 (77 FR 47535)

Rule Description: This rule provides definitions of terms, specifies authority to arrest and specifies what data is public information.

Compliance Status: The rule does not require the permit holder to take any actions.

SMAQMD Rule 102 – Circumvention

SIP Approved: 12-05-1984 (49 FR 47490)

Rule Description: This rule prohibits concealment of emissions and specifies how compliance determinations are made for combined and separated emissions.

Compliance Status: The permit holder is expected to comply with the rule requirements.

SMAQMD Rule 105 - Emission Statement

SIP Approved: 06-06-2008 (73 FR 32240)

Rule Description: This rule requires the facility to provide annual emission data for VOC and NOx when emissions exceed 25 tons

Compliance Status: The applicant's actual emissions have not exceeded 25 tons of VOC or NOx. The applicant will submit an emission report when emissions exceed 25 tons per year

SMAQMD Rule 201 - General Permit Requirements

SIP Approved: 07-13-1987 (52 FR 26148)
11-20-1984 rule version is SIP approved
08-24-2006 rule version is the current version and is not SIP approved

Rule Description: This rule provides an orderly procedure for the review of new sources of air pollution and of the modification and operation of existing sources through the issuance of permits.

Compliance Status: The permit holder has active permits for all sources that require permits.

I. APPLICABLE FEDERALLY ENFORCEABLE REQUIREMENTS

General Requirements (continued)

The following SMAQMD rule is not an applicable federal requirement but is discussed here to document the non-applicability determination for the record:

SMAQMD Rule 202 - New Source Review

SIP Approved: SIP approval of 11-20-1984 rule version was withdrawn on 08-19-2011. 08-23-2012 rule version is the current version and is not SIP approved. This rule is not Federally enforceable.

Rule Description: This rule sets the procedures for review of new and modified stationary sources and provides the mechanisms for evaluating the applicability of BACT and/or offset requirements.

Compliance Status: The permit holder's past permit actions have been in compliance with this rule.

SMAQMD Rule 203 - Prevention of Significant Deterioration

SIP Approved: 07-20-2011 (76 FR 43183)
01-27-2011 rule version is SIP approved.

Rule Description: This rule sets the procedures for review of the Prevention of Significant Deterioration (PSD) program is construction permitting program for new major facilities and major modifications to existing major facilities.

Compliance Status: This is a recently adopted and SIP approved rule. The facility's equipment will be reviewed pursuant to this rule, if applicable, for all future permitting actions.

SMAQMD Rule 207 - Title V Federal Operating Permits

SIP Approved: 11-21-2003 (68 FR 65637) (as part of the Title V Federal Operating Permit program approval)

Rule Description: This rule sets forth the procedures for review, issuance and renewal of Title V operating permits.

Compliance Status: The permit holder has submitted a timely and complete Title V initial permit application.

SMAQMD Rule 214 - Federal New Source Review

SIP Approved: 08-29-2013 (78 FR 53271)
08-23-2012 rule version is SIP approved.

I. APPLICABLE FEDERALLY ENFORCEABLE REQUIREMENTS General Requirements (continued)
--

Rule Description: This rule sets the procedures for review of emissions units at new and modified major stationary sources and provides the mechanisms for evaluating the applicability of BACT and/or offset requirements.

Compliance Status: This is a recently adopted and SIP approved rule. The permit holder's equipment will be reviewed pursuant to this rule, if applicable, for all future permitting actions.

SMAQMD Rule 217 - Public Notice Requirements for Permits

SIP Approved: 08-29-2013 (78 FR 53271)
08-23-2012 rule version is SIP approved.

Rule Description: This rule provides an administrative mechanism for public notification and review of the issuance of authorities to construct and permits to operate at new and modified stationary air pollution sources.

Compliance Status: This is a recently adopted and SIP approved rule. The permit holder's equipment will be reviewed pursuant to this rule, if applicable, for all future permitting actions.

SMAQMD Rule 301 - Permit Fees (Title V related fees only)

SIP approved: The rule is not SIP approved but the portions of the rule related to Title V permit fees are applicable because they are part of the SMAQMD Title V Federal Operating Permit program approved by U.S. EPA on 11-21-2003 (68 FR 65637).

Rule Description: This rule requires Title V sources to pay specified fees.

Compliance Status: The owner/operator is expected to comply with the Title V fee requirement.

SMAQMD Rule 307 – Clean Air Act Fees

SIP Approved: 08-26-2003 (68 FR 51184)
09-26-2002 rule version is SIP approved.

Rule Description: This rule requires major sources of VOC and NO_x to pay specified fees beginning after the U.S. EPA determines that the SMAQMD has failed to demonstrate attainment of the one hour ozone ambient air quality standard by the attainment year.

Compliance Status: The owner/operator is expected to comply with the fee requirement.

I. APPLICABLE FEDERALLY ENFORCEABLE REQUIREMENTS General Requirements (continued)
--

SMAQMD Rule 401 - Ringelmann Chart

SIP Approved: 02-01-1984 (49 FR 3987)
04-19-1983 rule version is SIP approved

Rule Description: This rule limits the discharge of air contaminants into the atmosphere through visible emissions and opacity limitations.

Compliance Status: All equipment is expected to comply with the visible emission requirement.

SMAQMD Rule 403 - Fugitive Dust

SIP Approved: 12-05-1984 (49 FR 47490)
08-03-1977 rule version is SIP approved

Rule Description: This rule regulates operations which may cause fugitive dust emissions into the atmosphere.

Compliance Status: The facility complies with this rule by taking the necessary precautions to ensure that fugitive dust is not airborne beyond the property line.

SMAQMD Rule 442 - Architectural Coatings

SIP Approved: 10-04-16 (81 FR 68320)
09-24-15 rule version is SIP approved

Rule Description: This rule limits the quantity of volatile organic compounds in architectural coatings supplied, sold, offered for sale, applied, solicited for application or manufactured for use within the District.

Compliance Status: The affected coatings used by the permit holder are received and stored in containers that display the required manufacturer's labels and demonstrate compliance with the rule's requirements. The use of coating and solvents are in compliance with this rule.

SMAQMD Rule 466 - Solvent Cleaning

SIP Approved: 10-04-16 (81 FR 68320)
09-24-15 rule version is SIP approved

Rule Description: This rule reduces the emissions of volatile organic compounds from solvent cleaning operations and activities, and from the storage and disposal of new and spent cleaning solvents.

Compliance Status: The affected architectural coating application equipment solvent cleaning

I. APPLICABLE FEDERALLY ENFORCEABLE REQUIREMENTS General Requirements (continued)
--

materials used by the facility are received and stored in containers that display the required manufacturer's labels and demonstrate compliance with the rule's requirements.

The following federal regulation is not an applicable federal requirement but is discussed here to document the non-applicability determination:

SMAQMD Rule 701 - Emergency Episode Plan

SIP Approved: 09-05-2000 (65 FR 53602):
05-27-1999 rule version is SIP approved

Rule Description: This rule requires a plan be prepared for specific actions to be taken when health related levels of ozone, Carbon Monoxide or PM10 are exceeded and is applicable to sources exceeding 50 tons of VOC or NOx or 100 tons of CO or PM.

Compliance Status: This rule is not applicable since the potential to emit for the criteria pollutants listed in the rule are higher than the permitted potential of the facility.

The following federal regulation is not an applicable federal requirement but is discussed here to document the non-applicability determination:

40 CFR 68 (begin at 68.1) - Chemical Accident Prevention Provisions

Promulgated: 01-31-1994 (59 FR 4493)
[04-09-2004 (69 FR 18831) most recent amendment]

Rule Description: This regulation specifies requirements for owners or operators of stationary sources concerning the prevention of accidental chemical releases.

An owner or operator of a stationary source that has more than a threshold quantity of a regulated substance in a process, as determined under 40 CFR 68.115, must comply with the requirements of 40 CFR Part 68.

40 CFR 68.215 requires that the air permitting authority include in the Title V permit for a facility specified statements regarding the regulation. Those statements are included in the Federally Enforceable Requirements - General section of the permit.

Compliance Status: The permit holder does not store more than the designated amounts of the specified chemical substances in 40 CFR 68 and is therefore not

I. APPLICABLE FEDERALLY ENFORCEABLE REQUIREMENTS General Requirements (continued)
--

subject to this regulation

40 CFR 82 Subpart F (begin at 82.150) - Protection of Stratospheric Ozone - Recycling and Emissions Reduction

Promulgated: 05-14-1993 (58 FR 28712)
[08-11-2011 most recent amendment]

Rule Description: The purpose of this subpart is to reduce emissions of class I and class II refrigerants and their substitutes to the lowest achievable level by maximizing the recapture and recycling of such refrigerants during the service, maintenance, repair and disposal of appliances and restricting the sale of refrigerants consisting in whole or in part of a class I and class II ODS in accordance with Title VI of the Clean Air Act.

This subpart applies to any person servicing, maintaining or repairing appliances. This subpart also applies to persons disposing of appliances, including small appliances and motor vehicle air conditioners. In addition, this subpart applies to refrigerant reclaimers, technician certifying programs, appliance owners and operators, manufacturers of appliances, manufacturers of recycling and recovery equipment, approved recycling and recovery equipment testing organizations, persons selling class I or class II refrigerants or offering class I or class II refrigerants for sale and persons purchasing class I or class II refrigerants.

As indicated in 40 CFR 70.6, Title V permits need to assure compliance with all applicable requirements at the time of permit issuance. Part 70 defines as an applicable requirement, "Any standard or other requirement of the regulations promulgated to protect stratospheric ozone under Title VI of the Act, unless the Administrator has determined that such requirements need not be contained in a Title V permit." [40 CFR 70.2(12)]. The applicable requirements of Title VI are included in the Federally Enforceable Requirements - General section of the permit.

Compliance Status: The permit holder employs qualified contractors to maintain equipment that contains class I or class II refrigerants. All of the permit holder's equipment is expected to comply with the requirements of this NESHAP.

J. APPLICABLE FEDERALLY ENFORCEABLE REQUIREMENTS
Equipment Specific Requirements

SMAQMD Rule 406 - Specific Contaminants

SIP approved: 12-05-1984 (49 FR 47490)
 12-06-1978 rule version is SIP approved

Rule Description: This rule regulates emissions of sulfur compounds and combustion contaminants by limiting the emission concentration of particulate matter (PM) and SO₂. Sulfur compounds cannot exceed 0.2% by volume calculated as SO₂, PM cannot exceed 0.1 gr/DSCF corrected to 12% CO₂

Compliance Status: The following table represents the grain loading information for each engine at the facility. The facility is in compliance with this rule based on the calculation methodology described in Attachment B and the table below.

Emission Unit	Permit No.	PM Emission Rate g/hp-hr	Gr/DSCF @ 12% CO ₂	Sulfur Emission Factor g/hp-hr	% by Volume
1	15495	0.4	0.0735	0.1645	0.00339
2	15693	0.1	0.0184	0.16	0.00330
3	19104	0.149	0.0274	0.16	0.00330
4	19408	0.149	0.0274	0.1645	0.00339
5	19409	0.15	0.0276	0.16	0.00330
6	19410	0.15	0.0276	0.16	0.00330
7	20279	0.15	0.0276	0.005	0.00010
8	20280	0.15	0.0276	0.005	0.00010
9	20282	0.15	0.0276	0.005	0.00010
10	20283	0.15	0.0276	0.005	0.00010
11	20284	0.15	0.0276	0.005	0.00010

**J. APPLICABLE FEDERALLY ENFORCEABLE REQUIREMENTS
 Equipment Specific Requirements (continued)**

Emission Unit	Permit No.	PM Emission Rate g/hp-hr	Gr/DSCF @ 12% CO2	Sulfur Emission Factor g/hp-hr	% by Volume
12	20285	0.15	0.0276	0.005	0.00010
13	20286	0.15	0.0276	0.005	0.00010
14	20287	0.15	0.0276	0.005	0.00010
15	20288	0.15	0.0276	0.005	0.00010
16	21579	0.15	0.0276	0.005	0.00010
17	21352	0.15	0.0276	0.005	0.00010
18	21366	0.15	0.0276	0.005	0.00010
19	21367	0.15	0.0276	0.005	0.00010
20	21368	0.15	0.0276	0.005	0.00010
21	21369	0.15	0.0276	0.005	0.00010
22	21370	0.15	0.0276	0.005	0.00010
23	21371	0.15	0.0276	0.005	0.00010
24	21372	0.15	0.0276	0.005	0.00010
25	22348	0.15	0.0276	0.005	0.00010
26	22349	0.15	0.0276	0.005	0.00010
27	22350	0.15	0.0276	0.005	0.00010
28	22351	0.15	0.0276	0.005	0.00010
29	22352	0.15	0.0276	0.005	0.00010
30	22353	0.15	0.0276	0.005	0.00010

**J. APPLICABLE FEDERALLY ENFORCEABLE REQUIREMENTS
 Equipment Specific Requirements (continued)**

Emission Unit	Permit No.	PM Emission Rate g/hp-hr	Gr/DSCF @ 12% CO2	Sulfur Emission Factor g/hp-hr	% by Volume
31	22354	0.15	0.0276	0.005	0.00010
32	22355	0.15	0.0276	0.005	0.00010
33	22356	0.15	0.0276	0.005	0.00010
34	22357	0.15	0.0276	0.005	0.00010
35	22358	0.15	0.0276	0.005	0.00010
36	22359	0.15	0.0276	0.005	0.00010
37	22360	0.15	0.0276	0.005	0.00010
38	22361	0.15	0.0276	0.005	0.00010
39	22362	0.15	0.0276	0.005	0.00010
40	22363	0.15	0.0276	0.005	0.00010

SMAQMD Rule 412 - Stationary IC Engines Located at Major Stationary Sources of NOx

SIP Approved: 04-30-1996 (61 FR 18959)
 06-01-1995 rule version is SIP approved

Rule Description: This rule regulates emissions of NOx, CO and NMHC for the operation of stationary internal combustion IC engines located at a major stationary source of NOx

Compliance Status: Section 110 of this rule exempts emergency standby equipment from sections 301 (RACT emission limits), 302 (BARCT emission limits), 303 (alternative control requirements) 400 (administrative requirements) of this rule.
 Section 304 (equipment requirements) requires a non-resting totalizing hour meter on each IC engine
 Section 501 (recordkeeping requirements) requires maintenance of (a) permit number of each stationary IC engine. (b) Manufacturer, model number and rating in HP of each stationary IC engine (c) Actual quarterly hours of operation of each stationary IC engine (d) Copies of most recent emission tests.

**J. APPLICABLE FEDERALLY ENFORCEABLE REQUIREMENTS
 Equipment Specific Requirements (continued)**

The permit holder's equipment complies with this rule.

(See discussion of streamlining of multiple applicable requirements at the end of this section titled "Equipment Specific Requirements - IC Engine, Emergency Use)

SMAQMD Rule 420 - Sulfur Content of Fuels

SIP approved: 12-05-1984 (49 FR 47490)

Rule Description: This rule regulates emissions of sulfur compounds from the combustion of fuels by limiting the sulfur content of the fuel. The limit for liquid fuel (diesel) is not to exceed 0.5% sulfur by weight.

Compliance Status: CARB diesel is required to be used exclusively at the facility. CARB diesel is regulated to have 15 PPM by weight and is in compliance with this rule.

$$\frac{PPM}{1E6} \times 100\% = \text{Weight of sulfur in the fuel}$$

$$\frac{15PPM}{1E6} \times 100\% = 0.0015\%$$

Equipment	Fuel	SMAQMD Rule 420 Allowable Sulfur Content of Fuel % S by weight	Expected Sulfur Content of Fuel Used % S by weight
IC engine, emergency use	CARB diesel	0.5	0.0015

Permit Conditions on SMAQMD Rule 201 Authorities to Construct and Permits to Operate

Condition Description: The conditions of operation on SMAQMD Rule 201 Authorities to Construct and Permits to Operate for the emergency/standby IC engines limit emission concentrations, hours of operation, limit mass emissions, require BACT, record keeping and reporting.

The following table indicates the conditions on the SMAQMD Rule 201 permits that are not applicable federally enforceable requirements.

J. APPLICABLE FEDERALLY ENFORCEABLE REQUIREMENTS
Equipment Specific Requirements (continued)

Equipment	SMAQMD Rule 201 Permit No.	Permit conditions that are not federally enforceable
IC Engine Standby, 2876 HP	P/O 15495	Condition Nos. 1, 2, 3, and 4 – These are administrative requirements not contained in any SIP-approved rule or other federally enforceable regulation. All other permit conditions are federally enforceable.
IC Engine Standby, 2876 HP	P/O 15963	Condition Nos. 1, 2, 3, and 4 – These are administrative requirements not contained in any SIP-approved rule or other federally enforceable regulation. All other permit conditions are federally enforceable.
IC Engine Standby, 2876 HP	P/O 19104	Condition Nos. 1, 2, 3, and 4 – These are administrative requirements not contained in any SIP-approved rule or other federally enforceable regulation. All other permit conditions are federally enforceable.
IC Engines Standby 2922 HP (qty 2) with associated SCR	P/O 19409, 19410, 19585, 19586	Condition Nos. 1, 2, 3, and 4 – These are administrative requirements not contained in any SIP-approved rule or other federally enforceable regulation. All other permit conditions are federally enforceable.
IC Engine Standby, 2922 HP	P/O 19408	C Condition Nos. 1, 2, 3, and 4 – These are administrative requirements not contained in any SIP-approved rule or other federally enforceable regulation. All other permit conditions are federally enforceable.
IC Engine Standby, 2922 HP (qty 10)	P/O 20279, 20280, 20282 – 20288, 21579	Condition Nos. 1, 2, 3, and 4 – These are administrative requirements not contained in any SIP-approved rule or other federally enforceable regulation. All other permit conditions are federally enforceable.

**J. APPLICABLE FEDERALLY ENFORCEABLE REQUIREMENTS
 Equipment Specific Requirements (continued)**

Equipment	SMAQMD Rule 201 Permit No.	Permit conditions that are not federally enforceable
IC Engine Standby, 2922 HP (qty 8)	P/O 21352, 21366 – 21372	Condition Nos. 1, 2, 3, and 4 – These are administrative requirements not contained in any SIP-approved rule or other federally enforceable regulation. All other permit conditions are federally enforceable. Condition Nos. 7 will be removed in the final permit. Proper noticing to exceed 5,000 lbs per quarter of NOx was completed when the project was expanded to include all 24 engines at 1312 Striker Ave. Condition Nos. 14, 15 are start-up / administrative condition for local permit issuance procedures
IC Engine Standby, 2922 HP (qty 16)	P/O 22348 - 22363	Condition Nos. 1, 2, 3, and 4 – These are administrative requirements not contained in any SIP-approved rule or other federally enforceable regulation. Conditions No. 13 (limitation of multiple engine operation) is for limitation of acute toxic effects and is not part of any federal regulation. Condition Nos. 14, 15 are start-up/administrative condition for local permit issuance procedures

Compliance Status: The permit holder's equipment complies with the SMAQMD Rule 201 permit conditions.

40 CFR 63 (begin at 63.6580) Subpart ZZZZ – NESHAP for Stationary Reciprocating Internal combustion Engines:

Promulgated: 06-15-2004 (69 FR 33506)

Rule Description: This regulation affects all Stationary Reciprocating Internal combustion engines at an area source.

Section 63.6590 (a) (1) (iii) States “For stationary RICE located at an area source of HAP emissions, a stationary RICE is existing if you commenced construction or reconstruction of the stationary RICE before June 12, 2006.”

Section 63.6590 (a) (3) States “The following stationary RICE do not have

J. APPLICABLE FEDERALLY ENFORCEABLE REQUIREMENTS Equipment Specific Requirements (continued)

to meet the requirements of this subpart and of subpart A of this part including initial notification requirements”

Section 63.6590 (a)(3)(vii) Existing commercial emergency stationary RICE located at an area source of HAP emissions.

Section 63.6590 (c) States “An affected source that meets any of the criteria in paragraphs (c)(1) through (7) of this section must meet the requirements of this part by the meeting the requirements of 40 CFR Part 60 Subpart IIII, for compression ignition engines.... No further requirements apply for such engines under this part.

Section (c)(1) States “A new or reconstructed Stationary RICE located at an area source.

Compliance Status: The IC engines permitted under 15495 &15963 were installed prior to June 12, 2006, therefore it is considered existing. Guidance documentation from EPA as well as confirmation from the EPA contact Melanie King on 6/24/2011, states that a data center is considered a commercial facility therefore these engines are not subject to this standard. All other permitted engines meet the standard by complying with 40 CFR 60 subpart IIII.

40 CFR 60 (begin at 60.42000) Subpart IIII – NSPS for Stationary Reciprocating Internal combustion Engines:

Promulgated: 07-11-2006 (69 FR 39172)

Rule Description: This NSPS is applicable to any of the following:

- a. Manufacturers of engines with a displacement of less than 30 liters per cylinder where the model year is 2007 or later for non-fire pump engines and the model year listed in Table 3 of this subpart for fire pump engines.
- b. Owners or operators of engines that commence construction after July 11, 2005 where the engine is manufactured after April 1, 2006 for a non-fire pump engine or for engines manufactured as a certified National Fire Protection Association (NFPA) fire pump after July 1, 2006.
- c. Owners and operators of engines that modify or reconstruct their engine after July 11, 2005.

The NSPS requires the following:

- a. The engine must meet the non-road standard that is applicable to the engine size and year of manufacture. The engines have been certified to the tier standard that was applicable to the engine size and year of manufacture

J. APPLICABLE FEDERALLY ENFORCEABLE REQUIREMENTS Equipment Specific Requirements (continued)

- b. The fuel used must meet the requirements specified in 40 CFR 80.510(b). The engines are required to use CARB diesel which complies with the aforementioned fuel specification.
- c. The engine must have an hour meter installed. Each engine is required to have an hour meter installed.
- d. Operation for maintenance purposes will be limited to 100 hours per year. The engines are limited to 50 hours per year or less for maintenance purposes.

Compliance Status: IC engines permitted under 15495 & 15963 were installed prior to July 11, 2005, and therefore are not subject to these subparts, although they meet US EPA Tier 1 emission standards. All other IC engines are subject. The IC engines are US EPA Tier compliant based on their model year. All the IC engines will run on CARB diesel which is in compliance with the 15 PPM sulfur content. All are equipped with a non-resettable hour meter. All are operated and maintained per the manufacturer. All IC engines have data from the manufacturer to show compliance with emission standards and/or are certified to meet the emission standards of the model year. All IC engines are respectively limited to less than 50 hours per year of maintenance. All permitted IC engines are in compliance with this subpart.

The following federal regulation is not an applicable federal requirement but is discussed here to document the non-applicability determination for the record:

40 CFR Parts 72 through 78 Acid Rain Program:

Promulgated: 01-11-1993 (58 FR 3650)
[01-24-2008 (73 FR 4357) most recent amendment]

Rule Description: This federal regulation limits the emission of NOx and SO2 from electric utility associated combustion equipment such as boilers and gas turbines in order to reduce the formation of acid rain.

Compliance Status: The facility is not subject to this provision based on part 72 Applicability, defined in section 72.6
No individual unit is greater than 25 MW, is not a Turbine or a Cogeneration facility. There is no intention to sell power back to the common electrical grid, nor is it considered a power production facility. It does not have a solid waste incinerator.

Since it does not have the applicability, this facility is not subject to the Acid Rain Program.

J. APPLICABLE FEDERALLY ENFORCEABLE REQUIREMENTS Equipment Specific Requirements (continued)

The following federal regulation is not an applicable federal requirement but is discussed here to document the non-applicability determination for the record:

40 CFR 64 (begin at 64.1) Compliance Assurance Monitoring (CAM):

Promulgated: 10-22-1997 (52 FR 54940)

Rule Description: This federal regulation specifies monitoring requirements for Title V sources that will assure compliance with emission limitations or standards.

Compliance Status: Section 64.2 (a) states that the equipment is exempt from this section if the emission unit does not meet all the conditions specified in 64.2 (a) 1-3. Section 64.2 (a) (3) states CAM is required if an individual unit can exceed emission that are equal to or greater than 100 percent of the amount, in tons per year required to be considered a major source. Currently the major source threshold for SMAQMD jurisdictional area is 25 tons per year of NOx. Each building at the applicant's facility is subject to an emission limit of 24.4 tons per year of NOx as a permit condition. Since any one engine is limited by permit conditions, to not exceed 24.4 tons of NOx per year, the requirements of this section are not imposed.

**J. APPLICABLE FEDERALLY ENFORCEABLE REQUIREMENTS
 Equipment Specific Requirements (continued)**

Streamlining Multiple Applicable Requirements:

Each of the IC engines is subject to the following overlapping Applicable Federally Enforceable/Local rule Requirements:

A. Criteria Pollutant Tier Standards and BACT Requirements.

Basis of Requirement	Emission Limits		
40 CFR 60 Subpart III NSPS for IC Engines	Installed prior to 7-11-2005	NO _x , PM, CO, VOC, SO _x	Not Covered
	Installed after 7-11-2005	NO _x , PM, CO, VOC	Pre 2007 model year must meet US EPA Tier 1 IC engine emission standards Post 2007 Model year must meet the US EPA Tier emission standard in effect for the specific model year.
		SO _x	15 PPM of Sulfur content in the fuel
SMAQMD Rule 412 (6-01-95 version) Stationary Internal combustion engines located at a major source of NO _x	Emergency equipment is exempt from this rule		
BACT requirement from SMAQMD Rule 202 New Source Review	NO _x , PM, CO, VOC, PM		Meet emission standards of the highest US EPA Tier emission standard available at time the application is deemed complete. A new US EPA Tier emission standard is not imposed as BACT until 6-months after the effective date.
	SO _x		15 PPM of Sulfur, Found in CARB diesel

Pursuant to U.S. EPA White Paper Number 2, the above applicable requirements will be streamlined and only the BACT related NSR requirements, which are the most stringent

**J. APPLICABLE FEDERALLY ENFORCEABLE REQUIREMENTS
 Equipment Specific Requirements (continued)**

requirements, will be incorporated into the Title V permit.

B. Specific Contaminants

Basis of Requirement	Applicable Requirements
SMAQMD Rule No. 406 (12-06-78 version) – Specific Contaminants	≤ 0.1 grains PM/dscf at 12% CO ₂ and ≤ 2000 ppmv sulfur compounds as SO ₂
SMAQMD Rule No. 201 permit conditions based on: SMAQMD Rule No. 202 – New Source Review	≤ 0.13 lb PM/hour (equivalent to 0.05 grains/dscf at 12% CO ₂) and ≤ 0.0015 ppmw S in the fuel (equivalent to 0.95 ppmv as SO ₂)

Pursuant to U.S. EPA’s *White Paper Number 2 for Improved Implementation of the Part 70 Operating Permits Program*, the above applicable requirements will be streamlined. The most stringent requirements are the permit conditions based on SMAQMD Rule Nos. 201 and 202, which will be included in the Title V permit.

C. Sulfur Contents of Fuels

Basis of Requirement	Applicable Requirements % S by weight
SMAQMD Rule No. 420 – Sulfur Content of Fuels	≤ 0.5%
SMAQMD Rule No. 201 Permit Conditions based on: SMAQMD Rule No. 202 – New Source Review	≤ 0.0015%

Pursuant to U.S. EPA’s *White Paper Number 2 for Improved Implementation of the Part 70 Operating Permits Program*, the above applicable requirements will be streamlined. The most stringent requirements are the permit conditions based on SMAQMD Rule Nos. 201 and 202, which will be included in the Title V permit.

J. APPLICABLE FEDERALLY ENFORCEABLE REQUIREMENTS
Equipment Specific Requirements (continued)

D. Hour Meter

Basis of Requirement	Applicable Requirements
SMAQMD Rule No. 412 (06-01-1995 version) – Stationary IC Engines Located at Major Stationary Sources of NOx	Operate a non-resetting totalizing hour meter (or computerized tracking) and maintain operation records.
SMAQMD Rule No. 201 permit conditions based on: SMAQMD Rule No. 202 – New Source Review	Operate a non-resetting totalizing hour meter (or computerized tracking) and maintain operation records.

Pursuant to U.S. EPA's *White Paper Number 2 for Improved Implementation of the Part 70 Operating Permits Program*, the above applicable requirements will be streamlined. The permit conditions based on SMAQMD Rule Nos. 201 and 202 are as stringent as the SMAQMD Rule 412 requirements and will be included in the Title V permit.

K. <u>NON-FEDERALLY ENFORCEABLE REQUIREMENTS</u> Equipment Specific Requirements

SMAQMD Rule 301 - Permit Fees - Stationary Source

SIP approved: Not SIP approved.

Rule Description: This rule requires the facility to pay fees associated with the issuance and renewal of SMAQMD Rule 201 permits.

Compliance Status: The permit holder has paid permit fees as required and is in compliance.

SMAQMD Rule 306 - Air Toxic Fees

SIP approved: Not SIP approved.

Rule Description: This rule requires the facility to pay fees associated with toxic emissions regulated through the California "Toxic Hotspot" Program.

Compliance Status: The permit holder has paid toxic fees as required and is in compliance.

SMAQMD Rule 602 - Breakdown Conditions: Emergency Variance

SIP approved: Not SIP approved.

Rule Description: This rule requires the facility to notify the SMAQMD of any equipment breakdowns that cause an emission violation and to follow specific procedures.

Compliance Status: The permit holder has complied with the requirements of the rule when equipment breakdowns have caused emission violations.

**California Code of Regulations, Title 17, Section 93115, Air Toxic Control Measure (ATCM)
Airborne toxic control measure for stationary compression ignition engines.**

SIP approved: Not SIP approved
10-18-2007 - adopted by California Air Resources Board

Rule Description: The California Air Resources Board's Air Toxic Control Measure (ATCM) - Regulation for stationary IC engines requires limiting the run time for in use IC engines, requiring emission limits of newly installed IC engines, and providing additional operational conditions if an IC engine is placed near a school. In-use IC engines are limited in hours of operation based on the PM emission rate, and no increase of other pollutants if a control device is added. IC engines installed after January 1, 2005 must meet PM emission 0.15 g/hp-hr or less, be restricted to 50 hours/year of maintenance, and must meet the highest US EPA Tier emission standards emission limits available for the model year of the IC engine. For those IC engines that fall under the requirements of this ATCM, only

**K. NON-FEDERALLY ENFORCEABLE REQUIREMENTS
Equipment Specific Requirements (continued)**

those fuels define by section 93115.5 can be used. Not discussed are rules governing diesel fired engines driving Fire Pump, since there are none as part of this application.

Rule Compliance:

The IC engines permitted by the applicant are all compliant with this rule. All IC engines installed after January 1, 2005 were built to the US EPA Tier emission standard of engine model year. IC engines installed prior to 2005 do not have any control devices. Those IC engines that do not have a PM emission rate of 0.15 g/hp-hr or less have a reduced maintenance hour limit for standby IC engines per the ATCM. All new IC engines meet the 0.15 g/hp/hr emission limit for PM and are restricted to less than 50 hours per year of maintenance time per IC engine. The facility does not have any prime power IC engines. All the IC engines considered in this project are emergency standby. The location of the IC engines are not within 1,000' or 500' of a school. The IC engines are only fired on CARB diesel that is listed as an approved fuel under the ATCM.

L. TITLE V PERMIT CONDITIONS

It is recommended that the RagingWire Data Centers, Inc. Title V Federal Operating permit renewal be issued.

See proposed Title V Federal Operating Permit TV2016-20-01 for permit conditions.

Approved by: _____ Date: _____

ATTACHMENT A

SMAQMD RULES THAT ARE
"APPLICABLE FEDERALLY ENFORCEABLE REQUIREMENTS"
FOR THE RAGINGWIRE DATA CENTERS, INC.

SMAQMD RULES THAT ARE
"APPLICABLE FEDERALLY ENFORCEABLE REQUIREMENTS"
FOR RAGINGWIRE DATA CENTERS, INC.

Rule is Applicable	Rule is SIP Approved	Rule No.	Rule Title	Is the Rule an "Applicable Federally Enforceable Requirement"?
●	●	101	General Provisions and Definitions 10-27-2011 version	Yes - No related conditions are included in the permit because of general nature of the rule.
●	●	102	Circumvention 11-29-1983 adoption	Yes - No related conditions are included in the permit because of general nature of the rule.
	●	103	Exceptions 11-29-1983 adoption	No - Source does not operate the type of equipment described in this rule.
	●	104	General Conformity 11-03-1994 adoption	No - The rule's purpose is to have the SMAQMD review federal conformity findings.
●	●	105	Emission Statement 09-05-1996 adoption	Yes - Related conditions are included in the permit.
		107	Alternative Compliance	No - It is not a SIP approved rule.
●		108	Minor Violations	No - It is not a SIP approved rule.
●	●	201	General Permit Requirements 11-20-1984 version 08-24-2006 version is not SIP approved	Yes - No related conditions are included in the permit because of the general nature of the rule.

SMAQMD RULES THAT ARE
"APPLICABLE FEDERALLY ENFORCEABLE REQUIREMENTS"
FOR RAGINGWIRE DATA CENTERS, INC.

Rule is Applicable	Rule is SIP Approved	Rule No.	Rule Title	Is the Rule an "Applicable Federally Enforceable Requirement"?
●		202	New Source Review 8-23-2012 version	Yes - Related conditions are included in the permit. SIP approved version (11-20-1984) was withdrawn from SIP approval on 8-19-2011. Current version (8-23-2012) is not SIP approved.
	●	203	Prevention of Significant Deterioration	Yes - Rule became effective on 8-19-2011. Projects processed after this date are evaluated under this rule
		204	Emission Reduction Credits	No - It is not a SIP approved rule.
		205	Community Bank and Priority Reserve Bank	No - It is not a SIP approved rule.
		206	Mobile and Transportation Source Emission Reduction Credits	No - It is not a SIP approved rule.
●	*	207	Title V Federal Operating Permit Program 7-28-2011 version	Yes - Related conditions are included in the permit. (*Although this is not a SIP approved rule, it is applicable because it is part of the approved SMAQMD Title V Permit Program.)
		208	Acid Rain	No - It is not a SIP approved rule. <i>Note: there is an equivalent federal regulation.</i>
		209	Limiting Potential to Emit	No - It is not a SIP approved rule.

SMAQMD RULES THAT ARE
 "APPLICABLE FEDERALLY ENFORCEABLE REQUIREMENTS"
 FOR RAGINGWIRE DATA CENTERS, INC.

Rule is Applicable	Rule is SIP Approved	Rule No.	Rule Title	Is the Rule an "Applicable Federally Enforceable Requirement"?
		210	Synthetic Minor Source Status	No - It is not a SIP approved rule.
		211	MACT at Major Sources of Hazardous Air Pollutants	No - It is not a SIP approved rule, but the requirements of this rule are also contained in the CAA.
●		213	Federal Major Modifications	No - It is not a SIP approved rule, but the requirements within it are part of EPA's NSR reform and are thus federally applicable.
●	●	214	Federal New Source Review 08-23-2012 version	Yes - Rule became effective 08-19-2011. Projects processed after the applicable date will be evaluated under this rule.
		215	Agricultural Permit Requirements and New Agricultural Permit Review	No - It is not a SIP approved rule.
●	●	217	Public Notice Requirements for Permits 08-23-2012 version	Yes - No related conditions are included in the permit because of the general nature of the rule.
		250	Sacramento Carbon Exchange Program	No - It is not a SIP approved rule.

SMAQMD RULES THAT ARE
"APPLICABLE FEDERALLY ENFORCEABLE REQUIREMENTS"
FOR RAGINGWIRE DATA CENTERS, INC.

Rule is Applicable	Rule is SIP Approved	Rule No.	Rule Title	Is the Rule an "Applicable Federally Enforceable Requirement"?
●	*	301	Stationary Source Permit Fees	Yes - Related conditions are included in the permit. (*Although this is not a SIP approved rule, it is applicable because it is part of the approved SMAQMD Title V Permit Program.)
●		302	Hearing Board Fees	No - It is not a SIP approved rule.
		303	Agricultural Burning Permit Fees	No - It is not a SIP approved rule.
		304	Plan Fees	No - It is not a SIP approved rule.
		305	Environmental Document Preparation and Processing Fees	No - It is not a SIP approved rule.
●		306	Air Toxics Fees	No - It is not a SIP approved rule.
●	●	307	Clean Air Act Fees 09-26-2002 version	Yes - Related conditions are included in the permit.
		310	Permit Fees - Agricultural Source	No - It is not a SIP approved rule
		311	Registration Fee for Agricultural Compression Ignition Engines	No - It is not a SIP approved rule.

SMAQMD RULES THAT ARE
"APPLICABLE FEDERALLY ENFORCEABLE REQUIREMENTS"
FOR RAGINGWIRE DATA CENTERS, INC.

Rule is Applicable	Rule is SIP Approved	Rule No.	Rule Title	Is the Rule an "Applicable Federally Enforceable Requirement"?
		350	Greenhouse Gas Program Fees	No - It is not a SIP approved rule.
●	●	401	Ringelmann Chart 04-05-1983 adoption	Yes - Related conditions are included in the permit.
●		402	Nuisance	No - It is not a SIP approved rule.
●	●	403	Fugitive Dust 11-29-1983 adoption	Yes - Related conditions are included in the permit.
●	●	404	Particulate Matter 11-20-1984 adoption	Yes - Related conditions are included in the permit. (see discussion of streamlining applicable requirements and permit shield)
	●	405	Dust and Condensed Fumes 11-29-1983 adoption	No - The source does not operate such a process.
●	●	406	Specific Contaminants 11-29-1983 adoption	Yes - Related conditions are included in the permit. (see discussion of streamlining applicable requirements and permit shield)
●	●	407	Open Burning 11-29-1983 adoption	Yes - No related conditions are included in the permit because the source does not conduct open burning.

SMAQMD RULES THAT ARE
"APPLICABLE FEDERALLY ENFORCEABLE REQUIREMENTS"
FOR RAGINGWIRE DATA CENTERS, INC.

Rule is Applicable	Rule is SIP Approved	Rule No.	Rule Title	Is the Rule an "Applicable Federally Enforceable Requirement"?
	●	408	Incinerator Burning 11-29-1983 adoption	No - The source does not operate an incinerator.
	●	409	Orchard Heaters 11-29-1983 adoption	No - The source does not operate orchard heaters.
	●	410	Reduction of Animal Matter 11-29-1983 adoption	No - The source does not operate equipment for the reduction of animal matter.
	●	411	Boiler NOx 08-23-2007 version	No - The source does not operate a boiler subject to this rule.
●	●	412	Stationary IC Engines at Major Stationary Sources of NOx 06-01-1995 adoption	Yes - Related conditions are included in the permit. (see discussion of streamlining applicable requirements and permit shield)
	●	413	Stationary Gas Turbines 03-24-2005 adoption	No - The source does not operate stationary gas turbines subject to this rule.
	●	414	Natural Gas Fired Water Heaters 08-01-1996 adoption 03-25-2010 version is not SIP approved	No - The source does not operate natural gas fired water heaters.
	●	417	Wood Burning Appliances	No - The source does not operate any wood burning appliances.

SMAQMD RULES THAT ARE
"APPLICABLE FEDERALLY ENFORCEABLE REQUIREMENTS"
FOR RAGINGWIRE DATA CENTERS, INC.

Rule is Applicable	Rule is SIP Approved	Rule No.	Rule Title	Is the Rule an "Applicable Federally Enforceable Requirement"?
		419	NOx from Miscellaneous Combustion Units	No - It is not a SIP approved rule.
●	●	420	Sulfur Content of Fuels 11-29-1983 adoption	Yes - Related conditions are included in the permit. (see discussion of streamlining applicable requirements and permit shield)
	●	421	Mandatory Episodic Curtailment of Wood and Other Solid Fuel Burning	No - The source does not operate any equipment subject to this rule
●	●	441	Organic Solvents 11-29-1983 adoption	Yes - No related conditions are included in the permit because of limited applicability.
●	●	442	Architectural Coatings 09-24-2015 adoption	Yes - Related conditions are included in the permit.
	●	443	Leaks from Synthetic Organic Chemical and Polymer Manufacturing 09-05-1996 adoption	No - The source does not operate synthetic organic chemical or polymer manufacturing equipment.
	●	444	Petroleum Solvent Dry Cleaning 08-13-1981 adoption	No - The source does not operate petroleum solvent dry cleaning equipment.

SMAQMD RULES THAT ARE
 "APPLICABLE FEDERALLY ENFORCEABLE REQUIREMENTS"
 FOR RAGINGWIRE DATA CENTERS, INC.

Rule is Applicable	Rule is SIP Approved	Rule No.	Rule Title	Is the Rule an "Applicable Federally Enforceable Requirement"?
●		446	Storage of Petroleum Products 11-16-1993 adoption	No - The source does not store affected petroleum products.
●		447	Organic Liquid Loading 04-02-1998 adoption	No - The source does not operate organic liquid loading equipment.
●		448	Gasoline Transfer into Stationary Storage Containers 02-26-2009 adoption	No - The source does not operate gasoline transfer equipment.
●		449	Transfer of Gasoline into Vehicle Fuel Tanks 02-26-2009 adoption	No - The source does not operate gasoline transfer equipment.
●		450	Graphic Arts Operations 10-24-2008 adoption	No - the source does not operate a graphic arts process as defined in the rule.
●	●	451	Surface Coating of Miscellaneous Metal Parts and Products 10-28-2010 version	Yes - No related conditions are included in the permit because of limited applicability.
●		452	Can Coating 09-25-2008 adoption	No - The source does not operate a can coating process.

SMAQMD RULES THAT ARE
 "APPLICABLE FEDERALLY ENFORCEABLE REQUIREMENTS"
 FOR RAGINGWIRE DATA CENTERS, INC.

Rule is Applicable	Rule is SIP Approved	Rule No.	Rule Title	Is the Rule an "Applicable Federally Enforceable Requirement"?
●		453	Cutback and Emulsified Asphalt Paving Materials 11-29-1983 adoption	No - The source does not manufacture or apply cutback or emulsified asphalt paving materials.
●		454	Degreasing Operations 09-25-2008 adoption	No - The source does not operate degreasers subject to this rule.
●		455	Pharmaceuticals Manufacturing 11-29-1983 adoption	No - The source does not manufacture pharmaceuticals.
●		456	Aerospace Coating Operations 10-23-2008 adoption	No - The source does not coat aerospace parts.
		457	Methanol Compatible Tanks	No - It is not a SIP approved rule.
●		458	Large Commercial Bread Bakeries 09-05-1996 adoption	No - The source does not produce bread products.
●		459	Automotive, Truck and Heavy Equipment Refinishing Operations 08-25-2011 adoption	No - The source does not refinish vehicles.
●		460	Adhesives and Sealants	No - It is not a SIP approved rule.

SMAQMD RULES THAT ARE
 "APPLICABLE FEDERALLY ENFORCEABLE REQUIREMENTS"
 FOR RAGINGWIRE DATA CENTERS, INC.

Rule is Applicable	Rule is SIP Approved	Rule No.	Rule Title	Is the Rule an "Applicable Federally Enforceable Requirement"?
●		463	Wood Products Coatings 09-25-2008 version	No - The source does not coat wood products.
●		464	Organic Chemical Manufacturing Operations 09-25-2008 adoption	No - The source does not manufacture organic chemicals.
●		465	Polyester Resin Operations 09-25-2008 version	No - The source does not have a polyester resin operation
●	●	466	Solvent Cleaning 10-28-2010 version	Yes - Related conditions are included in the permit.
		468	Surface Coating of Plastic Parts and Products	No - It is not a SIP approved rule.
		485	Municipal Landfill Gas	No - It is not a SIP approved rule.
		496	Large Confined Animal Facilities	No - It is not a SIP approved rule.
●		501	Agricultural Burning 12-06-1978 adoption	No - The source does not conduct agricultural burning.
●		601	Procedure before the Hearing Board	No - It is not a SIP approved rule.
●		602	Breakdown Conditions: Emergency Variance	No - It is not a SIP approved rule.

SMAQMD RULES THAT ARE
 "APPLICABLE FEDERALLY ENFORCEABLE REQUIREMENTS"
 FOR RAGINGWIRE DATA CENTERS, INC.

Rule is Applicable	Rule is SIP Approved	Rule No.	Rule Title	Is the Rule an "Applicable Federally Enforceable Requirement"?
	●	701	Emergency Episode Plan 05-27-1999 adoption	No - Facility emissions are below applicability level.
●		801	New Source Performance Standards	No - It is not a SIP approved rule. <i>Note: there are equivalent federal regulations.</i>
		901	General Requirements	No - It is not a SIP approved rule. <i>Note: there are equivalent federal regulations.</i>
		902	Asbestos	No - It is not a SIP approved rule. <i>Note: there is an equivalent federal regulation.</i>
		903	Mercury	No - It is not a SIP approved rule. <i>Note: there is an equivalent federal regulation.</i>
●		904	Airborne Toxic Control Measures	No - It is not a SIP approved rule. <i>Note: there are equivalent federal regulations for some of the listed ATCMs.</i>
		1002	Fleet Inventory	No - It is not a SIP approved rule.

SMAQMD RULES THAT ARE
"APPLICABLE FEDERALLY ENFORCEABLE REQUIREMENTS"
FOR RAGINGWIRE DATA CENTERS, INC.

Rule is Applicable	Rule is SIP Approved	Rule No.	Rule Title	Is the Rule an "Applicable Federally Enforceable Requirement"?
		1003	Reduced-Emission Fleet Vehicles/Alternative Fuels	No - It is not a SIP approved rule.
		1005	Mobile Source Emission Reduction Credits/Banking	No - It is not a SIP approved rule.
		1006	Transportation Conformity	No - It is not a SIP approved rule.

ATTACHMENT B

Calculation methodology for Combustion Contaminants.

Combustion Contaminants

Using standard factors such as the F-factor and brake specific fuel consumption and converting the emission factor for PM to grains/dscf is a matter of unit conversions. The calculation of the correction factor relies on the percent of stack CO₂. This can be calculated with a few assumptions. The carbon content in diesel fuel is 87.3 % by weight. Ninety-nine percent (99%) of the carbon is converted to CO₂. Using equations found in source testing protocol CARB METHOD 100 one can calculate PPM of CO₂. PPM can be converted to a volume % and inserted back into the equation to correct to 12% CO₂.

F-factor that is used is to be corrected to a % O₂ when used in this manner. However, the term is cancelled out, so there is no need to know the concentration of O₂ to correct this term.

Assumptions for Calculating Particulate Matter and SO₂ emissions

BSFC = 7,000 BTU / (HP-HR) or 0.007 MMBTU/(HP-HR)

87.3% = Wt % of Carbon in Diesel Fuel

99% = Conversion of Carbon in Fuel to CO₂

385.3 dscf/mol = molar volume at 68F & 1 ATM

0.0193 MMBTU/lbfuel = BTU content per pound of diesel fuel.

MW of Carbon = 12 lb/lbmol

MW of CO₂ = 44 lb/lbmol

F = F-factor value at 0% O₂ (DSCF/MMBTU)

EF = PM emission rate of the IC engine at g/hp-hr

Equations

From CARB Method 100

Equation 100-5

$$CO_{212\% CO_2} = CO_{2stack-CO_2\%} \times \left(\frac{12\%}{STACK - CO_2\%} \right)$$

Equation 100-4

(solving for PPM and specific to CO₂)

$$PPM-CO_2 = \text{Emission Rate} \left(\frac{lbs}{hr} \right) \times \left(\frac{385E6}{MWCO_2} \right) \times Q \times 60$$

385 is the Molar volume published in the CARB method 100, 385.3 was used for better accuracy.

Where

MWCO₂ = Molecular weight of CO₂ lb/lbmol

Q is flow rate.

Conversion of PPM to %

$$\text{STACK-CO}_2\% = \left(\frac{\text{PPM} - \text{CO}_2}{1E6} \right) \times 100\%$$

Calculation of gr/dscf from PM emission rate

$$\frac{gr}{dscf} @ 12\% \text{CO}_2 = \text{EF/BSFC/F-factor} * (\text{unit conversion}) * (12\% / \text{stack CO}_2\%)$$

or

$$\frac{gr}{dscf} @ 12\% \text{CO}_2 = (EF) * \left(\frac{15.4321gr}{g} \right) * \left(\frac{hp-hr}{0.007MMBTU} \right) * \left(\frac{1}{F} \right) * \left(\frac{12\% \text{CO}_2}{\% \text{CO}_2 \text{stack}} \right)$$

Step 1) – Calculate lb of CO2 per MMBTU

CO2 analysis based on 87.3% C in Diesel and 99% conversion to CO2 in the exhaust stack.

CO2 Stack emission (lb/MMBTU) =

(quantity of Carbon in 1 lb of fuel)*(BTU content in one pound of fuel)*(MW of Carbon)* (Conversion Rate of Carbon to CO2)*(MW of CO2)= (lbCO2/MMBTU) in the exhaust.

or

$$\left(\frac{0.873lbC}{1lbfuel} \right) * \left(\frac{1lbfuel}{0.0193MMBTU} \right) * \left(\frac{12lbC}{12lbC} \right) * \left(\frac{0.99lbmolCO_2}{1lbmolC} \right) * \left(\frac{44lbCO_2}{1lbmolCO_2} \right)$$

$$= 164.196 \text{ lbCO}_2/\text{MMBTU}$$

Step 2) Calculate PPM per MMBTU

From Equation 100-4 of CARB Method 1 and converting PPM to % Stack volume

$$\text{PPM-CO}_2 = \text{Emission Rate} \left(\frac{lbs}{hr} \right) \times \left(\frac{385E6}{MWCO_2} \right) \times Q \times 60$$

Or

$$\left(\frac{164.196lbco_2}{MMBTU} \right) * \left(\frac{1lbmol}{44lbco_2} \right) * \left(\frac{385.3dscf}{mol} \right) * \frac{1}{F} * (1E6)$$

$$\text{PPM-CO}_2 = 1437.8345\text{E}6 \frac{dscf}{mmbtu} \times F^{-1}$$

Step 3) Calculate Stack CO2% based on PPM

$$\begin{aligned} \text{CO}_2 \text{ stack \%} &= (1437.8345\text{E}6) \frac{dscf}{MMBTU} \times F^{-1} \times 1\text{E}6^{-1} \times 100\% \\ &= 143,783.45 \frac{dscf}{MMBTU} \% \times F^{-1} \end{aligned}$$

Step 4) Calculate Correction Concentration

$$\begin{aligned} \text{Concentration Correction} &= \frac{12\% \text{ CO}_2}{\% \text{ Stack CO}_2} \\ &= \frac{12\% \text{ CO}_2}{143,783.45\% \frac{dscf}{MMBTU}} \times F \\ &= 8.34902\text{E-}5 \left(\frac{MMBTU}{dscf} \right) \times F \end{aligned}$$

Step 5) Calculate uncorrected grains per DSCF

$$\begin{aligned} \text{Uncorrected grains per DSCF} &= \text{EF} \times \frac{15.4321\text{gr}}{g} \times \frac{hp - hr}{0.007\text{MMBTU}} \times F \\ &= \text{EF} \times F \times 2204.5857 \frac{gr * hp - hr}{g * dscf} \end{aligned}$$

Step 6) Calculate corrected grains per DSCF

$$\begin{aligned} \text{Corrected CO}_2 \text{ factor} &= \text{uncorrected grains per DSCF} * \text{Concentration Correction} \\ &= \text{EF} \times F^{-1} \times 2204 \frac{gr * hp - hr}{g * dscf} \times 8.34902 \text{E-}5 \times F \\ &= (\text{step 5}) \times (\text{step 6}) \\ &= \text{EF} \times 0.184012 \frac{gr * hp - hr}{g * dscf} \end{aligned}$$

Note the “F” term cancels out.

For an IC engine rated with a PM emission rate of 0.15 gr/hp-hr the calculation to convert to grains/dscf corrected to 12% CO2 would be:

$$0.15 \frac{g}{hp-hr} \times 0.184012 \frac{gr * hp-hr}{g * dscf} = 0.0276 \frac{gr}{dscf} \text{ corrected to 12\% CO2}$$

SO2 analysis

The concentration of sulfur in diesel fuel is regulated by CARB to be 15 PPM. An assumption can be made that all the sulfur in the fuel is converted to SO2.

%SO2 in the exhaust =

EF X MW of SO2 x Molar volume @ 68F and 1 ATM X (F-factor @ X% O2)⁻¹ X BSFC⁻¹ x 100%

$$= EF \times \frac{1lb}{453.6g} \times \frac{1lbmolSO2}{64lbSO2} \times \frac{385.3ft^3}{lbmol} \times \frac{MMBTU}{9190dscf} \times \left(\frac{20.9\%}{20.9\% - X\%}\right)^{-1} \times \frac{1hp-hr}{0.007MMBTU} \times 100\%$$

$$= EF \times 2.06E-2 \% \frac{hp-hr}{gr} \times \frac{20.9\% - X\%}{20.9\%}$$

The O2 correction factor is inverted

Example: Given emission of SOx of 0.005 g/hp-hr

$$0.005 \frac{g}{hp-hr} \times 2.06E-2 \% \frac{hp-hr}{gr} = 1.03E-4 \text{ SOX\%} \times \frac{20.9\% - X\%}{20.9\%} \text{ in the exhaust stream}$$

By not applying the correction factor for O2 the resultant number presented is the worst case. As O2 levels increases the % SOx decreases. Therefore, for compliance reasons the correction factor will be removed, and the number presented will be a worst case.

ATTACHMENT C
SMAQMD RULE 201 PERMITS TO OPERATE
FOR
RAGINGWIRE DATA CENTERS, INC.



AIR QUALITY
MANAGEMENT DISTRICT

PERMIT TO OPERATE

ISSUED TO: RAGING WIRE TELECOMMUNICATIONS

EQUIPMENT LOCATION: 1200 W STRIKER AVE, SACRAMENTO

PERMIT NO.: EQUIPMENT DESCRIPTION:

15495

IC ENGINE STANDBY, MAKE: CATERPILLAR, MODEL: 3516B, SERIAL
NO.: 6HN01216, 2876 BHP, DIESEL FIRED, DRIVING AN EMERGENCY
STANDBY GENERATOR

SUBJECT TO THE FOLLOWING CONDITIONS

GENERAL

1. THE EQUIPMENT SHALL BE PROPERLY MAINTAINED
2. THE AIR POLLUTION CONTROL OFFICER AND/OR AUTHORIZED REPRESENTATIVES, UPON THE PRESENTATION OF CREDENTIALS, SHALL BE PERMITTED:
 - A. TO ENTER UPON THE PREMISES WHERE THE SOURCE IS LOCATED OR IN WHICH ANY RECORDS ARE REQUIRED TO BE KEPT UNDER THE TERMS AND CONDITIONS OF THIS PERMIT TO OPERATE, AND
 - B. AT REASONABLE TIMES TO HAVE ACCESS TO AND COPY ANY RECORDS REQUIRED TO BE KEPT UNDER THE TERMS AND CONDITIONS OF THIS PERMIT TO OPERATE, AND
 - C. TO INSPECT ANY EQUIPMENT, OPERATION, OR METHOD REQUIRED IN THIS PERMIT TO OPERATE, AND
 - D. TO SAMPLE EMISSIONS FROM THE SOURCE OR REQUIRE SAMPLES TO BE TAKEN.
3. THIS PERMIT DOES NOT AUTHORIZE THE EMISSION OF AIR CONTAMINANTS IN EXCESS OF THOSE ALLOWED BY DIVISION 26, PART 4, CHAPTER 3, OF THE CALIFORNIA HEALTH AND SAFETY CODE OR THE RULES AND REGULATIONS OF THE AIR QUALITY MANAGEMENT DISTRICT.
4. A LEGIBLE COPY OF THIS PERMIT SHALL BE MAINTAINED ON THE PREMISES WITH THE EQUIPMENT.

EMISSION LIMITATIONS

5. THE IC ENGINE SHALL NOT DISCHARGE INTO THE ATMOSPHERE ANY VISIBLE AIR CONTAMINANTS OTHER THAN UNCOMBINED WATER VAPOR, FOR A PERIOD OR PERIODS AGGREGATING MORE THAN THREE MINUTES IN ANY ONE HOUR, WHICH IS AS DARK OR DARKER THAN RINGELMANN 1 OR EQUIVALENT TO OR GREATER THAN 20% OPACITY.

DATE ISSUED: 1/29/2001
DATE AMENDED: 12/31/05
EXPIRATION DATE: 1/23/2006 (UNLESS RENEWED)

LARRY GREENE
AIR POLLUTION CONTROL OFFICER

BY: Julie Lukarovsky

6. THE EMISSIONS FROM THE IC ENGINE SHALL NOT EXCEED THE FOLLOWING LIMITS:

POLLUTANT	EMISSION FACTOR (GRAMS/HP-HR)	BASIS FOR EMISSION FACTOR	MAXIMUM ALLOWABLE EMISSIONS (A)	
			POUNDS/QUARTER	POUNDS/YEAR
ROC	1	BACT	1,268	1,268
NOx	6.9	BACT	8,750	8,750
SOx	0.1645	0.05% SULFUR CONTENT	209	209
PM10	0.40	BACT	507	507
CO	8.5	BACT	10,779	10,779
HC+NOx	N/A	N/A	N/A	N/A

(A) EMISSIONS ARE BASED ON 2876 BHP, 200 HOURS/QUARTER AND 200 HOURS/YEAR OF OPERATION.

EQUIPMENT OPERATION

7. THE IC ENGINE SHALL OPERATE ONLY FOR THE FOLLOWING PURPOSES AND SHALL NOT OPERATE MORE THAN THE FOLLOWING HOURS:

TYPE OF OPERATIONAL HOURS	MAXIMUM ALLOWABLE OPERATION	
	HOURS/QUARTER	HOURS/YEAR
MAINTENANCE PURPOSES (A)	30	30
ALL OPERATION - MAINTENANCE (A) AND EMERGENCY (B)	200	200

(A) MAINTENANCE PURPOSES IS DEFINED AS: THE OPERATION OF AN IC ENGINE IN ORDER TO PRESERVE THE INTEGRITY OF THE IC ENGINE, ITS ASSOCIATED GENERATOR OR THE FACILITY'S ELECTRICAL DISTRIBUTION SYSTEM, OR WHEN REQUIRED BY THE SMAQMD TO VERIFY COMPLIANCE WITH THE APPLICABLE RULES AND REGULATIONS.

(B) EMERGENCY IS DEFINED AS: WHEN ELECTRICAL SERVICE FROM THE SERVING UTILITY IS INTERRUPTED BY AN UNFORESEEABLE EVENT.

8. THE IC ENGINE SHALL BE EQUIPPED WITH A NON-RESETTING HOUR METER, WITH A MINIMUM DISPLAY CAPABILITY OF 999 HOURS, TO ENSURE COMPLIANCE WITH CONDITION NUMBERS 6 AND 7.
9. UPON REQUEST OF THE AIR POLLUTION CONTROL OFFICER OR DESIGNEE, ONCE EACH YEAR, DURING DAYLIGHT HOURS, THE IC ENGINE SHALL BE RUN AT MAXIMUM ANTICIPATED LOAD, FROM A COLD START CONDITION, FOR OBSERVATION OF COMPLIANCE WITH OPACITY LIMITATIONS.
10. THE IC ENGINE SHALL BE FUELED WITH CARB DIESEL FUEL, OR AN ALTERNATIVE DIESEL FUEL THAT MEETS THE REQUIREMENTS OF THE VERIFICATION PROCEDURE (AS CODIFIED IN TITLE 13, CCR, SECTIONS 2700-2710), OR AN ALTERNATIVE FUEL, OR CARB DIESEL FUEL USED WITH FUEL ADDITIVES THAT MEETS THE REQUIREMENTS OF THE VERIFICATION PROCEDURE, OR ANY COMBINATION OF FUELS LISTED IN THIS CONDITION.

RECORD KEEPING

11. THE FOLLOWING RECORDS SHALL BE CONTINUOUSLY MAINTAINED ONSITE FOR THE MOST RECENT THREE YEAR PERIOD AND SHALL BE MADE AVAILABLE TO THE AIR POLLUTION CONTROL OFFICER UPON REQUEST. MONTHLY, QUARTERLY, AND YEARLY RECORDS SHALL BE MADE AVAILABLE WITHIN 30 DAYS OF END OF REPORTING PERIOD.

FREQUENCY	INFORMATION TO BE RECORDED
WHEN OPERATED	A. DATE. B. PURPOSE – EITHER MAINTENANCE (M) OR EMERGENCY POWER (E) C. NUMBER OF HOURS OF OPERATION.
MONTHLY	D. TOTAL NUMBER OF HOURS OF OPERATION FOR EACH OPERATING MODE (HOURS/MONTH).
QUARTERLY	E. TOTAL NUMBER OF HOURS OF OPERATION FOR EACH OPERATING MODE (HOURS/MONTH).
YEARLY	F. TOTAL NUMBER OF HOURS OF OPERATION FOR EACH OPERATING MODE (HOURS/YEAR).
ALL FUEL DELIVERIES	G. RETAIN FUEL PURCHASE RECORDS THAT ACCOUNT FOR ALL FUEL PURCHASED FOR USE IN THE ENGINE. FUEL PURCHASE RECORDS SHALL INCLUDE: 1. IDENTIFICATION OF TYPE OF FUEL (I.E. CARB DIESEL, ALTERNATE DIESEL, ETC.) 2. QUANTITY OF FUEL PURCHASED. 3. DATE OF FUEL PURCHASE. 4. SIGNATURE OF PERSON RECEIVING FUEL. 5. SIGNATURE OF FUEL PROVIDER INDICATING THAT FUEL WAS DELIVERED.

YOUR APPLICATION FOR THIS AIR QUALITY PERMIT TO OPERATE WAS EVALUATED FOR COMPLIANCE WITH SACRAMENTO METROPOLITAN AIR QUALITY MANAGEMENT DISTRICT (AQMD), STATE AND FEDERAL AIR QUALITY RULES. THE FOLLOWING LISTED RULES ARE THOSE THAT ARE MOST APPLICABLE TO THE OPERATION OF YOUR EQUIPMENT. OTHER RULES MAY ALSO BE APPLICABLE.

<u>AQMD RULE NUMBER</u>	<u>RULE TITLE</u>
201	GENERAL PERMIT REQUIREMENTS
202	NEW SOURCE REVIEW
401	RINGELMANN CHART
406	SPECIFIC CONTAMINANTS
420	SULFUR CONTENT OF FUELS
904	AIR TOXICS CONTROL MEASURES - STATIONARY COMPRESSION IGNITION ENGINES

IN ADDITION, THE CONDITIONS ON THIS PERMIT TO OPERATE MAY REFLECT SOME, BUT NOT ALL, REQUIREMENTS OF THESE RULES. THERE MAY BE OTHER CONDITIONS THAT ARE APPLICABLE TO THE OPERATION OF YOUR EQUIPMENT. FUTURE CHANGES IN PROHIBITORY RULES MAY ESTABLISH MORE STRINGENT REQUIREMENTS WHICH MAY SUPERSEDE THE CONDITIONS LISTED HERE. FOR FURTHER INFORMATION PLEASE CONSULT YOUR AQMD RULEBOOK OR CONTACT THE AQMD FOR ASSISTANCE.



PERMIT TO OPERATE

ISSUED TO: RAGING WIRE TELECOMMUNICATIONS

EQUIPMENT LOCATION: 1200 W STRIKER AVE, SACRAMENTO

PERMIT NO.: 15963 **EQUIPMENT DESCRIPTION:**

IC ENGINE STANDBY, MAKE: CATERPILLAR, MODEL: 3516B, SERIAL NO.: 6HN01330, 2876 BHP, DIESEL FIRED, DRIVING AN EMERGENCY STANDBY GENERATOR

SUBJECT TO THE FOLLOWING CONDITIONS

GENERAL

1. THE EQUIPMENT SHALL BE PROPERLY MAINTAINED
2. THE AIR POLLUTION CONTROL OFFICER AND/OR AUTHORIZED REPRESENTATIVES, UPON THE PRESENTATION OF CREDENTIALS, SHALL BE PERMITTED:
 - A. TO ENTER UPON THE PREMISES WHERE THE SOURCE IS LOCATED OR IN WHICH ANY RECORDS ARE REQUIRED TO BE KEPT UNDER THE TERMS AND CONDITIONS OF THIS PERMIT TO OPERATE, AND
 - B. AT REASONABLE TIMES TO HAVE ACCESS TO AND COPY ANY RECORDS REQUIRED TO BE KEPT UNDER THE TERMS AND CONDITIONS OF THIS PERMIT TO OPERATE, AND
 - C. TO INSPECT ANY EQUIPMENT, OPERATION, OR METHOD REQUIRED IN THIS PERMIT TO OPERATE, AND
 - D. TO SAMPLE EMISSIONS FROM THE SOURCE OR REQUIRE SAMPLES TO BE TAKEN.
3. THIS PERMIT DOES NOT AUTHORIZE THE EMISSION OF AIR CONTAMINANTS IN EXCESS OF THOSE ALLOWED BY DIVISION 26, PART 4, CHAPTER 3, OF THE CALIFORNIA HEALTH AND SAFETY CODE OR THE RULES AND REGULATIONS OF THE AIR QUALITY MANAGEMENT DISTRICT.
4. A LEGIBLE COPY OF THIS PERMIT SHALL BE MAINTAINED ON THE PREMISES WITH THE EQUIPMENT.

EMISSION LIMITATIONS

5. THE IC ENGINE SHALL NOT DISCHARGE INTO THE ATMOSPHERE ANY VISIBLE AIR CONTAMINANTS OTHER THAN UNCOMBINED WATER VAPOR, FOR A PERIOD OR PERIODS AGGREGATING MORE THAN THREE MINUTES IN ANY ONE HOUR, WHICH IS AS DARK OR DARKER THAN RINGELMANN 1 OR EQUIVALENT TO OR GREATER THAN 20% OPACITY.

DATE ISSUED: 12/3/2001
DATE AMENDED: 12/31/05
EXPIRATION DATE: 1/23/2006 (UNLESS RENEWED)

LARRY GREENE
 AIR POLLUTION CONTROL OFFICER

BY: Julie Lukashovskiy

6. THE EMISSIONS FROM THE IC ENGINE SHALL NOT EXCEED THE FOLLOWING LIMITS:

POLLUTANT	EMISSION FACTOR (GRAMS/HP-HR)	BASIS FOR EMISSION FACTOR	MAXIMUM ALLOWABLE EMISSIONS (A)	
			POUNDS/QUARTER	POUNDS/YEAR
ROC	1	BACT	1,268	1,268
NOx	6.9	BACT	8,750	8,750
SOx	0.16	0.05% SULFUR CONTENT	203	203
PM10	0.10	BACT	127	127
CO	8.5	BACT	10,779	10,779
HC+NOx	N/A	N/A	N/A	N/A

(A) EMISSIONS ARE BASED ON 2876 BHP, 200 HOURS/QUARTER AND 200 HOURS/YEAR OF OPERATION.

EQUIPMENT OPERATION

7. THE IC ENGINE SHALL OPERATE ONLY FOR THE FOLLOWING PURPOSES AND SHALL NOT OPERATE MORE THAN THE FOLLOWING HOURS:

TYPE OF OPERATIONAL HOURS	MAXIMUM ALLOWABLE OPERATION	
	HOURS/QUARTER	HOURS/YEAR
MAINTENANCE PURPOSES (A)	50	50
ALL OPERATION - MAINTENANCE (A) AND EMERGENCY (B)	200	200

- (A) MAINTENANCE PURPOSES IS DEFINED AS: THE OPERATION OF AN IC ENGINE IN ORDER TO PRESERVE THE INTEGRITY OF THE IC ENGINE, ITS ASSOCIATED GENERATOR OR THE FACILITY'S ELECTRICAL DISTRIBUTION SYSTEM, OR WHEN REQUIRED BY THE SMAQMD TO VERIFY COMPLIANCE WITH THE APPLICABLE RULES AND REGULATIONS.
- (B) EMERGENCY IS DEFINED AS: WHEN ELECTRICAL SERVICE FROM THE SERVING UTILITY IS INTERRUPTED BY AN UNFORESEEABLE EVENT.

8. THE IC ENGINE SHALL BE EQUIPPED WITH A NON-RESETTING HOUR METER, WITH A MINIMUM DISPLAY CAPABILITY OF 999 HOURS, TO ENSURE COMPLIANCE WITH CONDITION NUMBERS 6 AND 7.
9. UPON REQUEST OF THE AIR POLLUTION CONTROL OFFICER OR DESIGNEE, ONCE EACH YEAR, DURING DAYLIGHT HOURS, THE IC ENGINE SHALL BE RUN AT MAXIMUM ANTICIPATED LOAD, FROM A COLD START CONDITION, FOR OBSERVATION OF COMPLIANCE WITH OPACITY LIMITATIONS.
10. THE IC ENGINE SHALL BE FUELED WITH CARB DIESEL FUEL, OR AN ALTERNATIVE DIESEL FUEL THAT MEETS THE REQUIREMENTS OF THE VERIFICATION PROCEDURE (AS CODIFIED IN TITLE 13, CCR, SECTIONS 2700-2710), OR AN ALTERNATIVE FUEL, OR CARB DIESEL FUEL USED WITH FUEL ADDITIVES THAT MEETS THE REQUIREMENTS OF THE VERIFICATION PROCEDURE, OR ANY COMBINATION OF FUELS LISTED IN THIS CONDITION.

RECORD KEEPING

11. THE FOLLOWING RECORDS SHALL BE CONTINUOUSLY MAINTAINED ONSITE FOR THE MOST RECENT THREE YEAR PERIOD AND SHALL BE MADE AVAILABLE TO THE AIR POLLUTION CONTROL OFFICER UPON REQUEST. MONTHLY, QUARTERLY, AND YEARLY RECORDS SHALL BE MADE AVAILABLE WITHIN 30 DAYS OF END OF REPORTING PERIOD.

FREQUENCY	INFORMATION TO BE RECORDED
WHEN OPERATED	A. DATE. B. PURPOSE - EITHER MAINTENANCE (M) OR EMERGENCY POWER (E) C. NUMBER OF HOURS OF OPERATION.
MONTHLY	D. TOTAL NUMBER OF HOURS OF OPERATION FOR EACH OPERATING MODE (HOURS/MONTH).
QUARTERLY	E. TOTAL NUMBER OF HOURS OF OPERATION FOR EACH OPERATING MODE (HOURS/MONTH).
YEARLY	F. TOTAL NUMBER OF HOURS OF OPERATION FOR EACH OPERATING MODE (HOURS/YEAR).
ALL FUEL DELIVERIES	G. RETAIN FUEL PURCHASE RECORDS THAT ACCOUNT FOR ALL FUEL PURCHASED FOR USE IN THE ENGINE. FUEL PURCHASE RECORDS SHALL INCLUDE: 1. IDENTIFICATION OF TYPE OF FUEL (I.E. CARB DIESEL, ALTERNATE DIESEL, ETC.) 2. QUANTITY OF FUEL PURCHASED. 3. DATE OF FUEL PURCHASE. 4. SIGNATURE OF PERSON RECEIVING FUEL. 5. SIGNATURE OF FUEL PROVIDER INDICATING THAT FUEL WAS DELIVERED.

YOUR APPLICATION FOR THIS AIR QUALITY PERMIT TO OPERATE WAS EVALUATED FOR COMPLIANCE WITH SACRAMENTO METROPOLITAN AIR QUALITY MANAGEMENT DISTRICT (AQMD), STATE AND FEDERAL AIR QUALITY RULES. THE FOLLOWING LISTED RULES ARE THOSE THAT ARE MOST APPLICABLE TO THE OPERATION OF YOUR EQUIPMENT. OTHER RULES MAY ALSO BE APPLICABLE.

<u>AQMD RULE NUMBER</u>	<u>RULE TITLE</u>
201	GENERAL PERMIT REQUIREMENTS
202	NEW SOURCE REVIEW
401	RINGELMANN CHART
406	SPECIFIC CONTAMINANTS
420	SULFUR CONTENT OF FUELS
904	AIR TOXICS CONTROL MEASURES - STATIONARY COMPRESSION IGNITION ENGINES

IN ADDITION, THE CONDITIONS ON THIS PERMIT TO OPERATE MAY REFLECT SOME, BUT NOT ALL, REQUIREMENTS OF THESE RULES. THERE MAY BE OTHER CONDITIONS THAT ARE APPLICABLE TO THE OPERATION OF YOUR EQUIPMENT. FUTURE CHANGES IN PROHIBITORY RULES MAY ESTABLISH MORE STRINGENT REQUIREMENTS WHICH MAY SUPERSEDE THE CONDITIONS LISTED HERE. FOR FURTHER INFORMATION PLEASE CONSULT YOUR AQMD RULEBOOK OR CONTACT THE AQMD FOR ASSISTANCE.



AIR QUALITY
MANAGEMENT DISTRICT

PERMIT TO OPERATE

ISSUED TO: **RAGING WIRE TELECOM.**

EQUIPMENT LOCATION: **1200 STRIKER AVE, SACRAMENTO, CA, 95834**

PERMIT NO.	EQUIPMENT DESCRIPTION
19408	IC ENGINE STANDBY, MAKE: CUMMINS, MODEL: 2000DQKC, SERIAL NO: C040616638, 2922 BHP @ 1,800 RPM, 4210 CU. IN. DISPLACEMENT, DIESEL FUELED, DRIVING AN EMERGENCY STANDBY GENERATOR.

SUBJECT TO THE FOLLOWING CONDITIONS:

GENERAL

1. THE EQUIPMENT SHALL BE PROPERLY MAINTAINED.
2. THE AIR POLLUTION CONTROL OFFICER AND/OR AUTHORIZED REPRESENTATIVES, UPON THE PRESENTATION OF CREDENTIALS SHALL BE PERMITTED:
 - A. TO ENTER UPON THE PREMISES WHERE THE SOURCE IS LOCATED OR IN WHICH ANY RECORDS ARE REQUIRED TO BE KEPT UNDER THE TERMS AND CONDITIONS OF THIS PERMIT TO OPERATE, AND
 - B. AT REASONABLE TIMES TO HAVE ACCESS TO AND COPY ANY RECORDS REQUIRED TO BE KEPT UNDER TERMS AND CONDITIONS OF THIS PERMIT TO OPERATE, AND
 - C. TO INSPECT ANY EQUIPMENT, OPERATION, OR METHOD REQUIRED IN THIS PERMIT TO OPERATE, AND
 - D. TO SAMPLE EMISSIONS FROM THE SOURCE OR REQUIRE SAMPLES TO BE TAKEN.
3. THIS PERMIT DOES NOT AUTHORIZE THE EMISSION OF AIR CONTAMINANTS IN EXCESS OF THOSE ALLOWED BY DIVISION 26, PART 4, CHAPTER 3, OF THE CALIFORNIA HEALTH AND SAFETY CODE OR THE RULES AND REGULATIONS OF THE AIR QUALITY MANAGEMENT DISTRICT.
4. A LEGIBLE COPY OF THIS PERMIT SHALL BE MAINTAINED ON THE PREMISES WITH THE EQUIPMENT.
5. A PLAQUE SHALL BE PLACED ON THE ENGINE THAT STATES CONDITION 8 OF THE PERMIT, INCLUDING THE LANGUAGE, TABLE, AND FOOTNOTES. ADDITIONALLY THE FOLLOWING TEXT SHOULD BE WRITTEN ON THE PLAQUE "OPERATION OF THE ENGINE BEYOND THE TIME PERMITTED BY SMAQMD REFERENCED IN THIS TABLE WILL RESULT IN A VIOLATION OF THE PERMIT CONDITIONS." THIS PLAQUE MUST BE READILY VISIBLE TO ANY PERSON

DATE ISSUED: 07-20-2007
DATE EXPIRES: 01-23-2008 (UNLESS RENEWED)

LARRY GREENE
AIR POLLUTION CONTROL OFFICER

BY: 

PAGE 1 OF 7 PAGES

PERMIT NO.: 19408

REVOCABLE AND NON-TRANSFERABLE

SACRAMENTO METROPOLITAN AIR QUALITY MANAGEMENT DISTRICT

OPERATING THE ENGINE. THE PLAQUE SHALL BE INSTALLED IN A LOCATION SUCH THAT IT IS READABLE TO ANY PERSON ATTEMPTING TO MANUALLY OPERATE THE ENGINE.

EMISSIONS LIMITATIONS

6. THE IC ENGINE SHALL NOT DISCHARGE INTO THE ATMOSPHERE ANY VISIBLE AIR CONTAMINANTS OTHER THAN UNCOMBINED WATER VAPOR, FOR A PERIOD OR PERIODS AGGREGATING MORE THAN THREE MINUTES IN ANY ONE HOUR, WHICH ARE AS DARK OR DARKER THAN RINGELMANN NO. 1 OR EQUIVALENT TO OR GREATER THAN 20% OPACITY.
7. THE EMISSIONS FROM THE IC ENGINE SHALL NOT EXCEED THE FOLLOWING LIMITS:

POLLUTANT	EMISSION FACTOR (A) G/HP-HR	MAXIMUM ALLOWABLE EMISSIONS			
		LB/DAY MAINTENANCE OPERATION (1/4 LOAD) (E)	LB/DAY EMERGENCY OPERATION (FULL LOAD) (F)	LB/QTR (C)	LB/YEAR (D)
ROC	1	1.3	1.3	119	474
NOx	6.9	8.9	8.9	818	3,271
		MAINTENANCE PLUS EMERGENCY OPERATION CAN NOT EXCEED 9.9 LBS/DAY			
SOx	0.1645	0.003	0.003	0.4	0.9
PM10	0.149	0.2	0.2	18	71
CO	8.5	11	11	1,007	4,030

- (A) EMISSION FACTORS FOR ROC, NOx, AND CO EMISSION FACTOR ARE BASED ON TIER 1 STANDARDS. PM10 EMISSION FACTOR IS BASED ON T-BACT STANDARDS. SOx EMISSION FACTOR IS BASED UPON FUEL WITH 0.05% SULFUR BY WEIGHT.
- (B) NOT USED
- (C) MAXIMUM CALCULATED BY ASSUMING IN A GIVEN QUARTER THE MAXIMUM EMISSIONS OCCUR WHEN THE ENGINE IS RUN FOR EMERGENCY PURPOSES. 12 MIN/DAY 92 DAYS/QUARTER 2922 HP
- (D) MAXIMUM CALCULATED BY ASSUMING IN A GIVEN YEAR THE MAXIMUM EMISSIONS OCCUR WHEN THE ENGINE IS RUN FOR EMERGENCY PURPOSES 2922 HP 12 MIN/DAY 92 DAYS/QUARTER 4 QUARTERS/YEAR.
- (E) MAINTENANCE OPERATION LOAD EMISSIONS ARE BASED ON 731 HP 48 MIN/DAY
- (F) EMERGENCY OPERATION LOAD EMISSIONS ARE BASED ON 2922 HP 12 MIN/DAY

EQUIPMENT OPERATION

**SACRAMENTO METROPOLITAN
 AIR QUALITY MANAGEMENT DISTRICT**

8. THE IC ENGINE SHALL OPERATE ONLY FOR THE FOLLOWING PURPOSES AND SHALL NOT OPERATE MORE THAN THE FOLLOWING HOURS:

TYPE OF OPERATIONAL HOURS	MAXIMUM ALLOWABLE OPERATION		
	MIN./DAY	HOURS/QUARTER	HOURS/YEAR
MAINTENANCE PURPOSES (A)	48	50	50
ACTUAL INTERRUPTION OF POWER BY THE SERVING UTILITY	12	18.4	73.6
ALL OPERATION - MAINTENANCE, ACTUAL INTERRUPTION OF POWER BY THE SERVING UTILITY (B), AND SOURCE TESTING	SEE FOOTNOTE (C)	50	122

(A) MAINTENANCE PURPOSES IS DEFINED AS: THE OPERATION OF AN IC ENGINE IN ORDER TO PRESERVE THE INTEGRITY OF THE IC ENGINE AND ITS ASSOCIATED GENERATOR OR THE FACILITY'S ELECTRICAL DISTRIBUTION SYSTEM

(B) ACTUAL INTERRUPTION OF POWER IS DEFINED AS: WHEN ELECTRICAL SERVICE FROM THE SERVING UTILITY IS INTERRUPTED BY AN UNFORESEEABLE EVENT.

(C) THE ENGINE SHALL NOT EXCEED 9.9 LBS PER DAY OF EMISSIONS. THIS SHALL BE CALCULATED BY THE FOLLOWING FORMULA

$$(0.1853 * M) + (0.741 * E) < 9.9$$

M = MINUTES OF MAINTENANCE OPERATION

E = MINUTES OF EMERGENCY OPERATION

9. THE IC ENGINE SHALL BE EQUIPPED WITH A NON-RESETTING HOUR METER, WITH A MINIMUM DISPLAY CAPABILITY OF 9,999 HOURS, TO ENSURE COMPLIANCE WITH CONDITION NUMBERS 7 AND 8.
10. UPON REQUEST OF THE AIR POLLUTION CONTROL OFFICER OR DESIGNEE, ONCE EACH YEAR, DURING DAYLIGHT HOURS, THE IC ENGINE SHALL BE RUN AT MAXIMUM ANTICIPATED LOAD, FROM A COLD START CONDITION, FOR OBSERVATION OF COMPLIANCE WITH OPACITY LIMITATIONS.
11. THE IC ENGINE SHALL BE FUELED WITH CARB DIESEL FUEL, OR AN ALTERNATIVE DIESEL FUEL THAT MEETS THE REQUIREMENTS OF THE VERIFICATION PROCEDURE (AS CODIFIED IN TITLE 13, CCR, SECTIONS 2700-2710), OR AN ALTERNATIVE FUEL, OR CARB DIESEL FUEL USED WITH FUEL ADDITIVES THAT MEETS THE REQUIREMENTS OF THE VERIFICATION PROCEDURE, OR ANY COMBINATION OF FUELS LISTED IN THIS CONDITION.
12. THE ENGINE SHALL NOT BE OPERATED FOR MAINTENANCE PURPOSES UNDER LOADS GREATER THAN ¼ OF THE ENGINE OUTPUT (731 hp)
13. THE COMBINED EMISSIONS FROM OPERATIONS OF ALL ENGINES SHALL NOT EXCEED 24.4 TONS (48,800 LBS) PER YEAR OF NOX. THIS SHALL BE VERIFIED BY ATTACHMENT A. THE EMISSION STANDARD OF THE ENGINE SHALL BE TAKEN AT THE TIER STANDARD OF THE ENGINE.

**SACRAMENTO METROPOLITAN
 AIR QUALITY MANAGEMENT DISTRICT**

RECORD KEEPING

14. THE FOLLOWING RECORDS SHALL BE CONTINUOUSLY MAINTAINED ONSITE FOR THE MOST RECENT THREE YEAR PERIOD AND SHALL BE MADE AVAILABLE TO THE AIR POLLUTION CONTROL OFFICER UPON REQUEST. MONTHLY, QUARTERLY, AND YEARLY RECORDS SHALL BE MADE AVAILABLE WITHIN 30 DAYS OF END OF REPORTING PERIOD.

FREQUENCY	INFORMATION TO BE RECORDED
WHEN OPERATED	A. DATE. B. PURPOSE - EITHER MAINTENANCE (M), EMERGENCY POWER (E) LOADED, UNLOADED, ¼ LOAD. C. NUMBER OF MINUTES OF OPERATION. D. IF OPERATED FOR BOTH EMERGENCY AND MAINTENANCE ON THE SAME DAY, CALCULATION OF DAILY NOX EMISSION. GIVEN BY THE FORMULA BELOW $(0.1853 * M) + (0.741 * E)$ M = MINUTES OF MAINTENANCE OPERATION E = MINUTES OF EMERGENCY OPERATION
MONTHLY	E. TOTAL NUMBER OF HOURS OF OPERATION FOR EACH OPERATING MODE (HOURS/MONTH).
QUARTERLY	F. TOTAL NUMBER OF HOURS OF OPERATION FOR EACH OPERATING MODE (HOURS/QUARTER). G. ATTACHMENT A
YEARLY	G. TOTAL NUMBER OF HOURS OF OPERATION FOR EACH OPERATING MODE (HOURS/YEAR). H. ATTACHMENT B
ALL FUEL DELIVERIES	I. RETAIN FUEL PURCHASE RECORDS THAT ACCOUNT FOR ALL FUEL PURCHASED FOR USE IN THE ENGINE. FUEL PURCHASE RECORDS SHALL INCLUDE: 1. IDENTIFICATION OF TYPE OF FUEL (CARB DIESEL, ALTERNATE DIESEL, ETC.) 2. QUANTITY OF FUEL PURCHASED. 3. DATE OF FUEL PURCHASE. 4. SIGNATURE OF PERSON RECEIVING FUEL. 5. SIGNATURE OF FUEL PROVIDER INDICATING THAT FUEL WAS DELIVERED.

**SACRAMENTO METROPOLITAN
AIR QUALITY MANAGEMENT DISTRICT**

YOUR APPLICATION FOR THIS AIR QUALITY PERMIT TO OPERATE WAS EVALUATED FOR COMPLIANCE WITH SACRAMENTO AIR QUALITY MANAGEMENT DISTRICT (AQMD), STATE AND FEDERAL AIR QUALITY RULES. THE FOLLOWING LISTED RULES ARE THOSE THAT ARE MOST APPLICABLE TO THE OPERATION OF YOUR EQUIPMENT. OTHER RULES MAY ALSO BE APPLICABLE.

<u>AQMD RULE NO.</u>	<u>RULE TITLE</u>
201	GENERAL PERMIT REQUIREMENTS
202	NEW SOURCE REVIEW
301	PERMIT FEES
401	RINGELMANN CHART
402	NUISANCE
406	SPECIFIC CONTAMINANTS
420	SULFUR CONTENT OF FUELS
904	AIR TOXICS CONTROL MEASURES -- STATIONARY COMPRESSION IGNITION ENGINES

IN ADDITION, THE CONDITIONS ON THIS PERMIT TO OPERATE MAY REFLECT SOME, BUT NOT ALL, REQUIREMENTS OF THESE RULES. THERE MAY BE OTHER CONDITIONS THAT ARE APPLICABLE TO THE OPERATION OF YOUR EQUIPMENT. FUTURE CHANGES IN PROHIBITORY RULES MAY ESTABLISH MORE STRINGENT REQUIREMENTS WHICH MAY SUPERSEDE THE CONDITIONS LISTED HERE.

FOR FURTHER INFORMATION PLEASE CONSULT YOUR AQMD RULEBOOK OR CONTACT THE AQMD FOR ASSISTANCE.

SACRAMENTO METROPOLITAN
 AIR QUALITY MANAGEMENT DISTRICT

ATTACHMENT A RECORD KEEPING OF EMISSION CAPS

YEAR _____ QUARTER _____

PERMIT	HOURS OF MAINTENANCE & OPERATION IN THE QUARTER		TOTAL PERMIT LIMITATION HOURS PER QUARTER		
	MAINTENANCE HOURS	OPERATION HOURS	MAINTENANCE HOURS PER QTR	MAINTENANCE + OPERATION HOURS PER QTR	
P/O 15495 - 2876 HP			30	200	
P/O 15963 - 2876 HP			50	200	
P/O 19104 - 2876 HP			50	100	
A/C 19408* - 2922 HP			50	50	COMBINED MAINT. + OPER. NOT TO EXCEED 161 HOURS PER QTR
A/C 19409 - 2922 HP			50	160	
A/C 19410 - 2922 HP			50	160	
A/C 20279 - 2922 HP			50	161	COMBINED MAINT. + OPER. NOT TO EXCEED 161 HOURS PER QTR
A/C 20280 - 2922 HP			50	161	
A/C 20281 - 2922 HP			50	161	
A/C 20282 - 2922 HP			50	161	
A/C 20283 - 2922 HP			50	161	
A/C 20284 - 2922 HP			50	161	
A/C 20285 - 2922 HP			50	161	
A/C 20286 - 2922 HP			50	161	
A/C 20287 - 2922 HP			50	161	
A/C 20288 - 2922 HP			50	161	

* REFER TO P/O FOR OTHER OPERATING HOUR LIMITATIONS

SACRAMENTO METROPOLITAN
 AIR QUALITY MANAGEMENT DISTRICT

**ATTACHMENT B – VERIFICATION OF 24.4 TON PER YEAR FACILITY
 CAP.**

YEAR _____

PERMIT NO,	TOTAL HOURS PER YEAR OF MAINTENANCE & OPERATION A	EMISSION FACTOR B	TOTAL LBS A X B
P/O 15495 - 2876 HP		43.75 LBS / HR	
P/O 15963 - 2876 HP		43.75 LBS / HR	
P/O 19104 - 2876 HP		43.75 LBS / HR	
A/C 19408* - 2922 HP		44.45 LBS / HR	
A/C 19409 - 2922 HP		30.93 LBS / HR	
A/C 19410 - 2922 HP		30.93 LBS / HR	
A/C 20279 - 2922 HP		30.93 LBS / HR	
A/C 20280 - 2922 HP		30.93 LBS / HR	
A/C 20281 - 2922 HP		30.93 LBS / HR	
A/C 20282 - 2922 HP		30.93 LBS / HR	
A/C 20283 - 2922 HP		30.93 LBS / HR	
A/C 20284 - 2922 HP		30.93 LBS / HR	
A/C 20285 - 2922 HP		30.93 LBS / HR	
A/C 20286 - 2922 HP		30.93 LBS / HR	
A/C 20287 - 2922 HP		30.93 LBS / HR	
A/C 20288 - 2922 HP		30.93 LBS / HR	
TOTAL			
		TOTAL LBS NOT TO EXCEED 48,800 LBS	

* REFER TO P/O FOR OTHER OPERATING HOUR LIMITATIONS



AIR QUALITY
MANAGEMENT DISTRICT

PERMIT TO OPERATE

ISSUED TO: RAGING WIRE TELECOMMUNICATIONS INC.

EQUIPMENT LOCATION: 1200 STRIKER AVE, SACRAMENTO, CA, 95834

PERMIT NO.	EQUIPMENT DESCRIPTION
19104	IC ENGINE STANDBY, MAKE: CATERPILLAR, MODEL: 3516B, SERIAL NO: 6HN.1254, 2876 BHP @ 1,800 RPM, 4210 CU. IN. DISPLACEMENT, DIESEL FUELED, DRIVING AN EMERGENCY STANDBY GENERATOR.

SUBJECT TO THE FOLLOWING CONDITIONS:

GENERAL

1. THE EQUIPMENT SHALL BE PROPERLY MAINTAINED.
2. THE AIR POLLUTION CONTROL OFFICER AND/OR AUTHORIZED REPRESENTATIVES, UPON THE PRESENTATION OF CREDENTIALS SHALL BE PERMITTED:
 - A. TO ENTER UPON THE PREMISES WHERE THE SOURCE IS LOCATED OR IN WHICH ANY RECORDS ARE REQUIRED TO BE KEPT UNDER THE TERMS AND CONDITIONS OF THIS PERMIT TO OPERATE, AND
 - B. AT REASONABLE TIMES TO HAVE ACCESS TO AND COPY ANY RECORDS REQUIRED TO BE KEPT UNDER TERMS AND CONDITIONS OF THIS PERMIT TO OPERATE, AND
 - C. TO INSPECT ANY EQUIPMENT, OPERATION, OR METHOD REQUIRED IN THIS PERMIT TO OPERATE, AND
 - D. TO SAMPLE EMISSIONS FROM THE SOURCE OR REQUIRE SAMPLES TO BE TAKEN.
3. THIS PERMIT DOES NOT AUTHORIZE THE EMISSION OF AIR CONTAMINANTS IN EXCESS OF THOSE ALLOWED BY DIVISION 26, PART 4, CHAPTER 3, OF THE CALIFORNIA HEALTH AND SAFETY CODE OR THE RULES AND REGULATIONS OF THE AIR QUALITY MANAGEMENT DISTRICT.
4. A LEGIBLE COPY OF THIS PERMIT SHALL BE MAINTAINED ON THE PREMISES WITH THE EQUIPMENT.

EMISSIONS LIMITATIONS

5. THE IC ENGINE SHALL NOT DISCHARGE INTO THE ATMOSPHERE ANY VISIBLE AIR CONTAMINANTS OTHER THAN UNCOMBINED WATER VAPOR, FOR A PERIOD OR PERIODS AGGREGATING MORE THAN THREE MINUTES IN ANY

DATE ISSUED: 10-17-2007
DATE EXPIRES: 1-23-2008 (UNLESS RENEWED)

LARRY GREENE
AIR POLLUTION CONTROL OFFICER

BY: 

PAGE 1 OF 6 PAGES

PERMIT NO.: 19104

REVOCABLE AND NON-TRANSFERABLE

SACRAMENTO METROPOLITAN AIR QUALITY MANAGEMENT DISTRICT

ONE HOUR, WHICH ARE AS DARK OR DARKER THAN RINGELMANN NO. 1 OR EQUIVALENT TO OR GREATER THAN 20% OPACITY.

6. THE EMISSIONS FROM THE IC ENGINE RESPECTIVELY SHALL NOT EXCEED THE FOLLOWING LIMITS:

POLLUTANT	EMISSION FACTOR (A)		MAXIMUM ALLOWABLE EMISSIONS (B)	
	G/HP-HR		LB/QTR	LB/YEAR
ROC	1.0		634	1,268
NOx	6.9		4,375	8,750
NOx & ROC	8.9		4,375	8,750
SOx	0.16		101	203
PM10	0.149		94	189
CO	8.5		5,389	10,779

(A) EMISSION FACTORS FOR ROC, NOx, PM10, AND CO EMISSION FACTOR FROM SMAQMD IC ENGINE POLICY MANUAL (7/04) TAKEN AT BACT & T-BACT LIMITS. SOx EMISSION FACTOR IS BASED UPON FUEL WITH 0.05% SULFUR BY WEIGHT.

(B) EMISSIONS ARE BASED ON 2,876 BHP, 100 HR/QUARTER, 200 HR/YEAR OF OPERATION, AND THE EMISSION FACTORS IN THIS TABLE.

7. THE COMBINED EMISSIONS FROM OPERATIONS OF ALL ENGINES SHALL NOT EXCEED 24.4 TONS (48,800 LBS) PER YEAR OF NOx. THIS SHALL BE VERIFIED BY ATTACHMENT B. THE EMISSION STANDARD OF THE ENGINE SHALL BE TAKEN AT THE TIER STANDARD OF THE ENGINE.

EQUIPMENT OPERATION

8. THE IC ENGINE SHALL OPERATE ONLY FOR THE FOLLOWING PURPOSES AND SHALL NOT OPERATE MORE THAN THE FOLLOWING HOURS:

TYPE OF OPERATIONAL HOURS	MAXIMUM ALLOWABLE OPERATION	
	HOURS/QUARTER	HOURS/YEAR
MAINTENANCE PURPOSES (A)	50	50
ALL OPERATION - MAINTENANCE (A) AND EMERGENCY (B)	100	200

(A) MAINTENANCE PURPOSES IS DEFINED AS: THE OPERATION OF AN IC ENGINE IN ORDER TO PRESERVE THE INTEGRITY OF THE IC ENGINE, ITS ASSOCIATED GENERATOR OR THE FACILITY'S ELECTRICAL DISTRIBUTION SYSTEM, OR WHEN REQUIRED BY THE SMAQMD TO VERIFY COMPLIANCE WITH THE APPLICABLE RULES AND REGULATIONS.

(B) EMERGENCY IS DEFINED AS: WHEN ELECTRICAL SERVICE FROM THE SERVING UTILITY IS INTERRUPTED BY AN UNFORESEEABLE EVENT.

9. THE IC ENGINE SHALL BE EQUIPPED WITH A NON-RESETTING HOUR METER, WITH A MINIMUM DISPLAY CAPABILITY OF 9,999 HOURS.
10. UPON REQUEST OF THE AIR POLLUTION CONTROL OFFICER OR DESIGNEE, ONCE EACH YEAR, DURING DAYLIGHT HOURS, THE IC ENGINE SHALL BE RUN AT MAXIMUM ANTICIPATED LOAD, FROM A COLD START CONDITION, FOR OBSERVATION OF COMPLIANCE WITH OPACITY LIMITATIONS.

11. THE IC ENGINE SHALL BE FUELED WITH CARB DIESEL FUEL, OR AN ALTERNATIVE DIESEL FUEL THAT MEETS THE

SACRAMENTO METROPOLITAN AIR QUALITY MANAGEMENT DISTRICT

REQUIREMENTS OF THE VERIFICATION PROCEDURE (AS CODIFIED IN TITLE 13, CCR, SECTIONS 2700-2710), OR AN ALTERNATIVE FUEL, OR CARB DIESEL FUEL USED WITH FUEL ADDITIVES THAT MEETS THE REQUIREMENTS OF THE VERIFICATION PROCEDURE, OR ANY COMBINATION OF FUELS LISTED IN THIS CONDITION.

RECORD KEEPING

12. THE FOLLOWING RECORDS SHALL BE CONTINUOUSLY MAINTAINED ONSITE FOR THE MOST RECENT THREE YEAR PERIOD AND SHALL BE MADE AVAILABLE TO THE AIR POLLUTION CONTROL OFFICER UPON REQUEST. MONTHLY, QUARTERLY, AND YEARLY RECORDS SHALL BE MADE AVAILABLE WITHIN 30 DAYS OF END OF REPORTING PERIOD.

FREQUENCY	INFORMATION TO BE RECORDED
WHEN OPERATED	A. DATE. B. PURPOSE -- EITHER MAINTENANCE (M), EMERGENCY POWER (E). C. NUMBER OF HOURS OF OPERATION.
MONTHLY	D. TOTAL NUMBER OF HOURS OF OPERATION FOR EACH OPERATING MODE (HOURS/MONTH).
QUARTERLY	E. TOTAL NUMBER OF HOURS OF OPERATION FOR EACH OPERATING MODE (HOURS/QUARTER). F. ATTACHMENT A
YEARLY	G. TOTAL NUMBER OF HOURS OF OPERATION FOR EACH OPERATING MODE (HOURS/YEAR). H. ATTACHMENT B
ALL FUEL DELIVERIES	I. RETAIN FUEL PURCHASE RECORDS THAT ACCOUNT FOR ALL FUEL PURCHASED FOR USE IN THE ENGINE. FUEL PURCHASE RECORDS SHALL INCLUDE: 1. IDENTIFICATION OF TYPE OF FUEL (CARB DIESEL, ALTERNATE DIESEL, ETC.) 2. QUANTITY OF FUEL PURCHASED. 3. DATE OF FUEL PURCHASE. 4. SIGNATURE OF PERSON RECEIVING FUEL. 5. SIGNATURE OF FUEL PROVIDER INDICATING THAT FUEL WAS DELIVERED.

**SACRAMENTO METROPOLITAN
AIR QUALITY MANAGEMENT DISTRICT**

YOUR APPLICATION FOR THIS AIR QUALITY PERMIT TO OPERATE WAS EVALUATED FOR COMPLIANCE WITH SACRAMENTO AIR QUALITY MANAGEMENT DISTRICT (AQMD), STATE AND FEDERAL AIR QUALITY RULES. THE FOLLOWING LISTED RULES ARE THOSE THAT ARE MOST APPLICABLE TO THE OPERATION OF YOUR EQUIPMENT. OTHER RULES MAY ALSO BE APPLICABLE.

<u>AQMD RULE NO.</u>	<u>RULE TITLE</u>
201	GENERAL PERMIT REQUIREMENTS
202	NEW SOURCE REVIEW
301	PERMIT FEES
401	RINGELMANN CHART
402	NUISANCE
406	SPECIFIC CONTAMINANTS
420	SULFUR CONTENT OF FUELS
904	AIR TOXICS CONTROL MEASURES -- STATIONARY COMPRESSION IGNITION ENGINES

IN ADDITION, THE CONDITIONS ON THIS PERMIT TO OPERATE MAY REFLECT SOME, BUT NOT ALL, REQUIREMENTS OF THESE RULES. THERE MAY BE OTHER CONDITIONS THAT ARE APPLICABLE TO THE OPERATION OF YOUR EQUIPMENT. FUTURE CHANGES IN PROHIBITORY RULES MAY ESTABLISH MORE STRINGENT REQUIREMENTS WHICH MAY SUPERSEDE THE CONDITIONS LISTED HERE.

FOR FURTHER INFORMATION PLEASE CONSULT YOUR AQMD RULEBOOK OR CONTACT THE AQMD FOR ASSISTANCE.

SACRAMENTO METROPOLITAN
 AIR QUALITY MANAGEMENT DISTRICT

ATTACHMENT A RECORD KEEPING OF EMISSION CAPS

YEAR _____ QUARTER _____

PERMIT	HOURS OF MAINTENANCE & OPERATION IN THE QUARTER		TOTAL PERMIT LIMITATION HOURS PER QUARTER	
	MAINTENANCE HOURS	OPERATION HOURS	MAINTENANCE HOURS PER QTR	MAINTENANCE + OPERATION HOURS PER QTR
P/O 15495 - 2876 HP			30	200
P/O 15963 - 2876 HP			50	200
P/O 19104 - 2876 HP			50	100
P/O 19408* - 2922 HP			50	50
P/O 19409 - 2922 HP			50	160
P/O 19410 - 2922 HP			50	160
A/C 20279 - 2922 HP			50	161
A/C 20280 - 2922 HP			50	161
A/C 20281 - 2922 HP			50	161
A/C 20282 - 2922 HP			50	161
A/C 20283 - 2922 HP			50	161
A/C 20284 - 2922 HP			50	161
A/C 20285 - 2922 HP			50	161
A/C 20286 - 2922 HP			50	161
A/C 20287 - 2922 HP			50	161
A/C 20288 - 2922 HP			50	161

COMBINED MAINT. +
 OPER. NOT TO EXCEED
 161 HOURS PER QTR

COMBINED MAINT. + OPER. NOT TO
 EXCEED 161 HOURS PER QTR

* REFER TO P/O FOR OTHER OPERATING HOUR LIMITATIONS

SACRAMENTO METROPOLITAN
 AIR QUALITY MANAGEMENT DISTRICT

**ATTACHMENT B – VERIFICATION OF 24.4 TON PER YEAR FACILITY
 CAP.**

YEAR _____

PERMIT NO.	TOTAL HOURS PER YEAR OF MAINTENANCE & OPERATION A	EMISSION FACTOR	TOTAL LBS
		B	A X B
P/O 15495 - 2876 HP		43.75 LBS / HR	
P/O 15963 - 2876 HP		43.75 LBS / HR	
P/O 19104 - 2876 HP		43.75 LBS / HR	
P/O 19408* - 2922 HP		44.45 LBS / HR	
P/O 19409 - 2922 HP		30.93 LBS / HR	
P/O 19410 - 2922 HP		30.93 LBS / HR	
A/C 20279 - 2922 HP		30.93 LBS / HR	
A/C 20280 - 2922 HP		30.93 LBS / HR	
A/C 20281 - 2922 HP		30.93 LBS / HR	
A/C 20282 - 2922 HP		30.93 LBS / HR	
A/C 20283 - 2922 HP		30.93 LBS / HR	
A/C 20284 - 2922 HP		30.93 LBS / HR	
A/C 20285 - 2922 HP		30.93 LBS / HR	
A/C 20286 - 2922 HP		30.93 LBS / HR	
A/C 20287 - 2922 HP		30.93 LBS / HR	
A/C 20288 - 2922 HP		30.93 LBS / HR	

TOTAL

**TOTAL LBS NOT TO EXCEED
 48,800 LBS**

* REFER TO P/O FOR OTHER OPERATING HOUR LIMITATIONS



AIR QUALITY
MANAGEMENT DISTRICT

PERMIT TO OPERATE

ISSUED TO: RAGING WIRE TELECOMMUNICATIONS INC.

EQUIPMENT LOCATION: 1200 STRIKER AVE, SACRAMENTO, CA, 95834

PERMIT NO.	EQUIPMENT DESCRIPTION
19409	IC ENGINE STANDBY, MAKE: CUMMINS, MODEL: XQSK60-G6 NONROAD1, SERIAL NO: 33163718, 2922 BHP @ 1,800 RPM, 3673 CU. IN. DISPLACEMENT, DIESEL FUELED, DRIVING AN EMERGENCY STANDBY GENERATOR.
19410	IC ENGINE STANDBY, MAKE: CUMMINS, MODEL: XQSK60-G6 NONROAD1, SERIAL NO: 33163622, 2922 BHP @ 1,800 RPM, 3673 CU. IN. DISPLACEMENT, DIESEL FUELED, DRIVING AN EMERGENCY STANDBY GENERATOR.
19585	SCR UNIT FOR P/O 19409
19586	SCR UNIT FOR P/O 19410

SUBJECT TO THE FOLLOWING CONDITIONS:

GENERAL

1. THE EQUIPMENT SHALL BE PROPERLY MAINTAINED.
2. THE AIR POLLUTION CONTROL OFFICER AND/OR AUTHORIZED REPRESENTATIVES, UPON THE PRESENTATION OF CREDENTIALS SHALL BE PERMITTED:
 - A. TO ENTER UPON THE PREMISES WHERE THE SOURCE IS LOCATED OR IN WHICH ANY RECORDS ARE REQUIRED TO BE KEPT UNDER THE TERMS AND CONDITIONS OF THIS PERMIT TO OPERATE, AND
 - B. AT REASONABLE TIMES TO HAVE ACCESS TO AND COPY ANY RECORDS REQUIRED TO BE KEPT UNDER TERMS AND CONDITIONS OF THIS PERMIT TO OPERATE, AND

LARRY GREENE

AIR POLLUTION CONTROL OFFICER

DATE ISSUED: 10-17-2007

DATE EXPIRES: 1-23-2008 (UNLESS RENEWED)

BY: 

PERMIT NO.: 19409, 19410, 19585, 19586

PAGE 1 OF 7 PAGES

REVOCABLE AND NON-TRANSFERABLE

SACRAMENTO METROPOLITAN AIR QUALITY MANAGEMENT DISTRICT

- C. TO INSPECT ANY EQUIPMENT, OPERATION, OR METHOD REQUIRED IN THIS PERMIT TO OPERATE, AND
D. TO SAMPLE EMISSIONS FROM THE SOURCE OR REQUIRE SAMPLES TO BE TAKEN.
3. THIS PERMIT DOES NOT AUTHORIZE THE EMISSION OF AIR CONTAMINANTS IN EXCESS OF THOSE ALLOWED BY DIVISION 26, PART 4, CHAPTER 3, OF THE CALIFORNIA HEALTH AND SAFETY CODE OR THE RULES AND REGULATIONS OF THE AIR QUALITY MANAGEMENT DISTRICT.
4. A LEGIBLE COPY OF THIS PERMIT SHALL BE MAINTAINED ON THE PREMISES WITH THE EQUIPMENT.

EMISSIONS LIMITATIONS

5. THE IC ENGINES RESPECTIVELY SHALL NOT DISCHARGE INTO THE ATMOSPHERE ANY VISIBLE AIR CONTAMINANTS OTHER THAN UNCOMBINED WATER VAPOR, FOR A PERIOD OR PERIODS AGGREGATING MORE THAN THREE MINUTES IN ANY ONE HOUR, WHICH ARE AS DARK OR DARKER THAN RINGELMANN NO. 1 OR EQUIVALENT TO OR GREATER THAN 20% OPACITY.
6. THE EMISSIONS FROM EACH IC ENGINE RESPECTIVELY SHALL NOT EXCEED THE FOLLOWING LIMITS:

POLLUTANT	EMISSION FACTOR (A)		MAXIMUM ALLOWABLE EMISSIONS (B)	
	G/HP-HR	LB/QTR	LB/QUARTER	LB/YEAR
ROC	1.0	1,031		1,288
NOx	4.8	4,947		6,184
NOx & ROC	4.8	4,947		6,184
SOx	0.16	170		212
PM10	0.15	155		193
CO	2.6	2,680		3,349

(A) EMISSION FACTORS FOR ROC, NOx, PM10, AND CO EMISSION FACTOR FROM SMAQMD IC ENGINE POLICY MANUAL (7/04) TAKEN AT BACT & T-BACT LIMITS. SOx EMISSION FACTOR IS BASED UPON FUEL WITH 0.05% SULFUR BY WEIGHT.

(B) EMISSIONS ARE BASED ON 2,922 BHP, 160 HR/QUARTER, 200 HR/YEAR OF OPERATION, AND THE EMISSION FACTORS IN THIS TABLE.

7. THE COMBINED OPERATION OF ENGINES PERMITTED UNDER 19408, 19409 & 19410 SHALL NOT EXCEED A COMBINED EMISSION OF 5,000 LBS OF NOX PER QUARTER. THIS SHALL BE MEASURED BY USING THE TIER II EMISSION STANDARD MULTIPLIED BY THE NUMBER OF HOURS OF OPERATION AT FULL LOAD.
8. THE COMBINED EMISSIONS FROM OPERATIONS OF ALL ENGINES SHALL NOT EXCEED 24.4 TONS (48,800 LBS) PER YEAR OF NOX. THIS SHALL BE VERIFIED BY ATTACHMENT A. THE EMISSION STANDARD OF THE ENGINE SHALL BE TAKEN AT THE TIER STANDARD OF THE ENGINE.

EQUIPMENT OPERATION

9. THE SCR UNITS SHALL BE OPERATIONAL AT ALL TIMES WHEN THE ENGINES ARE IN OPERATION.
10. A MINIMUM OF 10 GALLONS OF UREA SHALL BE STORED FOR EACH SCR UNIT AT ALL TIMES
11. EACH ENGINE SHALL BE OPERATED AT A MINIMUM OF 10% LOAD. THE ENGINES SHALL NOT BE OPERATED AT LESS THAN 10% LOAD

**SACRAMENTO METROPOLITAN
AIR QUALITY MANAGEMENT DISTRICT**

12. THE IC ENGINES RESPECTIVELY SHALL OPERATE ONLY FOR THE FOLLOWING PURPOSES AND SHALL NOT OPERATE MORE THAN THE FOLLOWING HOURS:

TYPE OF OPERATIONAL HOURS	MAXIMUM ALLOWABLE OPERATION	
	HOURS/QUARTER	HOURS/YEAR
MAINTENANCE PURPOSES (A)	50	50
ALL OPERATION - MAINTENANCE (A) AND EMERGENCY (B)	180	200

(A) MAINTENANCE PURPOSES IS DEFINED AS: THE OPERATION OF AN IC ENGINE IN ORDER TO PRESERVE THE INTEGRITY OF THE IC ENGINE, ITS ASSOCIATED GENERATOR OR THE FACILITY'S ELECTRICAL DISTRIBUTION SYSTEM, OR WHEN REQUIRED BY THE SMAQMD TO VERIFY COMPLIANCE WITH THE APPLICABLE RULES AND REGULATIONS.

(B) EMERGENCY IS DEFINED AS: WHEN ELECTRICAL SERVICE FROM THE SERVING UTILITY IS INTERRUPTED BY AN UNFORESEEABLE EVENT.

13. THE IC ENGINES SHALL BE EQUIPPED WITH A NON-RESETTING HOUR METER, WITH A MINIMUM DISPLAY CAPABILITY OF 9,999 HOURS, TO ENSURE COMPLIANCE WITH CONDITION NUMBERS 6 AND 12.
14. UPON REQUEST OF THE AIR POLLUTION CONTROL OFFICER OR DESIGNEE, ONCE EACH YEAR, DURING DAYLIGHT HOURS, THE IC ENGINES SHALL BE RUN AT MAXIMUM ANTICIPATED LOAD, FROM A COLD START CONDITION, FOR OBSERVATION OF COMPLIANCE WITH OPACITY LIMITATIONS.
15. THE IC ENGINES SHALL BE FUELED WITH CARB DIESEL FUEL, OR AN ALTERNATIVE DIESEL FUEL THAT MEETS THE REQUIREMENTS OF THE VERIFICATION PROCEDURE (AS CODIFIED IN TITLE 13, CCR, SECTIONS 2700-2710), OR AN ALTERNATIVE FUEL, OR CARB DIESEL FUEL USED WITH FUEL ADDITIVES THAT MEETS THE REQUIREMENTS OF THE VERIFICATION PROCEDURE, OR ANY COMBINATION OF FUELS LISTED IN THIS CONDITION.

TESTING REQUIREMENTS

16. A NOX, AND ROC SOURCE TEST SHALL BE CONDUCTED EVERY FIVE YEARS STARTING 2012 TO ENSURE COMPLIANCE WITH THE EMISSION LIMIT OF CONDITION 6. THE SOURCE TEST SHALL BE CONDUCTED UNDER THE FOLLOWING CONDITIONS:
- A. A SOURCE TEST PLAN SHALL BE SUBMITTED FOR WRITTEN APPROVAL AT LEAST 30 DAYS PRIOR TO THE SOURCE TEST DATE.
 - I. INCLUDE A DETAILED DESCRIPTION AND DIAGRAM OF SAMPLING EQUIPMENT.
 - II. ALL PORTS SHALL BE LOCATED AND CONSTRUCTED AS PER APPLICABLE EPA OR CARB REQUIREMENTS. PLEASE SPECIFY THAT THE FLOW MEASUREMENT AND SAMPLING PORT LOCATIONS WILL BE AT LEAST 8 PIPE DIAMETERS DOWNSTREAM AND 2 PIPE DIAMETERS UPSTREAM FROM ANY FLOW DISTURBANCE SUCH AS A BEND OR T. INLET SAMPLES AND FLOW RATE LOCATIONS SHALL BE TAKEN DOWN STREAM OF ALL INLET FLOWS SUCH AS DILUTION AIR INLETS.
 - B. THE DISTRICT SHALL BE NOTIFIED OF THE DATE AND TIME OF THE SOURCE TEST AT LEAST SEVEN DAYS PRIOR TO THE SOURCE TEST DATE.
 - C. THE IC ENGINE SHALL BE OPERATED AS CLOSE AS PHYSICALLY POSSIBLE TO ITS RATED POWER OUTPUT DURING THE SOURCE TEST. A RESISTIVE LOAD BANK SHALL BE USED TO MEET THE LOAD REQUIREMENT. OTHER LOADING REQUIREMENTS MAY APPLY.
 - D. A WRITTEN SOURCE TEST REPORT SHALL BE SUBMITTED WITHIN 60 DAYS OF THE TEST DATE.

**SACRAMENTO METROPOLITAN
AIR QUALITY MANAGEMENT DISTRICT**

RECORD KEEPING

17. THE FOLLOWING RECORDS SHALL BE CONTINUOUSLY MAINTAINED ONSITE FOR THE MOST RECENT THREE YEAR PERIOD AND SHALL BE MADE AVAILABLE TO THE AIR POLLUTION CONTROL OFFICER UPON REQUEST. MONTHLY, QUARTERLY, AND YEARLY RECORDS SHALL BE MADE AVAILABLE WITHIN 30 DAYS OF END OF REPORTING PERIOD.

FREQUENCY	INFORMATION TO BE RECORDED
WHEN OPERATED	A. DATE. B. PURPOSE -- EITHER MAINTENANCE (M), EMERGENCY POWER (E). C. NUMBER OF HOURS OF OPERATION. D. LOAD ON THE ENGINE TAKEN AT 10 MIN INTERVALS
MONTHLY	E. TOTAL NUMBER OF HOURS OF OPERATION FOR EACH OPERATING MODE (HOURS/MONTH).
QUARTERLY	F. TOTAL NUMBER OF HOURS OF OPERATION FOR EACH OPERATING MODE (HOURS/QUARTER). G. ATTACHMENT A
YEARLY	H. TOTAL NUMBER OF HOURS OF OPERATION FOR EACH OPERATING MODE (HOURS/YEAR). I. ATTACHMENT B
ALL FUEL DELIVERIES	J. RETAIN FUEL PURCHASE RECORDS THAT ACCOUNT FOR ALL FUEL PURCHASED FOR USE IN THE ENGINE. FUEL PURCHASE RECORDS SHALL INCLUDE: 1. IDENTIFICATION OF TYPE OF FUEL (CARB DIESEL, ALTERNATE DIESEL, ETC.) 2. QUANTITY OF FUEL PURCHASED. 3. DATE OF FUEL PURCHASE. 4. SIGNATURE OF PERSON RECEIVING FUEL. 5. SIGNATURE OF FUEL PROVIDER INDICATING THAT FUEL WAS DELIVERED.

**SACRAMENTO METROPOLITAN
AIR QUALITY MANAGEMENT DISTRICT**

YOUR APPLICATION FOR THIS AIR QUALITY PERMIT TO OPERATE WAS EVALUATED FOR COMPLIANCE WITH SACRAMENTO AIR QUALITY MANAGEMENT DISTRICT (AQMD), STATE AND FEDERAL AIR QUALITY RULES. THE FOLLOWING LISTED RULES ARE THOSE THAT ARE MOST APPLICABLE TO THE OPERATION OF YOUR EQUIPMENT. OTHER RULES MAY ALSO BE APPLICABLE.

<u>AQMD RULE NO.</u>	<u>RULE TITLE</u>
201	GENERAL PERMIT REQUIREMENTS
202	NEW SOURCE REVIEW
301	PERMIT FEES
401	RINGELMANN CHART
402	NUISANCE
406	SPECIFIC CONTAMINANTS
420	SULFUR CONTENT OF FUELS
904	AIR TOXICS CONTROL MEASURES - - STATIONARY COMPRESSION IGNITION ENGINES

IN ADDITION, THE CONDITIONS ON THIS PERMIT TO OPERATE MAY REFLECT SOME, BUT NOT ALL, REQUIREMENTS OF THESE RULES. THERE MAY BE OTHER CONDITIONS THAT ARE APPLICABLE TO THE OPERATION OF YOUR EQUIPMENT. FUTURE CHANGES IN PROHIBITORY RULES MAY ESTABLISH MORE STRINGENT REQUIREMENTS WHICH MAY SUPERSEDE THE CONDITIONS LISTED HERE.

FOR FURTHER INFORMATION PLEASE CONSULT YOUR AQMD RULEBOOK OR CONTACT THE AQMD FOR ASSISTANCE.

SACRAMENTO METROPOLITAN
 AIR QUALITY MANAGEMENT DISTRICT

ATTACHMENT A RECORD KEEPING OF EMISSION CAPS

YEAR _____ QUARTER _____

PERMIT	HOURS OF MAINTENANCE & OPERATION IN THE QUARTER		TOTAL PERMIT LIMITATION HOURS PER QUARTER	
	MAINTENANCE HOURS	OPERATION HOURS	MAINTENANCE HOURS PER QTR	MAINTENANCE + OPERATION HOURS PER QTR
P/O 15495 - 2876 HP			30	200
P/O 15963 - 2876 HP			50	200
P/O 19104 - 2876 HP			50	100
P/O 19408* - 2922 HP			50	50
P/O 19409 - 2922 HP			50	160
P/O 19410 - 2922 HP			50	160
A/C 20279 - 2922 HP			50	161
A/C 20280 - 2922 HP			50	161
A/C 20281 - 2922 HP			50	161
A/C 20282 - 2922 HP			50	161
A/C 20283 - 2922 HP			50	161
A/C 20284 - 2922 HP			50	161
A/C 20285 - 2922 HP			50	161
A/C 20286 - 2922 HP			50	161
A/C 20287 - 2922 HP			50	161
A/C 20288 - 2922 HP			50	161

COMBINED MAINT. + OPER. NOT TO EXCEED 160 HOURS PER QTR

COMBINED MAINT. + OPER. NOT TO EXCEED 161 HOURS PER QTR

* REFER TO P/O FOR OTHER OPERATING HOUR LIMITATIONS

SACRAMENTO METROPOLITAN
 AIR QUALITY MANAGEMENT DISTRICT

**ATTACHMENT B - VERIFICATION OF 24.4 TON PER YEAR FACILITY
 CAP.**

YEAR _____

PERMIT NO.	TOTAL HOURS PER YEAR OF MAINTENANCE & OPERATION A	EMISSION FACTOR B	TOTAL LBS A X B
P/O 15495 - 2876 HP		43.75 LBS / HR	
P/O 15963 - 2876 HP		43.75 LBS / HR	
P/O 19104 - 2876 HP		43.75 LBS / HR	
P/O 19408* - 2922 HP		44.45 LBS / HR	
P/O 19409 - 2922 HP		30.93 LBS / HR	
P/O 19410 - 2922 HP		30.93 LBS / HR	
A/C 20279 - 2922 HP		30.93 LBS / HR	
A/C 20280 - 2922 HP		30.93 LBS / HR	
A/C 20281 - 2922 HP		30.93 LBS / HR	
A/C 20282 - 2922 HP		30.93 LBS / HR	
A/C 20283 - 2922 HP		30.93 LBS / HR	
A/C 20284 - 2922 HP		30.93 LBS / HR	
A/C 20285 - 2922 HP		30.93 LBS / HR	
A/C 20286 - 2922 HP		30.93 LBS / HR	
A/C 20287 - 2922 HP		30.93 LBS / HR	
A/C 20288 - 2922 HP		30.93 LBS / HR	
TOTAL			
			TOTAL LBS NOT TO EXCEED 48,800 LBS

* REFER TO P/O FOR OTHER OPERATING HOUR LIMITATIONS



PERMIT TO OPERATE

ISSUED TO: **RAGING WIRE**

EQUIPMENT LOCATION: **1200 STRIKER AVE., SACRAMENTO, 95834**

PERMIT NO.	EQUIPMENT DESCRIPTION
20279	IC ENGINE STANDBY, MAKE: CUMMINS, MODEL: QSKTA60-GENONROAD1, SERIAL NO: 33167241, 2922 BHP @ 1,800 RPM, 3,673 CU. IN. DISPLACEMENT, DIESEL FUELED, DRIVING AN EMERGENCY STANDBY GENERATOR. FACILITY ID: GEN 1U
20280	IC ENGINE STANDBY, MAKE: CUMMINS, MODEL: QSKTA60-GENONROAD1, SERIAL NO: 33167380, 2922 BHP @ 1,800 RPM, 3,673 CU. IN. DISPLACEMENT, DIESEL FUELED, DRIVING AN EMERGENCY STANDBY GENERATOR. FACILITY ID: GEN 2U
20282	IC ENGINE STANDBY, MAKE: CUMMINS, MODEL: QSKTA60-GENONROAD1, SERIAL NO: 75779-93, 2922 BHP @ 1,800 RPM, 3,673 CU. IN. DISPLACEMENT, DIESEL FUELED, DRIVING AN EMERGENCY STANDBY GENERATOR. FACILITY ID: GEN 1M
20283	IC ENGINE STANDBY, MAKE: CUMMINS, MODEL: QSKTA60-GENONROAD1, SERIAL NO: 75779-94, 2922 BHP @ 1,800 RPM, 3,673 CU. IN. DISPLACEMENT, DIESEL FUELED, DRIVING AN EMERGENCY STANDBY GENERATOR. FACILITY ID: GEN 2M
20284	IC ENGINE STANDBY, MAKE: CUMMINS, MODEL: QSKTA60-GE, SERIAL NO: 33176023, 2922 BHP @ 1,800 RPM, 3,673 CU. IN. DISPLACEMENT, DIESEL FUELED, DRIVING AN EMERGENCY STANDBY GENERATOR. FACILITY ID: GEN 4U

DATE ISSUED: 05-19-2009
DATE EXPIRES: 01-23-2010 (UNLESS RENEWED)

LARRY GREENE
AIR POLLUTION CONTROL OFFICER

BY: 

**SACRAMENTO METROPOLITAN
AIR QUALITY MANAGEMENT DISTRICT**

20285	IC ENGINE STANDBY, MAKE: CUMMINS, MODEL: QSKTA60-GE, SERIAL NO: 33175727, 2922 BHP @ 1,800 RPM, 3,673 CU. IN. DISPLACEMENT, DIESEL FUELED, DRIVING AN EMERGENCY STANDBY GENERATOR. FACILITY ID: GEN 3M
20286	IC ENGINE STANDBY, MAKE: CUMMINS, MODEL: QSKTA60-GE, SERIAL NO: 33173817, 2922 BHP @ 1,800 RPM, 3,673 CU. IN. DISPLACEMENT, DIESEL FUELED, DRIVING AN EMERGENCY STANDBY GENERATOR. FACILITY ID: GEN 5U
20287	IC ENGINE STANDBY, MAKE: CUMMINS, MODEL: QSKTA60-GE, SERIAL NO: 33175193, 2922 BHP @ 1,800 RPM, 3,673 CU. IN. DISPLACEMENT, DIESEL FUELED, DRIVING AN EMERGENCY STANDBY GENERATOR. FACILITY ID: GEN 6U
20288	IC ENGINE STANDBY, MAKE: CUMMINS, MODEL: QSKTA60-GE, SERIAL NO: 33170830, 2922 BHP @ 1,800 RPM, 3,673 CU. IN. DISPLACEMENT, DIESEL FUELED, DRIVING AN EMERGENCY STANDBY GENERATOR. FACILITY ID: GEN 4M
21579	IC ENGINE STANDBY, MAKE: CUMMINS, MODEL: QSKTA60-GE, SERIAL NO: 33175768, 2922 BHP @ 1,800 RPM, 3,673 CU. IN. DISPLACEMENT, DIESEL FUELED, DRIVING AN EMERGENCY STANDBY GENERATOR. FACILITY ID: GEN 3U

SUBJECT TO THE FOLLOWING CONDITIONS:

GENERAL

1. THE EQUIPMENT SHALL BE PROPERLY MAINTAINED.
2. THE AIR POLLUTION CONTROL OFFICER AND/OR AUTHORIZED REPRESENTATIVES, UPON THE PRESENTATION OF CREDENTIALS SHALL BE PERMITTED:
 - A. TO ENTER UPON THE PREMISES WHERE THE SOURCE IS LOCATED OR IN WHICH ANY RECORDS ARE REQUIRED TO BE KEPT UNDER THE TERMS AND CONDITIONS OF THIS PERMIT TO OPERATE, AND
 - B. AT REASONABLE TIMES TO HAVE ACCESS TO AND COPY ANY RECORDS REQUIRED TO BE KEPT UNDER TERMS AND CONDITIONS OF THIS PERMIT TO OPERATE, AND
 - C. TO INSPECT ANY EQUIPMENT, OPERATION, OR METHOD REQUIRED IN THIS PERMIT TO OPERATE, AND
 - D. TO SAMPLE EMISSIONS FROM THE SOURCE OR REQUIRE SAMPLES TO BE TAKEN.
3. THIS PERMIT TO OPERATE DOES NOT AUTHORIZE THE EMISSION OF AIR CONTAMINANTS IN EXCESS OF THOSE ALLOWED BY DIVISION 26, PART 4, CHAPTER 3, OF THE CALIFORNIA HEALTH AND SAFETY CODE OR THE RULES AND REGULATIONS OF THE AIR QUALITY MANAGEMENT DISTRICT.
4. A LEGIBLE COPY OF THIS PERMIT TO OPERATE SHALL BE MAINTAINED ON THE PREMISES WITH THE EQUIPMENT.

EMISSION LIMITATIONS

5. THE IC ENGINES SHALL NOT DISCHARGE INTO THE ATMOSPHERE ANY VISIBLE AIR CONTAMINANT OTHER THAN UNCOMBINED WATER VAPOR, FOR A PERIOD OR PERIODS AGGREGATING MORE THAN THREE MINUTES IN ANY ONE HOUR, WHICH IS AS DARK OR DARKER THAN RINGLEMANN NO. 1 OR EQUIVALENT TO OR GREATER THAN 20% OPACITY.

**SACRAMENTO METROPOLITAN
 AIR QUALITY MANAGEMENT DISTRICT**

6. THE EMISSIONS FROM EACH OF THE IC ENGINES SHALL NOT EXCEED THE FOLLOWING LIMITS:

POLLUTANT	EMISSION FACTOR(A) G/HP-HR	MAXIMUM ALLOWABLE EMISSIONS (B)	
		LB/QUARTER	LB/YEAR
ROC	1.0	1,037	1,288
NOX	4.8	4,978	6,184
NOX + ROC	4.8	4,978	6,184
SOX	0.005	5	7
PM10	0.15	155	192
CO	2.6	2,697	3,350

(A) THE INDIVIDUAL EMISSION FACTOR FOR ROC, NOX, AND CO IS BASED ON THE DISTRICT'S BACT DETERMINATION FOR THIS SOURCE CATEGORY. THE EMISSION FACTOR FOR SOX IS BASED ON 0.0015% SULFUR BY WEIGHT IN THE FUEL. EMISSION FACTOR FOR PM10 IS BASED ON THE DISTRICT'S TBACT DETERMINATION FOR THIS SOURCE CATEGORY.

(B) EMISSIONS ARE BASED ON 2,922 BHP, 161 HOURS/QUARTER AND 200 HOURS/YEAR OF OPERATION.

7. THE COMBINED EMISSIONS OF OPERATION OF ENGINES PERMITTED UNDER 20279, 20280, 20281, 20282, 20283, 20284, 20285, 20286, 20287 & 20288 PERMITS TO OPERATE SHALL NOT EXCEED A COMBINED EMISSION OF 5,000 LBS OF NOX PER QUARTER. THE EMISSIONS OF OPERATION OF THE ENGINE PERMITTED UNDER 21579 PERMIT TO OPERATE SHALL NOT EXCEED EMISSIONS OF 5,000 LBS OF NOX PER QUARTER. THIS SHALL BE MEASURED BY USING THE TIER II EMISSION STANDARD MULTIPLIED BY THE NUMBER OF HOURS OF OPERATION AT FULL LOAD. THIS IS EQUIVALENT TO OPERATION OF THE ENGINES NO LONGER THAN 161 HOURS PER QUARTER. THIS SHALL BE VERIFIED BY ATTACHMENT A.

8. THE COMBINED EMISSIONS FROM OPERATION OF ALL ENGINES SHALL NOT EXCEED 24.4 TONS (48,800 LBS) PER 12 MONTH PERIOD (ROLLING YEAR PERIOD) OF NOX. THIS SHALL BE VERIFIED BY ATTACHMENT B ON A MONTHLY BASIS. THE EMISSION STANDARD OF THE ENGINE SHALL BE TAKEN AT THE TIER STANDARD OF THE ENGINE. A 12 MONTH PERIOD IS DEFINED AS THE PERIOD OF TIME STARTING AT THE END OF THE LAST COMPLETED MONTH TO THE BEGINNING OF THE 11TH PRECEDING MONTH. FOR EXAMPLE A 12 MONTH PERIOD, AS IT PERTAINS TO THIS PERMIT COULD BE THE BEGINNING OF OCTOBER, 2007 TO THE END OF SEPTEMBER 2008. THE 12 MONTH ROLLING PERIOD SHALL BE VERIFIED BY ATTACHMENT C.

EQUIPMENT OPERATION

9. EACH IC ENGINE SHALL OPERATE ONLY FOR THE FOLLOWING PURPOSES AND SHALL NOT OPERATE MORE THAN THE FOLLOWING HOURS:

TYPE OF OPERATIONAL HOURS	MAXIMUM ALLOWABLE OPERATION	
	HOURS/QUARTER	HOURS/YEAR
MAINTENANCE PURPOSES (A)	50	50
ALL OPERATION - MAINTENANCE AND EMERGENCY (B)	161	200

(A) MAINTENANCE PURPOSES IS DEFINED AS: THE OPERATION OF AN IC ENGINE IN ORDER TO PRESERVE THE INTEGRITY OF THE IC ENGINE AND ITS ASSOCIATED GENERATOR, THE FACILITY'S ELECTRICAL DISTRIBUTION SYSTEM OR WHEN REQUIRED BY THE DISTRICT TO VERIFY COMPLIANCE WITH THE APPLICABLE RULES AND REGULATIONS.

(B) EMERGENCY IS DEFINED AS: WHEN ELECTRICAL SERVICE FROM THE SERVING UTILITY IS INTERRUPTED BY AN UNFORESEEABLE EVENT.

10. EACH IC ENGINE SHALL BE EQUIPPED WITH A NON-RESETTING HOUR METER, WITH A MINIMUM DISPLAY CAPABILITY OF 9,999 HOURS, TO ENSURE COMPLIANCE WITH CONDITION NUMBERS 6 AND 7.

11. UPON REQUEST OF THE AIR POLLUTION CONTROL OFFICER OR DESIGNEE, ONCE EACH YEAR, DURING DAYLIGHT

SACRAMENTO METROPOLITAN AIR QUALITY MANAGEMENT DISTRICT

HOURS, EACH IC ENGINE SHALL BE RUN AT MAXIMUM ANTICIPATED LOAD, FROM A COLD START CONDITION, FOR OBSERVATION OF COMPLIANCE WITH OPACITY LIMITATIONS.

12. EACH IC ENGINE SHALL BE FUELED WITH CARB DIESEL FUEL, OR AN ALTERNATIVE DIESEL FUEL THAT MEETS THE REQUIREMENTS OF THE VERIFICATION PROCEDURE (AS CODIFIED IN TITLE 13, CCR, SECTIONS 2700-2710), OR AN ALTERNATIVE FUEL, OR CARB DIESEL FUEL USED WITH FUEL ADDITIVES THAT MEETS THE REQUIREMENTS OF THE VERIFICATION PROCEDURE, OR ANY COMBINATION OF FUELS LISTED IN THIS CONDITION.

RECORD KEEPING

13. THE FOLLOWING RECORDS SHALL BE CONTINUOUSLY MAINTAINED ONSITE FOR THE MOST RECENT THREE YEAR PERIOD AND SHALL BE MADE AVAILABLE TO THE AIR POLLUTION CONTROL OFFICER UPON REQUEST. MONTHLY, QUARTERLY, AND YEARLY RECORDS SHALL BE MADE AVAILABLE WITHIN 30 DAYS OF END OF REPORTING PERIOD.

FREQUENCY	INFORMATION TO BE RECORDED
WHEN OPERATED	A. DATE. B. PURPOSE - EITHER MAINTENANCE (M) OR EMERGENCY (E). C. NUMBER OF HOURS OF OPERATION
MONTHLY	D. TOTAL NUMBER OF HOURS OF OPERATION FOR EACH OPERATING MODE (HOURS/MONTH). E. ATTACHMENT B OR APPROVED EQUIVALENT F. ATTACHMENT C OR APPROVED EQUIVALENT
QUARTERLY	G. TOTAL NUMBER OF HOURS OF OPERATION FOR EACH OPERATING MODE (HOURS/QUARTER). H. ATTACHMENT A OR APPROVED EQUIVALENT
YEARLY	I. TOTAL NUMBER OF HOURS OF OPERATION FOR EACH OPERATING MODE (HOURS/YEAR).
ALL FUEL DELIVERIES	J. RETAIN FUEL PURCHASE RECORDS THAT ACCOUNT FOR ALL FUEL PURCHASED FOR USE IN THE ENGINES. FUEL PURCHASE RECORDS SHALL INCLUDE: - IDENTIFICATION OF TYPE OF FUEL (I.E. CARB DIESEL, ALTERNATE DIESEL, ETC.) - QUANTITY OF FUEL PURCHASED. - DATE OF FUEL PURCHASE. - SIGNATURE OF PERSON RECEIVING FUEL. - SIGNATURE OF FUEL PROVIDER INDICATING THAT FUEL WAS DELIVERED.

**SACRAMENTO METROPOLITAN
AIR QUALITY MANAGEMENT DISTRICT**

YOUR APPLICATION FOR THIS AIR QUALITY PERMIT TO OPERATE WAS EVALUATED FOR COMPLIANCE WITH SACRAMENTO METROPOLITAN AIR QUALITY MANAGEMENT DISTRICT (AQMD), STATE AND FEDERAL AIR QUALITY RULES. THE FOLLOWING LISTED RULES ARE THOSE THAT ARE MOST APPLICABLE TO THE OPERATION OF YOUR EQUIPMENT. OTHER RULES MAY ALSO BE APPLICABLE.

<u>AQMD RULE NO.</u>	<u>RULE TITLE</u>
201	GENERAL PERMIT REQUIREMENTS
202	NEW SOURCE REVIEW
401	RINGELMANN CHART
406	SPECIFIC CONTAMINANTS
420	SULFUR CONTENT OF FUELS
904	AIR TOXICS CONTROL MEASURES – STATIONARY COMPRESSION IGNITION ENGINES

IN ADDITION, THE CONDITIONS ON THIS PERMIT TO OPERATE MAY REFLECT SOME, BUT NOT ALL, REQUIREMENTS OF THESE RULES. THERE MAY BE OTHER CONDITIONS THAT ARE APPLICABLE TO THE OPERATION OF YOUR EQUIPMENT. FUTURE CHANGES IN PROHIBITORY RULES MAY ESTABLISH MORE STRINGENT REQUIREMENTS WHICH MAY SUPERSEDE THE CONDITIONS LISTED HERE.

FOR FURTHER INFORMATION PLEASE CONSULT YOUR AQMD RULEBOOK OR CONTACT THE AQMD FOR ASSISTANCE.

SACRAMENTO METROPOLITAN
 AIR QUALITY MANAGEMENT DISTRICT

ATTACHMENT A RECORD KEEPING OF EMISSION CAPS PAGE 1/2
 YEAR _____ QUARTER _____

PERMIT	HOURS OF MAINTENANCE & OPERATION IN THE QUARTER		TOTAL PERMIT LIMITATION HOURS PER QUARTER		
	MAINTENANCE HOURS	OPERATION HOURS	MAINTENANCE HOURS PER QTR	MAINTENANCE + OPERATION HOURS PER QTR	
15495 - 2876 HP			30	200	
15963 - 2876 HP			50	200	
19104 - 2876 HP			50	100	
19408* - 2922 HP			50	50	COMBINED MAINT. + OPER. NOT TO EXCEED 161 HOURS PER QTR
19409 - 2922 HP			50	160	
19410 - 2922 HP			50	160	
20279 - 2922 HP			50	161	COMBINED MAINT. + OPER. NOT TO EXCEED 161 HOURS PER QTR
20280 - 2922 HP			50	161	
20281 - 2922 HP			50	161	
20282 - 2922 HP			50	161	
20283 - 2922 HP			50	161	
20284 - 2922 HP			50	161	
20285 - 2922 HP			50	161	
20286 - 2922 HP			50	161	
20287 - 2922 HP			50	161	
20288 - 2922 HP			50	161	

* REFER TO P/O FOR OTHER OPERATING HOUR LIMITATIONS

SACRAMENTO METROPOLITAN
 AIR QUALITY MANAGEMENT DISTRICT

ATTACHMENT A RECORD KEEPING OF EMISSION CAPS PAGE 2/2

YEAR _____ QUARTER _____

PERMIT	HOURS OF MAINTENANCE & OPERATION IN THE QUARTER		TOTAL PERMIT LIMITATION HOURS PER QUARTER		COMBINED MAINT. + OPER. NOT TO EXCEED 161 HOURS PER QTR
	MAINTENANCE HOURS	OPERATION HOURS	MAINTENANCE HOURS PER QTR	MAINTENANCE + OPERATION HOURS PER QTR	
21352 - 2922 HP			50	161	
21366 - 2922 HP			50	161	
21367 - 2922 HP			50	161	
21368 - 2922 HP			50	161	
21369 - 2922 HP			50	161	
21270 - 2922 HP			50	161	
21371 - 2922 HP			50	161	
21372 - 2922 HP			50	161	
21579 - 2922 HP			50	161	

SACRAMENTO METROPOLITAN
AIR QUALITY MANAGEMENT DISTRICT

**ATTACHMENT B – VERIFICATION OF 24.4 TON PER 12 MONTH
PERIOD FACILITY CAP. PAGE 1/2**

MONTH/YEAR _____

PERMIT NO.	TOTAL HOURS PER MONTH OF MAINTENANCE & OPERATION A	EMISSION FACTOR	TOTAL LBS
		B	A X B
15495 - 2876 HP		43.75 LBS / HR	
15963 - 2876 HP		43.75 LBS / HR	
19104 - 2876 HP		43.75 LBS / HR	
19408* - 2922 HP		44.45 LBS / HR	
19409 - 2922 HP		30.93 LBS / HR	
19410 - 2922 HP		30.93 LBS / HR	
20279 - 2922 HP		30.93 LBS / HR	
20280 - 2922 HP		30.93 LBS / HR	
20281 - 2922 HP		30.93 LBS / HR	
20282 - 2922 HP		30.93 LBS / HR	
20283 - 2922 HP		30.93 LBS / HR	
20284 - 2922 HP		30.93 LBS / HR	
20285 - 2922 HP		30.93 LBS / HR	
20286 - 2922 HP		30.93 LBS / HR	
20287 - 2922 HP		30.93 LBS / HR	
20288 - 2922 HP		30.93 LBS / HR	

SACRAMENTO METROPOLITAN
AIR QUALITY MANAGEMENT DISTRICT

**ATTACHMENT B – VERIFICATION OF 24.4 TON PER 12 MONTH
PERIOD FACILITY CAP. PAGE 2/2**

MONTH/YEAR _____

PERMIT NO,	TOTAL HOURS PER MONTH OF MAINTENANCE & OPERATION A	EMISSION FACTOR B	TOTAL LBS A X B
21352 – 2922 HP		30.93 LBS / HR	
21366 – 2922 HP		30.93 LBS / HR	
21367 – 2922 HP		30.93 LBS / HR	
21368 – 2922 HP		30.93 LBS / HR	
21369 – 2922 HP		30.93 LBS / HR	
21370 – 2922 HP		30.93 LBS / HR	
21371 – 2922 HP		30.93 LBS / HR	
21372 – 2922 HP		30.93 LBS / HR	
21579 – 2922 HP		30.93 LBS / HR	

SACRAMENTO METROPOLITAN
 AIR QUALITY MANAGEMENT DISTRICT

**ATTACHMENT C – VERIFICATION OF 24.4 TON FACILITY CAP.
 YEAR _____**

PERIOD		TOTAL LBS OF NOX
BEGINNING OF THE MONTH IN THE PREVIOUS YEAR	END OF THE CURRENT MONTH IN THE CURRENT YEAR	
FEBRUARY	JANUARY	
MARCH	FEBRUARY	
APRIL	MARCH	
MAY	APRIL	
JUNE	MAY	
JULY	JUNE	
AUGUST	JULY	
SEPTEMBER	AUGUST	
OCTOBER	SEPTEMBER	
NOVEMBER	OCTOBER	
DECEMBER	NOVEMBER	
JANUARY OF CURRENT YEAR	DECEMBER	



PERMIT TO OPERATE


ISSUED TO: RAGINGWIRE ENTERPRISE SOLUTIONS INC.

EQUIPMENT LOCATION: 1312 STRIKER AVE., SACRAMENTO,

PERMIT NO.	EQUIPMENT DESCRIPTION
21352	IC ENGINE STANDBY, MAKE: CUMMINS, MODEL: QSKTA60-GE, 2922 BHP @ 1,800 RPM, 3673 IN3 DISPLACEMENT, ENGINE FAMILY: 7CEXL060.AAD. DIESEL FIRED, DRIVING AN EMERGENCY ELECTRIC GENERATOR, ENGINE NO. 33170876 FACILITY I.D: 41M
21366	IC ENGINE STANDBY, MAKE: CUMMINS, MODEL: QSKTA60-GE, 2922 BHP @ 1,800 RPM, 3673 IN3 DISPLACEMENT, ENGINE FAMILY: 7CEXL060.AAD. DIESEL FIRED, DRIVING AN EMERGENCY ELECTRIC GENERATOR, ENGINE NO. 33171019 FACILITY I.D: 42M
21367	IC ENGINE STANDBY, MAKE: CUMMINS, MODEL: QSKTA60-G6, 2922 BHP @ 1,800 RPM, 3673 IN3 DISPLACEMENT, ENGINE FAMILY: ACEXL060.AAD. DIESEL FIRED, DRIVING AN EMERGENCY ELECTRIC GENERATOR, ENGINE NO. 33183408 FACILITY I.D: 41U
21368	IC ENGINE STANDBY, MAKE: CUMMINS, MODEL: QSKTA60-G6, 2922 BHP @ 1,800 RPM, 3673 IN3 DISPLACEMENT, ENGINE FAMILY: 8CEXL060.AAD. DIESEL FIRED, DRIVING AN EMERGENCY ELECTRIC GENERATOR, ENGINE NO. 33176889 FACILITY I.D: 42U
21369	IC ENGINE STANDBY, MAKE: CUMMINGS, MODEL: QSKTA60-G6, 2922 BHP @ 1,800 RPM, 3673 IN3 DISPLACEMENT, ENGINE FAMILY: ACEXL060.AAD. DIESEL FIRED, DRIVING AN EMERGENCY ELECTRIC GENERATOR, ENGINE NO. 33183548 FACILITY I.D: 43U

DATE ISSUED: 08-01-2011
DATE EXPIRES: 01-23-2012 (UNLESS RENEWED)

LARRY GREENE
AIR POLLUTION CONTROL OFFICER

BY: 

SACRAMENTO METROPOLITAN AIR QUALITY MANAGEMENT DISTRICT

SUBJECT TO THE FOLLOWING CONDITIONS:

GENERAL

1. ALL EQUIPMENT, FACILITIES AND SYSTEMS INSTALLED OR USED TO ACHIEVE COMPLIANCE WITH THE TERMS AND CONDITIONS OF THIS PERMIT TO OPERATE SHALL AT ALL TIMES BE MAINTAINED IN GOOD WORKING ORDER AND BE OPERATED AS EFFICIENTLY AS POSSIBLE SO AS TO MINIMIZE AIR POLLUTANT EMISSIONS.
2. THE AIR POLLUTION CONTROL OFFICER AND/OR AUTHORIZED REPRESENTATIVES, UPON THE PRESENTATION OF CREDENTIALS SHALL BE PERMITTED:
 - A. TO ENTER UPON THE PREMISES WHERE THE SOURCE IS LOCATED OR IN WHICH ANY RECORDS ARE REQUIRED TO BE KEPT UNDER THE TERMS AND CONDITIONS OF THIS PERMIT TO OPERATE, AND
 - B. AT REASONABLE TIMES TO HAVE ACCESS TO AND COPY ANY RECORDS REQUIRED TO BE KEPT UNDER TERMS AND CONDITIONS OF THIS PERMIT TO OPERATE, AND
 - C. TO INSPECT ANY EQUIPMENT, OPERATION, OR METHOD REQUIRED IN THIS PERMIT TO OPERATE, AND
 - D. TO SAMPLE EMISSIONS FROM THE SOURCE OR REQUIRE SAMPLES TO BE TAKEN.
3. THIS PERMIT DOES NOT AUTHORIZE THE EMISSION OF AIR CONTAMINANTS IN EXCESS OF THOSE ALLOWED BY DIVISION 26, PART 4, CHAPTER 3, OF THE CALIFORNIA HEALTH AND SAFETY CODE OR THE RULES AND REGULATIONS OF THE AIR QUALITY MANAGEMENT DISTRICT.
4. THE EQUIPMENT SHALL NOT DISCHARGE SUCH QUANTITIES OF AIR CONTAMINANTS OR OTHER MATERIALS WHICH CAUSE INJURY, DETRIMENT, NUISANCE OR ANNOYANCE TO ANY CONSIDERABLE NUMBER OF PERSONS OR TO THE PUBLIC, OR WHICH ENDANGER THE COMFORT, REPOSE, HEALTH, OR SAFETY OF ANY SUCH PERSONS OR THE PUBLIC, OR WHICH CAUSE, OR HAVE A NATURAL TENDENCY TO CAUSE, INJURY OR DAMAGE TO BUSINESS OR PROPERTY.
5. A LEGIBLE COPY OF THIS PERMIT SHALL BE MAINTAINED ON THE PREMISES WITH THE EQUIPMENT.

EMISSIONS LIMITATIONS

6. THE IC ENGINES SHALL NOT DISCHARGE INTO THE ATMOSPHERE ANY VISIBLE AIR CONTAMINANTS OTHER THAN UNCOMBINED WATER VAPOR, FOR A PERIOD OR PERIODS AGGREGATING MORE THAN THREE MINUTES IN ANY ONE HOUR, WHICH ARE AS DARK OR DARKER THAN RINGELMANN NO. 1 OR EQUIVALENT TO OR GREATER THAN 20% OPACITY.
7. THE EMISSIONS FROM EACH OF THE IC ENGINES SHALL NOT EXCEED THE FOLLOWING LIMITS:

POLLUTANT	EMISSION FACTOR (A) G/HP-HR	MAXIMUM ALLOWABLE EMISSIONS (B)	
		LB/QTR	LB/YEAR
ROC	1	1,288	1,288
NOx	4.8	6,184	6,184
NOx & ROC	4.8	6,184	6,184
SOx	0.005	6	6
PM10	0.15	193	193
CO	2.6	3,350	3,350

(A) EMISSION FACTORS FOR ROC, NOx, PM10, AND CO EMISSION FACTOR FROM SMAQMD IC ENGINE POLICY MANUAL (7/04) TAKEN AT BACT LIMIT. SOx EMISSION FACTOR IS BASED UPON FUEL WITH 0.005% SULFUR BY WEIGHT.

(B) EMISSIONS ARE BASED ON 2,922 BHP, 200 HR/QUARTER, 200 HR/YEAR OF OPERATION, AND THE EMISSION FACTORS IN THIS TABLE.

SACRAMENTO METROPOLITAN AIR QUALITY MANAGEMENT DISTRICT

8. THE COMBINED EMISSIONS FROM OPERATION OF ALL ENGINES LOCATED AT 1312 STRIKER AVE SHALL NOT EXCEED 24.4 TONS (48,800 LBS) PER 12 MONTH ROLLING AVERAGE OF NOX. THE EMISSION RATE OF THE ENGINE SHALL BE TAKEN AT THE TIER STANDARD OF THE ENGINE. A 12 MONTH ROLLING AVERAGE IS DEFINED AS THE PERIOD OF TIME STARTING AT THE END OF THE LAST COMPLETED MONTH TO THE BEGINNING OF THE 11TH PRECEDING MONTH. FOR EXAMPLE A 12 MONTH PERIOD, AS IT PERTAINS TO THIS PERMIT COULD BE THE BEGINNING OF OCTOBER, 2007 TO THE END OF SEPTEMBER 2008. CALCULATIONS TO VERIFY THE EMISSION LIMIT MUST BE CALCULATED AND VERIFIED THROUGH ATTACHMENT D & E OR APPROVED EQUIVALENT.
9. THE COMBINED EMISSIONS FROM OPERATION OF ALL ENGINES LOCATED AT 1200 STRIKER AVE AND 1312 STRIKER AVE. SHALL NOT EXCEED 45.5 TONS (91,000 LBS) PER 12 MONTH ROLLING AVERAGE OF NOX. THE EMISSION RATE OF THE ENGINE SHALL BE TAKEN AT THE TIER STANDARD OF THE ENGINE. A 12 MONTH ROLLING AVERAGE IS DEFINED AS THE PERIOD OF TIME STARTING AT THE END OF THE LAST COMPLETED MONTH TO THE BEGINNING OF THE 11TH PRECEDING MONTH. FOR EXAMPLE A 12 MONTH PERIOD, AS IT PERTAINS TO THIS PERMIT COULD BE THE BEGINNING OF OCTOBER, 2007 TO THE END OF SEPTEMBER 2008. CALCULATIONS TO VERIFY THE EMISSION LIMIT MUST BE CALCULATED AND VERIFIED THROUGH ATTACHMENT B & C OR APPROVED EQUIVALENT.

EQUIPMENT OPERATION

10. EACH IC ENGINE SHALL OPERATE ONLY FOR THE FOLLOWING PURPOSES AND SHALL NOT OPERATE MORE THAN THE FOLLOWING HOURS:

TYPE OF OPERATIONAL HOURS	MAXIMUM ALLOWABLE OPERATION	
	HOURS/QUARTER	HOURS/YEAR
MAINTENANCE PURPOSES (A)	50	50
ALL OPERATION - MAINTENANCE (A) AND EMERGENCY (B)	200	200

(A) MAINTENANCE PURPOSES IS DEFINED AS: THE OPERATION OF AN IC ENGINE IN ORDER TO PRESERVE THE INTEGRITY OF THE IC ENGINE, ITS ASSOCIATED GENERATOR OR THE FACILITY'S ELECTRICAL DISTRIBUTION SYSTEM, OR WHEN REQUIRED BY THE SMAQMD TO VERIFY COMPLIANCE WITH THE APPLICABLE RULES AND REGULATIONS.

(B) EMERGENCY IS DEFINED AS: WHEN ELECTRICAL SERVICE FROM THE SERVING UTILITY IS INTERRUPTED BY AN UNFORESEEABLE EVENT.

11. EACH IC ENGINE SHALL BE EQUIPPED WITH A NON-RESETTING HOUR METER, WITH A MINIMUM DISPLAY CAPABILITY OF 9,999 HOURS, TO ENSURE COMPLIANCE WITH CONDITION NUMBERS 7 AND 10.
12. UPON REQUEST OF THE AIR POLLUTION CONTROL OFFICER OR DESIGNEE, ONCE EACH YEAR, DURING DAYLIGHT HOURS, THE IC ENGINE SHALL BE RUN AT MAXIMUM ANTICIPATED LOAD, FROM A COLD START CONDITION, FOR OBSERVATION OF COMPLIANCE WITH OPACITY LIMITATIONS.
13. EACH IC ENGINE SHALL BE FUELED WITH CARB DIESEL FUEL, OR AN ALTERNATIVE DIESEL FUEL THAT MEETS THE REQUIREMENTS OF THE VERIFICATION PROCEDURE (AS CODIFIED IN TITLE 13, CCR, SECTIONS 2700-2710), OR AN ALTERNATIVE FUEL, OR CARB DIESEL FUEL USED WITH FUEL ADDITIVES THAT MEETS THE REQUIREMENTS OF THE VERIFICATION PROCEDURE, OR ANY COMBINATION OF FUELS LISTED IN THIS CONDITION.
14. UNLESS AUTHORIZED BY SMAQMD, FOR PURPOSES OTHER THAN EMERGENCY OPERATION, ONLY ONE ENGINE MAY OPERATE AT ANY SINGLE TIME AT 1312 STRIKER AVE AND 1200 STRIKER AVE. THE FOLLOWING EXCLUSIONS APPLY TO THIS CONDITION
- A) CAMPUS WIDE OPERATIONAL TEST OCCURRING ONCE EVERY CALENDAR YEAR FOR LESS THAN 30 MINUTES
- B) ELECTRICAL INFRASTRUCTURE UPGRADES OR REPAIRS REQUIRING MULTIPLE OPERATIONS.

SACRAMENTO METROPOLITAN AIR QUALITY MANAGEMENT DISTRICT

RECORD KEEPING

15. THE FOLLOWING RECORDS SHALL BE CONTINUOUSLY MAINTAINED ONSITE FOR THE MOST RECENT FIVE YEAR PERIOD AND SHALL BE MADE AVAILABLE TO THE AIR POLLUTION CONTROL OFFICER UPON REQUEST. MONTHLY, QUARTERLY, AND YEARLY RECORDS SHALL BE MADE AVAILABLE WITHIN 7 DAYS OF THE END OF THE REPORTING PERIOD. ALL CALCULATIONS IN THE ATTACHMENTS MUST BE PERFORMED.

FREQUENCY	INFORMATION TO BE RECORDED FOR EACH RESPECTIVE ENGINE
WHEN OPERATED	A. DATE AND TIME. B. PURPOSE – EITHER MAINTENANCE (M) OR EMERGENCY (E). C. NUMBER OF HOURS OF OPERATION
MONTHLY	D. TOTAL NUMBER OF HOURS OF OPERATION FOR EACH OPERATING MODE (HOURS/MONTH). E. ATTACHMENT B OR APPROVED EQUIVALENT F. ATTACHMENT D OR APPROVED EQUIVALENT
QUARTERLY	G. TOTAL NUMBER OF HOURS OF OPERATION FOR EACH OPERATING MODE (HOURS/QUARTER). H. ATTACHMENT A OR APPROVED EQUIVALENT
YEARLY	I. TOTAL NUMBER OF HOURS OF OPERATION FOR EACH OPERATING MODE (HOURS/YEAR).
12 MONTH ROLLING AVERAGE	J. ATTACHMENT C OR APPROVED EQUIVALENT K. ATTACHMENT E OR APPROVED EQUIVALENT
ALL FUEL DELIVERIES	L. RETAIN FUEL PURCHASE RECORDS THAT ACCOUNT FOR ALL FUEL PURCHASED FOR USE IN THE ENGINES. FUEL PURCHASE RECORDS SHALL INCLUDE: - IDENTIFICATION OF TYPE OF FUEL (I.E. CARB DIESEL, ALTERNATE DIESEL, ETC.) - QUANTITY OF FUEL PURCHASED. - DATE OF FUEL PURCHASE. - SIGNATURE OF PERSON RECEIVING FUEL. - SIGNATURE OF FUEL PROVIDER INDICATING THAT FUEL WAS DELIVERED.
ALL TIMES	M. THE FOLLOWING RECORDS SHALL BE MAINTAINED AT ALL TIMES - PERMIT NUMBER OF EACH STATIONARY INTERNAL COMBUSTION ENGINE. - MANUFACTURER, MODEL NUMBER AND RATING IN HORSEPOWER OF EACH STATIONARY INTERNAL COMBUSTION ENGINE. - IF TESTED MAINTAIN COPIES OF MOST RECENT EMISSION TESTS INCLUDING DATE AND RESULTS REPORTED AS PPMV @ 15% O ₂ OF NOX AND POUNDS PER UNIT TIME OF NOX.

SACRAMENTO METROPOLITAN AIR QUALITY MANAGEMENT DISTRICT

YOUR APPLICATION FOR THIS AIR QUALITY PERMIT TO OPERATE WAS EVALUATED FOR COMPLIANCE WITH SACRAMENTO AIR QUALITY MANAGEMENT DISTRICT (AQMD), STATE AND FEDERAL AIR QUALITY RULES. THE FOLLOWING LISTED RULES ARE THOSE THAT ARE MOST APPLICABLE TO THE OPERATION OF YOUR EQUIPMENT. OTHER RULES MAY ALSO BE APPLICABLE.

<u>AQMD RULE NO.</u>	<u>RULE TITLE</u>
201	GENERAL PERMIT REQUIREMENTS
202	NEW SOURCE REVIEW
301	STATIONARY SOURCE PERMIT FEES
401	RINGELMANN CHART
402	NUISANCE
404	PARTICULATE MATTER
406	SPECIFIC CONTAMINANTS
411	BOILER NO _x
420	SULFUR CONTENT OF FUELS
801	NEW SOURCE PERFORMANCE STANDARDS - SUBPART IIII -
901	NATIONAL EMISSION STANDARDS FOR HAZARDOUS AIR POLLUTANTS - SUBPART ZZZZ -
904	AIR TOXICS CONTROL MEASURES - STATIONARY COMPRESSION IGNITION ENGINES

IN ADDITION, THE CONDITIONS ON THIS PERMIT TO OPERATE MAY REFLECT SOME, BUT NOT ALL, REQUIREMENTS OF THESE RULES. THERE MAY BE OTHER CONDITIONS THAT ARE APPLICABLE TO THE OPERATION OF YOUR EQUIPMENT. FUTURE CHANGES IN PROHIBITORY RULES MAY ESTABLISH MORE STRINGENT REQUIREMENTS WHICH MAY SUPERSEDE THE CONDITIONS LISTED HERE.

FOR FURTHER INFORMATION PLEASE CONSULT YOUR AQMD RULEBOOK OR CONTACT THE AQMD FOR ASSISTANCE.

SACRAMENTO METROPOLITAN
 AIR QUALITY MANAGEMENT DISTRICT

ATTACHMENT A - RECORD KEEPING OF EMISSION CAPS PAGE 1/2

YEAR _____

QUARTER _____

PERMIT	HOURS OF MAINTENANCE & OPERATION IN THE QUARTER		TOTAL PERMIT LIMITATION HOURS PER QUARTER		
	MAINTENANCE HOURS	OPERATION HOURS	MAINTENANCE HOURS PER QTR	MAINTENANCE + OPERATION HOURS PER QTR	
15495 - 2876 HP			30	200	
15963 - 2876 HP			50	200	
19104 - 2876 HP			50	100	
19408* - 2922 HP			50	50	COMBINED MAINT. + OPER. NOT TO EXCEED 161 HOURS PER QTR
19409 - 2922 HP			50	160	
19410 - 2922 HP			50	160	
20279 - 2922 HP			50	161	COMBINED MAINT. + OPER. NOT TO EXCEED 161 HOURS PER QTR
20280 - 2922 HP			50	161	
20282 - 2922 HP			50	161	
20283 - 2922 HP			50	161	
20284 - 2922 HP			50	161	
20285 - 2922 HP			50	161	
20286 - 2922 HP			50	161	
20287 - 2922 HP			50	161	
20288 - 2922 HP			50	161	

SACRAMENTO METROPOLITAN
 AIR QUALITY MANAGEMENT DISTRICT

ATTACHMENT A - RECORD KEEPING OF EMISSION CAPS PAGE 2/2

YEAR _____

QUARTER _____

PERMIT	HOURS OF MAINTENANCE & OPERATION IN THE QUARTER		TOTAL PERMIT LIMITATION HOURS PER QUARTER	
	MAINTENANCE HOURS	OPERATION HOURS	MAINTENANCE HOURS PER QTR	MAINTENANCE + OPERATION HOURS PER QTR
21352 - 2922 HP			50	200
21366 - 2922 HP			50	200
21367 - 2922 HP			50	200
21368 - 2922 HP			50	200
21369 - 2922 HP			50	200
21270 - 2922 HP			50	200
21371 - 2922 HP			50	200
21372 - 2922 HP			50	200
21579 - 2922 HP			50	161
22348 - 2922 HP			50	200
22349 - 2922 HP			50	200
22350 - 2922 HP			50	200
22351 - 2922 HP			50	200
22352 - 2922 HP			50	200
22353 - 2922 HP			50	200
22354 - 2922 HP			50	200
22355 - 2922 HP			50	200
22356 - 2922 HP			50	200
22357 - 2922 HP			50	200
22358 - 2922 HP			50	200
22359 - 2922 HP			50	200
22360 - 2922 HP			50	200
22361 - 2922 HP			50	200
22362 - 2922 HP			50	200
22363 - 2922 HP			50	200

SACRAMENTO METROPOLITAN
AIR QUALITY MANAGEMENT DISTRICT

**ATTACHMENT B – VERIFICATION OF 45.5 TON PER 12 MONTH
PERIOD FACILITY CAP. PAGE 1/3**

MONTH/YEAR _____

PERMIT NO,	TOTAL HOURS PER MONTH OF MAINTENANCE & OPERATION A	EMISSION FACTOR B	TOTAL LBS A X B
15495 - 2876 HP		43.75 LBS / HR	
15963 - 2876 HP		43.75 LBS / HR	
19104 - 2876 HP		43.75 LBS / HR	
19408* - 2922 HP		44.45 LBS / HR	
19409 - 2922 HP		30.93 LBS / HR	
19410 - 2922 HP		30.93 LBS / HR	
20279 - 2922 HP		30.93 LBS / HR	
20280 - 2922 HP		30.93 LBS / HR	
21579 - 2922 HP		30.93 LBS / HR	
20282 - 2922 HP		30.93 LBS / HR	
20283 - 2922 HP		30.93 LBS / HR	
20284 - 2922 HP		30.93 LBS / HR	
20285 - 2922 HP		30.93 LBS / HR	
20286 - 2922 HP		30.93 LBS / HR	
20287 - 2922 HP		30.93 LBS / HR	
20288 - 2922 HP		30.93 LBS / HR	

SACRAMENTO METROPOLITAN
AIR QUALITY MANAGEMENT DISTRICT

ATTACHMENT B – VERIFICATION OF 45.5 TON PER 12 MONTH
PERIOD FACILITY CAP. PAGE 2/3

MONTH/YEAR _____

PERMIT NO,	TOTAL HOURS PER MONTH OF MAINTENANCE & OPERATION A	EMISSION FACTOR B	TOTAL LBS A X B
21352		30.93 LBS / HR	
21366		30.93 LBS / HR	
21367		30.93 LBS / HR	
21368		30.93 LBS / HR	
21369		30.93 LBS / HR	
21370		30.93 LBS / HR	
21371		30.93 LBS / HR	
21372		30.93 LBS / HR	
22348		30.93 LBS / HR	
22349		30.93 LBS / HR	
22350		30.93 LBS / HR	
22351		30.93 LBS / HR	
22352		30.93 LBS / HR	
22353		30.93 LBS / HR	
22354		30.93 LBS / HR	
22355		30.93 LBS / HR	
22356		30.93 LBS / HR	
22357		30.93 LBS / HR	
22358		30.93 LBS / HR	
22359		30.93 LBS / HR	

SACRAMENTO METROPOLITAN
AIR QUALITY MANAGEMENT DISTRICT

**ATTACHMENT B – VERIFICATION OF 45.5 TON PER 12 MONTH
PERIOD FACILITY CAP. PAGE 3/3**

MONTH/YEAR _____

PERMIT NO,	TOTAL HOURS PER MONTH OF MAINTENANCE & OPERATION A	EMISSION FACTOR B	TOTAL LBS A X B
22360		30.93 LBS / HR	
22361		30.93 LBS / HR	
22362		30.93 LBS / HR	
22363		30.93 LBS / HR	

SACRAMENTO METROPOLITAN
 AIR QUALITY MANAGEMENT DISTRICT

ATTACHMENT C – VERIFICATION OF 45.5 TON FACILITY CAP.

YEAR _____

PERIOD		TOTAL LBS OF NOX
BEGINNING OF THE MONTH IN THE PREVIOUS YEAR	END OF THE CURRENT MONTH IN THE CURRENT YEAR	
FEBRUARY	JANUARY	
MARCH	FEBRUARY	
APRIL	MARCH	
MAY	APRIL	
JUNE	MAY	
JULY	JUNE	
AUGUST	JULY	
SEPTEMBER	AUGUST	
OCTOBER	SEPTEMBER	
NOVEMBER	OCTOBER	
DECEMBER	NOVEMBER	
JANUARY OF CURRENT YEAR	DECEMBER	

SACRAMENTO METROPOLITAN
AIR QUALITY MANAGEMENT DISTRICT

**ATTACHMENT D – VERIFICATION OF 24.4 TON 1312 STRIKER AVE
CAP.**

YEAR _____

MONTH	TOTAL HOURS PER MONTH OF MAINTENANCE & OPERATION FROM ALL ENGINES AT 1312 STRIKER AVE A	EMISSION FACTOR B	TOTAL LBS A X B
JANUARY		30.93 LBS / HR	
FEBRUARY		30.93 LBS / HR	
MARCH		30.93 LBS / HR	
APRIL		30.93 LBS / HR	
MAY		30.93 LBS / HR	
JUNE		30.93 LBS / HR	
JULY		30.93 LBS / HR	
AUGUST		30.93 LBS / HR	
SEPTEMBER		30.93 LBS / HR	
OCTOBER		30.93 LBS / HR	
NOVEMBER		30.93 LBS / HR	
DECEMBER		30.93 LBS / HR	

SACRAMENTO METROPOLITAN
AIR QUALITY MANAGEMENT DISTRICT

ATTACHMENT E – VERIFICATION OF 24.4 TON 1312 STRIKER AVE

PERIOD		TOTAL LBS OF NOX
BEGINNING OF THE MONTH IN THE PREVIOUS YEAR	END OF THE CURRENT MONTH IN THE CURRENT YEAR	
FEBRUARY	JANUARY	
MARCH	FEBRUARY	
APRIL	MARCH	
MAY	APRIL	
JUNE	MAY	
JULY	JUNE	
AUGUST	JULY	
SEPTEMBER	AUGUST	
OCTOBER	SEPTEMBER	
NOVEMBER	OCTOBER	
DECEMBER	NOVEMBER	
JANUARY OF CURRENT YEAR	DECEMBER	



AIR QUALITY
MANAGEMENT DISTRICT

PERMIT TO OPERATE

ISSUED TO: **RAGINGWIRE ENTERPRISE SOLUTIONS INC.**

EQUIPMENT LOCATION: **1312 STRIKER AVE., SACRAMENTO**

PERMIT NO.	EQUIPMENT DESCRIPTION
21370	IC ENGINE STANDBY, MAKE: CUMMINS, MODEL: QSKA60-G6, 2922 BHP @ 1,800 RPM, 3673 IN3 DISPLACEMENT, ENGINE FAMILY: BCEXL060.AAD. DIESEL FIRED, DRIVING AN EMERGENCY ELECTRIC GENERATOR, ENGINE NO. 33187888 FACILITY I.D: 44U
21371	IC ENGINE STANDBY, MAKE: CUMMINS, MODEL: QSKA60-G6, 2922 BHP @ 1,800 RPM, 3673 IN3 DISPLACEMENT, ENGINE FAMILY: CCEXL060.AAD.AAD. DIESEL FIRED, DRIVING AN EMERGENCY ELECTRIC GENERATOR, ENGINE NO. 33192834 FACILITY I.D: 45U
21372	IC ENGINE STANDBY, MAKE: CUMMINS, MODEL: QSKA60-G6, 2922 BHP @ 1,800 RPM, 3673 IN3 DISPLACEMENT, ENGINE FAMILY: CCEXL060.AAD. DIESEL FIRED, DRIVING AN EMERGENCY ELECTRIC GENERATOR, ENGINE NO. 33193284 FACILITY I.D: 46U

SUBJECT TO THE FOLLOWING CONDITIONS:

GENERAL

1. The equipment shall be properly maintained and operated in accordance with the manufacturer's recommendations at all times.

[Basis: SMAQMD Rule 201, Section 405]

LARRY GREENE

AIR POLLUTION CONTROL OFFICER

BY: 

DATE ISSUED: 10-26-2012

DATE EXPIRES: 01-23-2014 (UNLESS RENEWED)

SACRAMENTO METROPOLITAN
AIR QUALITY MANAGEMENT DISTRICT

2. The Air Pollution Control Officer and/or authorized representatives, upon the presentation of credentials shall be permitted:
 - A. To enter upon the premises where the source is located or in which any records are required to be kept under the terms and conditions of this Permit to Operate, and
 - B. At reasonable times to have access to and copy any records required to be kept under terms and conditions of this Permit to Operate, and
 - C. To inspect any equipment, operation, or method required in this Permit to Operate, and
 - D. To sample emissions from the source or require samples to be taken.

[Basis: SMAQMD Rule 201, Section 405]
3. This Permit to Operate does not authorize the emission of air contaminants in excess of those allowed by Division 26, Part 4, Chapter 3, of the California Health and Safety Code or the Rules and Regulations of the Sacramento Metropolitan Air Quality Management District (SMAQMD).

[Basis: SMAQMD Rule 201, Section 405]
4. The equipment shall not discharge such quantities of air contaminants or other materials which cause injury, detriment, nuisance or annoyance to any considerable number of persons or to the public, or which endanger the comfort, repose, health or safety of any such persons or the public, or which cause, or have a natural tendency to cause, injury or damage to business or property.

[Basis: SMAQMD Rule 402, Section 301]
5. A legible copy of this Permit to Operate shall be maintained on the premises with the equipment.

[Basis: SMAQMD Rule 201, Section 401]

EMISSIONS LIMITATIONS

6. The equipment shall not discharge into the atmosphere any visible air contaminant other than uncombined water vapor for a period or periods aggregating more than three minutes in any one hour which is as dark or darker than Ringelmann No. 1 or equivalent to or greater than 20% opacity.

[Basis: SMAQMD Rule 401, Section 301]

SACRAMENTO METROPOLITAN
 AIR QUALITY MANAGEMENT DISTRICT

7. The emissions from each IC engine respectively shall not exceed the following limits:
[Basis: SMAQMD Rules 201, Section 405 and 202, Section 301]

Pollutant	Emission Factors (A) (g/hp-hr)	Maximum Allowable Emissions (B)		
		(lb/day)	(lb/quarter)	(lb/year)
VOC	1	154.6	1,288	1,288
NOx	4.8	742.1	6,184	6,184
VOC + NOx	4.8	742.1	6,184	6,184
SOx	0.005	0.8	6	6
PM10	0.15	23.2	193	193
PM2.5	0.15	23.2	193	193
CO	2.6	402.0	3,350	3,350
GHG	518	40.0 tons/day	334 tons/quarter	334 tons/year

(A) Emission factors for PM10, CO, and VOC + NOx combined are based on the District's BACT standards (Tier 3 standard). In addition, PM10 & PM2.5 emissions are based on T-BACT standards (it is assumed that all PM is PM10 and PM2.5). SOx emissions are based on AP-42, Table 3.3-1 (10/96) using a fuel sulfur content of 15 ppm. VOC emissions are assessed at the worst-case scenario of the uncontrolled AP-42 emission factor of 1 g/bhp-hr and NOx emissions are assessed at the worst-case limit of 4.8 g/bhp-hr (which is the combined NOx + VOC emission standard). GHG emission factor is expressed as CO₂e and is from EPA's Mandatory Reporting of Greenhouse Gases Rule (74 FR 56260), Tables C-1 & C-2.

(B) Emissions based on 2,922 BHP, 24 hours/day, 200 hours/quarter and 200 hours/year of operation and the emission factors in this table.

8. The combined emissions from operation of all engines located at 1312 Striker Ave shall not exceed 24.4 tons (48,800 lbs) per 12 month rolling average of NOx. The emission rate of the engine shall be taken at the tier standard of the engine. A 12 month rolling average is defined as the period of time starting at the end of the last completed month to the beginning of the 11th preceding month. For example a 12 month period, as it pertains to this permit could be the beginning of October, 2007 to the end of September 2008. Calculations to verify the emission limit must be calculated and verified through attachment D & E or approved equivalent.

[Basis: SMAQMD Rules 201, Section 410.2]

9. The combined emissions from operation of all engines located at 1200 Striker Ave and 1312 Striker Ave. Shall not exceed 45.5 tons (91,000 lbs) per 12 month rolling average of NOx. The emission rate of the engine shall be taken at the tier standard of the engine. A 12 month rolling average is defined as the period of time starting at the end of the last completed month to the beginning of the 11th preceding month. For example a 12 month period, as it pertains to this permit could be the beginning of October, 2007 to the end of September 2008. Calculations to verify the emission limit must be calculated and verified through attachment B & C or approved equivalent.

[Basis: SMAQMD Rules 201, Section 410.2]

SACRAMENTO METROPOLITAN AIR QUALITY MANAGEMENT DISTRICT

EQUIPMENT OPERATION

10. Each IC engine respectively shall operate only for the following purposes and shall not operate more than the following hours:

[Basis: SMAQMD Rule 202, Section 110.2 and Title 17 CCR, Section 93115.6 (a)(3)(A)]

Type of Operational Hours	Maximum Allowable Operation	
	(hours/quarter)	(hours/year)
Maintenance Purposes (A)	50	50
All Operation - Maintenance (A) and Emergency (B)	200	200

(A) Maintenance purposes is defined as: the operation of an IC engine in order to preserve the integrity of the IC engine, its associated generator or the facility's electrical distribution system, or when required by the SMAQMD to verify compliance with the applicable rules and regulations.

(B) Emergency is defined as: when electrical service from the serving utility is interrupted by an unforeseeable event.

11. Each IC engine respectively shall be equipped with a non-resetting hour meter, with a minimum display capability of 9,999 hours, to ensure compliance with Condition Nos. 7 and 10.

[Basis: SMAQMD Rule 201, Section 405 and Title 17 CCR, Section 93115.10 (d)(1)]

12. Upon request of the Air Pollution Control Officer or designee, once each year, during daylight hours, each IC engine shall be run at maximum anticipated load, from a cold start condition, for observation of compliance with opacity limitations.

[Basis: SMAQMD Rule 201, Section 405]

13. Each IC engine shall be fueled with CARB diesel fuel, or an alternative diesel fuel that meets the requirements of the verification procedure (as codified in Title 13, CCR, Sections 2700-2710), or an alternative fuel, or CARB diesel fuel used with fuel additives that meets the requirements of the verification procedure, or any combination of fuels listed in this condition.

[Basis: Title 17 CCR, Section 93115.5, Section (b)]

14. The exhaust stack of each IC engine respectively shall exit vertically and shall not be obstructed during engine operation. A flapper-type rain cap will comply with this condition provided it does not impede the vertical flow of exhaust.

[Basis: SMAQMD Rules 201, Section 405 and 402, Section 301]

15. Unless authorized by SMAQMD, for purposes other than emergency operation, only one engine may operate at any single time at 1312 Striker Ave and 1200 Striker Ave. The following exclusions apply to this condition

[Basis: SMAQMD Rule 202]

- A. Campus wide operational test occurring once every calendar year for less than 30 minutes
- B. Electrical infrastructure upgrades or repairs requiring multiple operations.

SACRAMENTO METROPOLITAN
 AIR QUALITY MANAGEMENT DISTRICT

RECORD KEEPING & REPORTING

16. The following records shall be continuously maintained onsite for the most recent five year period and shall be made available to the Air Pollution Control Officer upon request, for each respective engine. Monthly, quarterly, and annual records shall be made available within 30 days of the end of the reporting period.
[Basis: SMAQMD Rule 201, Section 405 and Title 17 CCR, Section 93115.10 (f)(1)]

Frequency	Information to be Recorded
When Operated	A. Date. B. Purpose – Either Maintenance (M) or Emergency Power (E). C. Number of hours of operation.
Monthly	D. Total number of hours of operation for each operating mode (hours/month). E. Attachment B or approved equivalent F. Attachment D or approved equivalent
Quarterly	G. Total number of hours of operation for each operating mode (hours/quarter). H. Attachment A or approved equivalent
Annually	I. Total number of hours of operation for each operating mode (hours/year).
12 Month Rolling Average	J. Attachment C or approved equivalent K. Attachment E or approved equivalent
All Fuel Deliveries	L. Retain fuel purchase records that account for all fuel purchased for use in the engine. Fuel purchase records shall include: i. Identification of type of fuel (CARB diesel, alternate diesel, etc.). ii. Quantity of fuel purchased. iii. Date of fuel purchase. iv. Signature of person receiving fuel. v. Signature of fuel provider indicating that fuel was delivered.
All Times	M. The following records shall be maintained at all times - Permit number of each stationary internal combustion engine. - Manufacturer, model number and rating in horsepower of each stationary internal combustion engine. - If tested maintain copies of most recent emission tests including date and results reported as ppmv @ 15% O ₂ of NO _x and pounds per unit time of NO _x .

SACRAMENTO METROPOLITAN
AIR QUALITY MANAGEMENT DISTRICT

17. By January 31st of every year, the permittee shall submit to the SMAQMD the total number of hours each engine operated during the previous year for maintenance, emergency, and total (maintenance + emergency + other). Copies of the ANNUAL ENGINE SURVEY can be found at www.airquality.org. Upon determination of applicability and written notification by the SMAQMD, the permittee shall also comply with any other applicable requirements of the Air Toxics "Hot Spots" Information and Assessment Act (California Health and Safety Code Section 44300 et seq.).
[Basis: SMAQMD Rule 201, Section 303.1]

Your application for this air quality Permit to Operate was evaluated for compliance with Sacramento Metropolitan Air Quality Management District (SMAQMD), state and federal air quality rules. The following listed rules are those that are most applicable to the operation of your equipment. Other rules may also be applicable.

<u>SMAQMD RULE NO.</u>	<u>RULE TITLE</u>
201	GENERAL PERMIT REQUIREMENTS (08-24-2006)
202	NEW SOURCE REVIEW (08-23-2012)
301	STATIONARY SOURCE PERMIT FEES (10-27-2005)
401	RINGELMANN CHART (04-19-1983)
402	NUISANCE (08-09-1977)
404	PARTICULATE MATTER (11-20-1984)
406	SPECIFIC CONTAMINANTS (12-06-1978)
420	SULFUR CONTENT OF FUELS (08-13-1981)
801	NEW SOURCE PERFORMANCE STANDARDS - STATIONARY COMPRESSION IGNITION INTERNAL COMBUSTION ENGINES [40 CFR 60 SUBPART IIII] (05-26-2011)
901	NATIONAL EMISSION STANDARDS FOR HAZARDOUS AIR POLLUTANTS - STATIONARY RECIPROCATING INTERNAL COMBUSTION ENGINES [40 CFR 63 SUBPART ZZZZ] (12-06-1978)
904	CARB AIR TOXICS CONTROL MEASURES - STATIONARY COMPRESSION IGNITION ENGINES [CALIFORNIA CODE OF REGULATIONS, TITLE 17, SECTION 93115] (05-26-2011)

SACRAMENTO METROPOLITAN
 AIR QUALITY MANAGEMENT DISTRICT

ATTACHMENT A - RECORD KEEPING OF EMISSION CAPS PAGE 1/2

YEAR _____ QUARTER _____

PERMIT	HOURS OF MAINTENANCE & OPERATION IN THE QUARTER		TOTAL PERMIT LIMITATION HOURS PER QUARTER		
	MAINTENANCE HOURS	OPERATION HOURS	MAINTENANCE HOURS PER QTR	MAINTENANCE + OPERATION HOURS PER QTR	
15495 - 2876 HP			30	200	
15963 - 2876 HP			50	200	
19104 - 2876 HP			50	100	
19408* - 2922 HP			50	50	COMBINED MAINT. + OPER. NOT TO EXCEED 161 HOURS PER QTR
19409 - 2922 HP			50	160	
19410 - 2922 HP			50	160	
20279 - 2922 HP			50	161	COMBINED MAINT. + OPER. NOT TO EXCEED 161 HOURS PER QTR
20280 - 2922 HP			50	161	
20282 - 2922 HP			50	161	
20283 - 2922 HP			50	161	
20284 - 2922 HP			50	161	
20285 - 2922 HP			50	161	
20286 - 2922 HP			50	161	
20287 - 2922 HP			50	161	
20288 - 2922 HP			50	161	

SACRAMENTO METROPOLITAN
 AIR QUALITY MANAGEMENT DISTRICT

ATTACHMENT A - RECORD KEEPING OF EMISSION CAPS PAGE 2/2

YEAR _____ QUARTER _____

PERMIT	HOURS OF MAINTENANCE & OPERATION IN THE QUARTER		TOTAL PERMIT LIMITATION HOURS PER QUARTER	
	MAINTENANCE HOURS	OPERATION HOURS	MAINTENANCE HOURS PER QTR	MAINTENANCE + OPERATION HOURS PER QTR
21352 - 2922 HP			50	200
21366 - 2922 HP			50	200
21367 - 2922 HP			50	200
21368 - 2922 HP			50	200
21369 - 2922 HP			50	200
21370 - 2922 HP			50	200
21371 - 2922 HP			50	200
21372 - 2922 HP			50	200
21579 - 2922 HP			50	161
22348 - 2922 HP			50	200
22349 - 2922 HP			50	200
22350 - 2922 HP			50	200
22351 - 2922 HP			50	200
22352 - 2922 HP			50	200
22353 - 2922 HP			50	200
22354 - 2922 HP			50	200
22355 - 2922 HP			50	200
22356 - 2922 HP			50	200
22357 - 2922 HP			50	200
22358 - 2922 HP			50	200
22359 - 2922 HP			50	200
22360 - 2922 HP			50	200
22361 - 2922 HP			50	200
22362 - 2922 HP			50	200
22363 - 2922 HP			50	200

SACRAMENTO METROPOLITAN
AIR QUALITY MANAGEMENT DISTRICT

**ATTACHMENT B – VERIFICATION OF 45.5 TON PER 12 MONTH
PERIOD FACILITY CAP. PAGE 1/3**

MONTH/YEAR _____

PERMIT NO.	TOTAL HOURS PER MONTH OF MAINTENANCE & OPERATION A	EMISSION FACTOR B	TOTAL LBS A X B
15495 - 2876 HP		43.75 LBS / HR	
15963 - 2876 HP		43.75 LBS / HR	
19104 - 2876 HP		43.75 LBS / HR	
19408* - 2922 HP		44.45 LBS / HR	
19409 - 2922 HP		30.93 LBS / HR	
19410 - 2922 HP		30.93 LBS / HR	
20279 - 2922 HP		30.93 LBS / HR	
20280 - 2922 HP		30.93 LBS / HR	
21579 - 2922 HP		30.93 LBS / HR	
20282 - 2922 HP		30.93 LBS / HR	
20283 - 2922 HP		30.93 LBS / HR	
20284 - 2922 HP		30.93 LBS / HR	
20285 - 2922 HP		30.93 LBS / HR	
20286 - 2922 HP		30.93 LBS / HR	
20287 - 2922 HP		30.93 LBS / HR	
20288 - 2922 HP		30.93 LBS / HR	

SACRAMENTO METROPOLITAN
AIR QUALITY MANAGEMENT DISTRICT

**ATTACHMENT B – VERIFICATION OF 45.5 TON PER 12 MONTH
PERIOD FACILITY CAP. PAGE 2/3**

MONTH/YEAR _____

PERMIT NO,	TOTAL HOURS PER MONTH OF MAINTENANCE & OPERATION A	EMISSION FACTOR	
		B	TOTAL LBS A X B
21352		30.93 LBS / HR	
21366		30.93 LBS / HR	
21367		30.93 LBS / HR	
21368		30.93 LBS / HR	
21369		30.93 LBS / HR	
21370		30.93 LBS / HR	
21371		30.93 LBS / HR	
21372		30.93 LBS / HR	
22348		30.93 LBS / HR	
22349		30.93 LBS / HR	
22350		30.93 LBS / HR	
22351		30.93 LBS / HR	
22352		30.93 LBS / HR	
22353		30.93 LBS / HR	
22354		30.93 LBS / HR	
22355		30.93 LBS / HR	
22356		30.93 LBS / HR	
22357		30.93 LBS / HR	
22358		30.93 LBS / HR	
22359		30.93 LBS / HR	

SACRAMENTO METROPOLITAN
AIR QUALITY MANAGEMENT DISTRICT

**ATTACHMENT B – VERIFICATION OF 45.5 TON PER 12 MONTH
PERIOD FACILITY CAP. PAGE 3/3**

MONTH/YEAR _____

PERMIT NO,	TOTAL HOURS PER MONTH OF MAINTENANCE & OPERATION A	EMISSION FACTOR B	TOTAL LBS A X B
22360		30.93 LBS / HR	
22361		30.93 LBS / HR	
22362		30.93 LBS / HR	
22363		30.93 LBS / HR	

SACRAMENTO METROPOLITAN
 AIR QUALITY MANAGEMENT DISTRICT

ATTACHMENT C – VERIFICATION OF 45.5 TON FACILITY CAP.

YEAR _____

PERIOD		TOTAL LBS OF NOX
BEGINNING OF THE MONTH IN THE PREVIOUS YEAR	END OF THE CURRENT MONTH IN THE CURRENT YEAR	
FEBRUARY	JANUARY	
MARCH	FEBRUARY	
APRIL	MARCH	
MAY	APRIL	
JUNE	MAY	
JULY	JUNE	
AUGUST	JULY	
SEPTEMBER	AUGUST	
OCTOBER	SEPTEMBER	
NOVEMBER	OCTOBER	
DECEMBER	NOVEMBER	
JANUARY OF CURRENT YEAR	DECEMBER	

SACRAMENTO METROPOLITAN
AIR QUALITY MANAGEMENT DISTRICT

**ATTACHMENT D – VERIFICATION OF 24.4 TON 1312 STRIKER AVE
CAP.**

YEAR _____

MONTH	TOTAL HOURS PER MONTH OF MAINTENANCE & OPERATION FROM ALL ENGINES AT 1312 STRIKER AVE A	EMISSION FACTOR B	TOTAL LBS A X B
JANUARY		30.93 LBS / HR	
FEBRUARY		30.93 LBS / HR	
MARCH		30.93 LBS / HR	
APRIL		30.93 LBS / HR	
MAY		30.93 LBS / HR	
JUNE		30.93 LBS / HR	
JULY		30.93 LBS / HR	
AUGUST		30.93 LBS / HR	
SEPTEMBER		30.93 LBS / HR	
OCTOBER		30.93 LBS / HR	
NOVEMBER		30.93 LBS / HR	
DECEMBER		30.93 LBS / HR	



AIR QUALITY
MANAGEMENT DISTRICT

PERMIT TO OPERATE

ISSUED TO: **RAGINGWIRE ENTERPRISE SOLUTIONS INC.**

EQUIPMENT LOCATION: **1312 STRIKER AVE., SACRAMENTO**

PERMIT NO.	EQUIPMENT DESCRIPTION
22348	IC ENGINE STANDBY, MAKE: CUMMINS, MODEL: QSK60-G6, 2922 BHP @ 1,800 RPM, 3673 IN3 DISPLACEMENT, ENGINE FAMILY: DCEXL060.AAD. DIESEL FIRED, DRIVING AN EMERGENCY ELECTRIC GENERATOR, ENGINE NO. 61113-343 FACILITY I.D: 43M
22349	IC ENGINE STANDBY, MAKE: CUMMINS, MODEL: QSK60-G6, 2922 BHP @ 1,800 RPM, 3673 IN3 DISPLACEMENT, ENGINE FAMILY: DCEXL060.AAD. DIESEL FIRED, DRIVING AN EMERGENCY ELECTRIC GENERATOR, ENGINE NO. 33196078 FACILITY I.D: 44M
22350	IC ENGINE STANDBY, MAKE: CUMMINS, MODEL: QSK60-G6, 2922 BHP @ 1,800 RPM, 3673 IN3 DISPLACEMENT, ENGINE FAMILY: DCEXL060.AAD. DIESEL FIRED, DRIVING AN EMERGENCY ELECTRIC GENERATOR, ENGINE NO. 33196316 FACILITY I.D: 47U
22351	IC ENGINE STANDBY, MAKE: CUMMINS, MODEL: QSK60-G6, 2922 BHP @ 1,800 RPM, 3673 IN3 DISPLACEMENT, ENGINE FAMILY: DCEXL060.AAD. DIESEL FIRED, DRIVING AN EMERGENCY ELECTRIC GENERATOR, ENGINE NO. 33196301 FACILITY I.D: 48U
22352	IC ENGINE STANDBY, MAKE: CUMMINS, MODEL: QSK60-G6, 2922 BHP @ 1,800 RPM, 3673 IN3 DISPLACEMENT, ENGINE FAMILY: CCEXL060.AAD. DIESEL FIRED, DRIVING AN EMERGENCY ELECTRIC GENERATOR, ENGINE NO. 33198190 FACILITY

DATE ISSUED: 05-07-2014
DATE EXPIRES: 01-23-2015 (UNLESS RENEWED)

LARRY GREENE
AIR POLLUTION CONTROL OFFICER

BY: 

SACRAMENTO METROPOLITAN
AIR QUALITY MANAGEMENT DISTRICT

I.D: 51M

- 22353 IC ENGINE STANDBY, MAKE: CUMMINS, MODEL: QSK60-G6, 2922 BHP @ 1,800 RPM, 3673 IN3 DISPLACEMENT, ENGINE FAMILY: DCEXL060.AAD. DIESEL FIRED, DRIVING AN EMERGENCY ELECTRIC GENERATOR, ENGINE NO. 33197570 FACILITY I.D: 52M
- 22354 IC ENGINE STANDBY, MAKE: CUMMINS, MODEL: QSK60-G6, 2922 BHP @ 1,800 RPM, 3673 IN3 DISPLACEMENT, ENGINE FAMILY: CCEXL060.AAD. DIESEL FIRED, DRIVING AN EMERGENCY ELECTRIC GENERATOR, ENGINE NO. 33197808 FACILITY I.D: 51U
- 22355 IC ENGINE STANDBY, MAKE: CUMMINS, MODEL: QSK60-G6, 2922 BHP @ 1,800 RPM, 3673 IN3 DISPLACEMENT, ENGINE FAMILY: CCEXL060.AAD. DIESEL FIRED, DRIVING AN EMERGENCY ELECTRIC GENERATOR, ENGINE NO. 33198524 FACILITY I.D: 52U
- 22356 IC ENGINE STANDBY, MAKE: CUMMINS, MODEL: QSK60-G6, 2922 BHP @ 1,800 RPM, 3673 IN3 DISPLACEMENT, ENGINE FAMILY: CCEXL060.AAD. DIESEL FIRED, DRIVING AN EMERGENCY ELECTRIC GENERATOR, ENGINE NO. 33198268 FACILITY I.D: 53U
- 22357 IC ENGINE STANDBY, MAKE: CUMMINS, MODEL: QSK60-G6, 2922 BHP @ 1,800 RPM, 3673 IN3 DISPLACEMENT, ENGINE FAMILY: DCEXL060.AAD. DIESEL FIRED, DRIVING AN EMERGENCY ELECTRIC GENERATOR, ENGINE NO. 33197558 FACILITY I.D: 54U
- 22358 IC ENGINE STANDBY, MAKE: CUMMINS, MODEL: QSK60-G6, 2922 BHP @ 1,800 RPM, 3673 IN3 DISPLACEMENT, ENGINE FAMILY: DCEXL060.AAD. DIESEL FIRED, DRIVING AN EMERGENCY ELECTRIC GENERATOR, ENGINE NO. 33197997 FACILITY I.D: 55U
- 22359 IC ENGINE STANDBY, MAKE: CUMMINS, MODEL: QSK60-G6, 2922 BHP @ 1,800 RPM, 3673 IN3 DISPLACEMENT, ENGINE FAMILY: CCEXL060.AAD. DIESEL FIRED, DRIVING AN EMERGENCY ELECTRIC GENERATOR, ENGINE NO. 33197860 FACILITY I.D: 53M
- 22360 IC ENGINE STANDBY, MAKE: CUMMINS, MODEL: QSK60-G6, 2922 BHP @ 1,800 RPM, 3673 IN3 DISPLACEMENT, ENGINE FAMILY: CCEXL060.AAD. DIESEL FIRED, DRIVING AN EMERGENCY ELECTRIC GENERATOR, ENGINE NO. 33198332 FACILITY I.D: 56U

SACRAMENTO METROPOLITAN
AIR QUALITY MANAGEMENT DISTRICT

- 22381 IC ENGINE STANDBY, MAKE: CUMMINS, MODEL: QSK60-G6, 2922 BHP @ 1,800 RPM, 3673 IN3 DISPLACEMENT, ENGINE FAMILY: CCEXL060.AAD. DIESEL FIRED, DRIVING AN EMERGENCY ELECTRIC GENERATOR, ENGINE NO. 33198010 FACILITY I.D: 57U
- 22362 IC ENGINE STANDBY, MAKE: CUMMINS, MODEL: QSK60-G6, 2922 BHP @ 1,800 RPM, 3673 IN3 DISPLACEMENT, ENGINE FAMILY: CCEXL060.AAD. DIESEL FIRED, DRIVING AN EMERGENCY ELECTRIC GENERATOR, ENGINE NO. 33198596 FACILITY I.D: 58U
- 22363 IC ENGINE STANDBY, MAKE: CUMMINS, MODEL: QSK60-G6, 2922 BHP @ 1,800 RPM, 3673 IN3 DISPLACEMENT, ENGINE FAMILY: CCEXL060.AAD. DIESEL FIRED, DRIVING AN EMERGENCY ELECTRIC GENERATOR, ENGINE NO. 33198517 FACILITY I.D: 59U

SUBJECT TO THE FOLLOWING CONDITIONS:

GENERAL

1. The equipment shall be properly maintained and operated in accordance with the manufacturer's recommendations at all times.
[Basis: SMAQMD Rule 201, Section 405]
2. The Air Pollution Control Officer and/or authorized representatives, upon the presentation of credentials shall be permitted:
 - A. To enter upon the premises where the source is located or in which any records are required to be kept under the terms and conditions of this Permit to Operate, and
 - B. At reasonable times to have access to and copy any records required to be kept under terms and conditions of this Permit to Operate, and
 - C. To inspect any equipment, operation, or method required in this Permit to Operate, and
 - D. To sample emissions from the source or require samples to be taken.**[Basis: SMAQMD Rule 201, Section 405]**
3. This Permit to Operate does not authorize the emission of air contaminants in excess of those allowed by Division 26, Part 4, Chapter 3, of the California Health and Safety Code or the Rules and Regulations of the Sacramento Metropolitan Air Quality Management District (SMAQMD).
[Basis: SMAQMD Rule 201, Section 405]
4. The equipment shall not discharge such quantities of air contaminants or other materials which cause injury, detriment, nuisance or annoyance to any considerable number of persons or to the public, or which endanger the comfort, repose, health or safety of any such persons or the public, or which cause, or have a

SACRAMENTO METROPOLITAN AIR QUALITY MANAGEMENT DISTRICT

natural tendency to cause, injury or damage to business or property.
[Basis: SMAQMD Rule 402, Section 301]

5. A legible copy of this Permit to Operate shall be maintained on the premises with the equipment.
[Basis: SMAQMD Rule 201, Section 401]

EMISSIONS LIMITATIONS

6. The equipment shall not discharge into the atmosphere any visible air contaminant other than uncombined water vapor for a period or periods aggregating more than three minutes in any one hour which is as dark or darker than Ringelmann No. 1 or equivalent to or greater than 20% opacity.
[Basis: SMAQMD Rule 401, Section 301]
7. The emissions from each respective IC engine shall not exceed the following limits:
[Basis: SMAQMD Rules 201, Section 405 and 202, Section 301]

Pollutant	Emission Factors (A) (g/hp-hr)	Maximum Allowable Emissions (B)		
		(lb/day)	(lb/quarter)	(lb/year)
VOC	1	154.6	1,288	1,288
NOx	4.8	742.1	6,184	6,184
VOC + NOx	4.8	742.1	6,184	6,184
SOx	0.005	0.8	6	6
PM10	0.15	23.2	193	193
PM2.5	0.15	23.2	193	193
CO	2.6	402.0	3,350	3,350
GHG	518	40.0 tons/day	334 tons/quarter	334 tons/year

(A) Emission factors for PM10, CO, and VOC + NOx combined are based on the District's BACT standards (Tier 2 standard). In addition, PM10 & PM2.5 emissions are based on T-BACT standards (it is assumed that all PM is PM10 and PM2.5). SOx emissions are based on AP-42, Table 3.3-1 (10/96) using a fuel sulfur content of 15 ppm. NOx emissions are assessed at the worst-case limit of 4.8 g/bhp-hr (which is the combined NOx + VOC emission standard). GHG emission factor is expressed as CO2e and is from EPA's Mandatory Reporting of Greenhouse Gases Rule (74 FR 56260), Tables C-1 & C-2.

(B) Emissions based on 2,922 BHP, 24 hours/day, 200 hours/quarter and 200 hours/year of operation and the emission factors in this table.

8. The combined emissions from operation of all engines located at 1312 Striker Ave shall not exceed 24.4 tons (48,800 lbs) per 12 month rolling average of NOx. The emission rate of the engine shall be taken at the tier standard of the engine. A 12 month rolling average is defined as the period of time starting at the end of the last completed month to the beginning of the 11th preceding month. For example a 12 month period, as it pertains to this permit could be the beginning of October, 2007 to the end of September 2008. Calculations to verify the emission limit must be calculated and verified through attachment D & E or

SACRAMENTO METROPOLITAN
AIR QUALITY MANAGEMENT DISTRICT

approved equivalent.

[Basis: SMAQMD Rules 201, Section 410.2]

9. The combined emissions from operation of all engines located at 1200 Striker Ave and 1312 Striker Ave. shall not exceed 45.5 tons (91,000 lbs) per 12 month rolling average of NOx. The emission rate of the engine shall be taken at the tier standard of the engine. A 12 month rolling average is defined as the period of time starting at the end of the last completed month to the beginning of the 11th preceding month. For example a 12 month period, as it pertains to this permit could be the beginning of October, 2007 to the end of September 2008. Calculations to verify the emission limit must be calculated and verified through attachment B & C or approved equivalent.

[Basis: SMAQMD Rules 201, Section 410.2]

EQUIPMENT OPERATION

10. Each respective IC engine shall operate only for the following purposes and shall not operate more than the following hours:

[Basis: SMAQMD Rule 202, Section 110.2 and Title 17 CCR, Section 93115.6 (a)(3)(A)]

Type of Operational Hours	Maximum Allowable Operation	
	(hours/quarter)	(hours/year)
Maintenance Purposes (A)	50	50
All Operation - Maintenance (A) and Emergency (B)	200	200

(A) Maintenance purposes is defined as: the operation of an IC engine in order to preserve the integrity of the IC engine, its associated generator or the facility's electrical distribution system, or when required by the SMAQMD to verify compliance with the applicable rules and regulations.

(B) Emergency is defined as: when electrical service from the serving utility is interrupted by an unforeseeable event.

11. Each IC engine shall be equipped with a non-resetting hour meter, with a minimum display capability of 9,999 hours, to ensure compliance with Condition Nos. 7 and 10.

[Basis: SMAQMD Rule 201, Section 405 and Title 17 CCR, Section 93115.10 (d)(1)]

12. Upon request of the Air Pollution Control Officer or designee, once each year, during daylight hours, each IC engine shall be run at maximum anticipated load, from a cold start condition, for observation of compliance with opacity limitations.

[Basis: SMAQMD Rule 201, Section 405]

13. Each IC engine shall be fueled with CARB diesel fuel, or an alternative diesel fuel that meets the requirements of the verification procedure (as codified in Title 13, CCR, Sections 2700-2710), or an alternative fuel, or CARB diesel fuel used with fuel additives that meets the requirements of the verification procedure, or any combination of fuels listed in this condition.

[Basis: Title 17 CCR, Section 93115.5, Section (b)]

14. The exhaust stacks of each of the IC engine shall exit vertically and shall not be obstructed during engine operation. A flapper-type rain cap will comply with this condition provided it does not impede the vertical

SACRAMENTO METROPOLITAN
AIR QUALITY MANAGEMENT DISTRICT

flow of exhaust.

[Basis: SMAQMD Rules 201, Section 405 and 402, Section 301]

15. Unless authorized by SMAQMD, for purposes other than emergency operation, only one engine may operate at any single time at 1312 Striker Ave and 1200 Striker Ave. The following exclusions apply to this condition

[Basis: SMAQMD Rule 202]

- A. Campus wide operational test occurring once every calendar year for less than 30 minutes
- B. Electrical infrastructure upgrades or repairs requiring multiple operations.

**SACRAMENTO METROPOLITAN
 AIR QUALITY MANAGEMENT DISTRICT**

RECORD KEEPING & REPORTING

16. For each respective engine, the following records shall be continuously maintained onsite for the most recent five year period and shall be made available to the Air Pollution Control Officer upon request, for each respective engine. Monthly, quarterly, and annual records shall be made available within 30 days of the end of the reporting period.

[Basis: SMAQMD Rule 201, Section 405 and Title 17 CCR, Section 93115.10 (f)(1)]

Frequency	Information to be Recorded
When Operated	A. Date. B. Purpose – Either Maintenance (M) or Emergency Power (E). C. Number of hours of operation.
Monthly	D. Total number of hours of operation for each operating mode (hours/month). E. Attachment B or approved equivalent F. Attachment D or approved equivalent
Quarterly	G. Total number of hours of operation for each operating mode (hours/quarter). H. Attachment A or approved equivalent
Annually	I. Total number of hours of operation for each operating mode (hours/year).
12 Month Rolling Average	J. Attachment C or approved equivalent K. Attachment E or approved equivalent
All Fuel Deliveries	L. Retain fuel purchase records that account for all fuel purchased for use in the engine. Fuel purchase records shall include: i. Identification of type of fuel (CARB diesel, alternate diesel, etc.). ii. Quantity of fuel purchased. iii. Date of fuel purchase. iv. Signature of person receiving fuel. v. Signature of fuel provider indicating that fuel was delivered.
All Times	M. The following records shall be maintained at all times - Permit number of each stationary internal combustion engine. - Manufacturer, model number and rating in horsepower of each stationary internal combustion engine. - If tested maintain copies of most recent emission tests including date and results reported as ppmv @ 15% O2 of NOx and pounds per unit time of NOx.

SACRAMENTO METROPOLITAN
AIR QUALITY MANAGEMENT DISTRICT

17. By January 31st of every year, the permittee shall submit to the SMAQMD the total number of hours each engine operated during the previous year for maintenance, emergency, and total (maintenance + emergency + other). Copies of the ANNUAL ENGINE SURVEY can be found at www.airquality.org. Upon determination of applicability and written notification by the SMAQMD, the permittee shall also comply with any other applicable requirements of the Air Toxics "Hot Spots" Information and Assessment Act (California Health and Safety Code Section 44300 et seq.).

[Basis: SMAQMD Rule 201, Section 303.1]

Your application for this air quality Permit to Operate was evaluated for compliance with Sacramento Metropolitan Air Quality Management District (SMAQMD), state and federal air quality rules. The following listed rules are those that are most applicable to the operation of your equipment. Other rules may also be applicable.

<u>SMAQMD RULE NO.</u>	<u>RULE TITLE</u>
201	GENERAL PERMIT REQUIREMENTS (08-24-2006)
202	NEW SOURCE REVIEW (08-23-2012)
401	RINGELMANN CHART (04-19-1983)
402	NUISANCE (08-09-1977)
404	PARTICULATE MATTER (11-20-1984)
406	SPECIFIC CONTAMINANTS (12-06-1978)
420	SULFUR CONTENT OF FUELS (08-13-1981)
<u>FEDERAL</u>	<u>FEDERAL STANDARD</u>
40 CFR 60 SUBPART III	NEW SOURCE PERFORMANCE STANDARDS - STATIONARY COMPRESSION IGNITION INTERNAL COMBUSTION ENGINES
40 CFR 63 SUBPART ZZZZ	NATIONAL EMISSION STANDARDS FOR HAZARDOUS AIR POLLUTANTS - STATIONARY RECIPROCATING INTERNAL COMBUSTION ENGINES
<u>STATE</u>	<u>STATE STANDARD</u>
CCR, TITLE 17, SECTION 93115	CARB AIR TOXICS CONTROL MEASURES - STATIONARY COMPRESSION IGNITION ENGINES (05-26-2011)

In addition, the conditions on this Permit to Operate may reflect some, but not all, requirements of these rules. There may be other conditions that are applicable to the operation of your equipment. Future changes in prohibitory rules may establish more stringent requirements which may supersede the conditions listed here.

For further information please consult your SMAQMD rulebook or contact the SMAQMD for assistance.

SACRAMENTO METROPOLITAN
 AIR QUALITY MANAGEMENT DISTRICT

ATTACHMENT A - RECORD KEEPING OF EMISSION CAPS PAGE 1/2

YEAR _____ QUARTER _____

PERMIT	HOURS OF MAINTENANCE & OPERATION IN THE QUARTER		TOTAL PERMIT LIMITATION HOURS PER QUARTER		
	MAINTENANCE HOURS	OPERATION HOURS	MAINTENANCE HOURS PER QTR	MAINTENANCE + OPERATION HOURS PER QTR	
15495 - 2876 HP			30	200	
15963 - 2876 HP			50	200	
19104 - 2876 HP			50	100	
19408* - 2922 HP			50	50	COMBINED MAINT. + OPER. NOT TO EXCEED 161 HOURS PER QTR
19409 - 2922 HP			50	160	
19410 - 2922 HP			50	160	
20279 - 2922 HP			50	161	COMBINED MAINT. + OPER. NOT TO EXCEED 161 HOURS PER QTR
20280 - 2922 HP			50	161	
20282 - 2922 HP			50	161	
20283 - 2922 HP			50	161	
20284 - 2922 HP			50	161	
20285 - 2922 HP			50	161	
20286 - 2922 HP			50	161	
20287 - 2922 HP			50	161	
20288 - 2922 HP			50	161	

SACRAMENTO METROPOLITAN
 AIR QUALITY MANAGEMENT DISTRICT

ATTACHMENT A - RECORD KEEPING OF EMISSION CAPS PAGE 2/2

YEAR _____ QUARTER _____

PERMIT	HOURS OF MAINTENANCE & OPERATION IN THE QUARTER		TOTAL PERMIT LIMITATION HOURS PER QUARTER	
	MAINTENANCE HOURS	OPERATION HOURS	MAINTENANCE HOURS PER QTR	MAINTENANCE + OPERATION HOURS PER QTR
21352 - 2922 HP			50	200
21366 - 2922 HP			50	200
21367 - 2922 HP			50	200
21368 - 2922 HP			50	200
21369 - 2922 HP			50	200
21370 - 2922 HP			50	200
21371 - 2922 HP			50	200
21372 - 2922 HP			50	200
21579 - 2922 HP			50	161
22348 - 2922 HP			50	200
22349 - 2922 HP			50	200
22350 - 2922 HP			50	200
22351 - 2922 HP			50	200
22352 - 2922 HP			50	200
22353 - 2922 HP			50	200
22354 - 2922 HP			50	200
22355 - 2922 HP			50	200
22356 - 2922 HP			50	200
22357 - 2922 HP			50	200
22358 - 2922 HP			50	200
22359 - 2922 HP			50	200
22360 - 2922 HP			50	200
22361 - 2922 HP			50	200
22362 - 2922 HP			50	200
22363 - 2922 HP			50	200

SACRAMENTO METROPOLITAN
 AIR QUALITY MANAGEMENT DISTRICT

ATTACHMENT B – VERIFICATION OF 45.5 TON PER 12 MONTH
 PERIOD FACILITY CAP. PAGE 1/3

MONTH/YEAR _____

PERMIT NO,	TOTAL HOURS PER MONTH OF MAINTENANCE & OPERATION A	EMISSION FACTOR B	TOTAL LBS A X B
15495 - 2876 HP		43.75 LBS / HR	
15963 - 2876 HP		43.75 LBS / HR	
19104 - 2876 HP		43.75 LBS / HR	
19408* - 2922 HP		44.45 LBS / HR	
19409 - 2922 HP		30.93 LBS / HR	
19410 - 2922 HP		30.93 LBS / HR	
20279 - 2922 HP		30.93 LBS / HR	
20280 - 2922 HP		30.93 LBS / HR	
21579 - 2922 HP		30.93 LBS / HR	
20282 - 2922 HP		30.93 LBS / HR	
20283 - 2922 HP		30.93 LBS / HR	
20284 - 2922 HP		30.93 LBS / HR	
20285 - 2922 HP		30.93 LBS / HR	
20286 - 2922 HP		30.93 LBS / HR	
20287 - 2922 HP		30.93 LBS / HR	
20288 - 2922 HP		30.93 LBS / HR	

SACRAMENTO METROPOLITAN
AIR QUALITY MANAGEMENT DISTRICT

ATTACHMENT B – VERIFICATION OF 45.5 TON PER 12 MONTH
PERIOD FACILITY CAP. PAGE 2/3

MONTH/YEAR _____

PERMIT NO.	TOTAL HOURS PER MONTH OF MAINTENANCE & OPERATION A	EMISSION FACTOR B	TOTAL LBS A X B
21352		30.93 LBS / HR	
21366		30.93 LBS / HR	
21367		30.93 LBS / HR	
21368		30.93 LBS / HR	
21369		30.93 LBS / HR	
21370		30.93 LBS / HR	
21371		30.93 LBS / HR	
21372		30.93 LBS / HR	
22348		30.93 LBS / HR	
22349		30.93 LBS / HR	
22350		30.93 LBS / HR	
22351		30.93 LBS / HR	
22352		30.93 LBS / HR	
22353		30.93 LBS / HR	
22354		30.93 LBS / HR	
22355		30.93 LBS / HR	
22356		30.93 LBS / HR	
22357		30.93 LBS / HR	
22358		30.93 LBS / HR	
22359		30.93 LBS / HR	

SACRAMENTO METROPOLITAN
AIR QUALITY MANAGEMENT DISTRICT

ATTACHMENT B – VERIFICATION OF 45.5 TON PER 12 MONTH
PERIOD FACILITY CAP. PAGE 3/3

MONTH/YEAR _____

PERMIT NO.	TOTAL HOURS PER MONTH OF MAINTENANCE & OPERATION A	EMISSION FACTOR	TOTAL LBS
		B	A X B
22360		30.93 LBS / HR	
22361		30.93 LBS / HR	
22362		30.93 LBS / HR	
22363		30.93 LBS / HR	

SACRAMENTO METROPOLITAN
 AIR QUALITY MANAGEMENT DISTRICT

ATTACHMENT C – VERIFICATION OF 45.5 TON FACILITY CAP.

YEAR _____

PERIOD		TOTAL LBS OF NOX
BEGINNING OF THE MONTH IN THE PREVIOUS YEAR	END OF THE CURRENT MONTH IN THE CURRENT YEAR	
FEBRUARY	JANUARY	
MARCH	FEBRUARY	
APRIL	MARCH	
MAY	APRIL	
JUNE	MAY	
JULY	JUNE	
AUGUST	JULY	
SEPTEMBER	AUGUST	
OCTOBER	SEPTEMBER	
NOVEMBER	OCTOBER	
DECEMBER	NOVEMBER	
JANUARY OF CURRENT YEAR	DECEMBER	

SACRAMENTO METROPOLITAN
AIR QUALITY MANAGEMENT DISTRICT

ATTACHMENT D – VERIFICATION OF 24.4 TON 1312 STRIKER AVE
CAP.

YEAR _____

MONTH	TOTAL HOURS PER MONTH OF MAINTENANCE & OPERATION FROM ALL ENGINES AT 1312 STRIKER AVE A	EMISSION FACTOR B	TOTAL LBS A X B
JANUARY		30.93 LBS / HR	
FEBRUARY		30.93 LBS / HR	
MARCH		30.93 LBS / HR	
APRIL		30.93 LBS / HR	
MAY		30.93 LBS / HR	
JUNE		30.93 LBS / HR	
JULY		30.93 LBS / HR	
AUGUST		30.93 LBS / HR	
SEPTEMBER		30.93 LBS / HR	
OCTOBER		30.93 LBS / HR	
NOVEMBER		30.93 LBS / HR	
DECEMBER		30.93 LBS / HR	

SACRAMENTO METROPOLITAN
AIR QUALITY MANAGEMENT DISTRICT

ATTACHMENT E – VERIFICATION OF 24.4 TON 1312 STRIKER AVE

PERIOD		TOTAL LBS OF NOX
BEGINNING OF THE MONTH IN THE PREVIOUS YEAR	END OF THE CURRENT MONTH IN THE CURRENT YEAR	
FEBRUARY	JANUARY	
MARCH	FEBRUARY	
APRIL	MARCH	
MAY	APRIL	
JUNE	MAY	
JULY	JUNE	
AUGUST	JULY	
SEPTEMBER	AUGUST	
OCTOBER	SEPTEMBER	
NOVEMBER	OCTOBER	
DECEMBER	NOVEMBER	
JANUARY OF CURRENT YEAR	DECEMBER	