



MOJAVE DESERT AIR QUALITY MANAGEMENT DISTRICT

14306 Park Avenue Victorville, CA 92392-2310
760.245.1661 -- 800.635.4617 -- FAX 760.245.2022

PERMIT TO OPERATE

B010805

Operation under this permit must be conducted in compliance with all information included with the initial application, initial permit condition, and conditions contained herein. The equipment must be maintained and kept in good operating condition at all times. This Permit to Operate or copy must be posted on or within 8 meters of equipment. If a copy is posted, the original must be maintained on site, available for inspection at all times.

EXPIRES LAST DAY OF: JULY 2026

OWNER OF OPERATOR (Co. #753)

Crawford Associates
2635 E Chanslorway Ave
Blythe, CA 92225

EQUIPMENT LOCATION (Fac. #1457)

Crawford Associates
7 miles N on Hwy 95 from Chanslorway Facility
Blythe, CA 92225

Description:

DIESEL IC ENGINE, GENERATOR consisting of: Year of Mfg 2006, USEPA Family Name CPKXL27.0ESL, Tier II, stack height 12.5', stack diameter 8", exhaust temperature 952.5 degrees Fahrenheit, exhaust flow rate 6014.1 acfm, under CARB EO U-R-001-0286. This engine is vented to a CleanAIR System PERMIT diesel particulate filter, Model No. FDA225, Serial No. 46035. This engine is equipped with a Avatron load bank, Model No. K711, Serial No. K711480-64-64-2F2G-K.

One Caterpillar, Diesel fired internal combustion engine Model No. C-27 and Serial No. MJE00111, producing 976 bhp with 12 cylinders at 1800 rpm while consuming a maximum of 46.0 gal/hr. This equipment powers a Caterpillar Generator Model No. C-27 DITA and Serial No. AFN01662, rated at 635 kW(e).

EMISSIONS RATES

Emission Type	Est. Max Load	Unit
CO	0.7457	gm/bhp-hr
NOx	4.1014	gm/bhp-hr
PM10	0.00895	gm/bhp-hr
PM2.5	0.00886	gm/bhp-hr
SOx	0.00451	gm/bhp-hr
TOG	0.20507	gm/bhp-hr
VOC	0.20507	gm/bhp-hr

Fee Schedule: 1 (c)

Rating: 976 bhp

SIC: 1429

SCC: 20200102

Location/UTM(Km):
725E/3273N

This permit does not authorize the emission of air contaminants in excess of those allowed by law, including Division 26 of the Health and Safety Code of the State of California and the Rules and Regulations of the District. This permit cannot be construed as permission to violate existing laws, ordinances, statutes or regulations of this or other governmental agencies. This permit must be renewed by the expiration date above. If billing for renewal fee required by Rule 301(c) is not received by expiration date above, please contact the District.

Crawford Associates
P.O. Box 807
Blythe, CA 92225

By: **COPY**
Eldon Heaston
Air Pollution Control Officer

CONDITIONS:

1. This certified, stationary, compression-ignited, internal combustion engine and control devices shall be installed, operated and maintained in strict accord with those recommendations of the manufacturer/supplier and/or sound engineering principles which produce the minimum emissions of contaminants. Unless otherwise noted, this equipment shall also be operated in accordance with all data and specifications submitted with the application for this permit.

[District Rule 204; 40 CFR 60.4211(a)]

2. This equipment shall only be fired on diesel fuel that meets the following requirements, or an alternative fuel approved by the ATCM for Stationary CI Engines:

a. Ultra-low sulfur concentration of 0.0015% (15 ppm) or less, on a weight per weight basis; and,

b. A cetane index or aromatic content, as follows:

(i) A minimum cetane index of 40; or,

(ii) A maximum aromatic content of 35 volume percent.

[District Rule 431; 17 CCR 93115.5(a); 40 CFR 60.4207(b); 40 CFR 1090.305]

Note: CARB certified ULSD fuel satisfies these requirements per 17 CCR 93115.5(a).

3. A non-resettable four-digit (9,999) hour timer shall be installed and maintained on this unit to indicate elapsed engine operating time.

[17 CCR 93115.10(d)(1); 40 CFR 60.4209(a)]

4. This engine shall not be operated more than twenty (20) hours per calendar day, nor more than 3,000 hours per consecutive 12-month period.

[District Rule 204; District Rule 1303(A): Daily BACT]

5. The owner/operator shall maintain an operations log for this unit current and on-site (or at a central location) for a minimum of five (5) years, and this log shall be provided to District, State and Federal personnel upon request. The log shall include, at a minimum, the information specified below:

a) Daily operation in terms of total hours per calendar day;

b) Consecutive 12-month operating hours as determined by the installed hour meter or fuel consumption (in gallons) to assist in CEI calculations and demonstrate compliance with Condition #4;

c) Fuel sulfur concentration (the owner/operator may use the supplier's certification of sulfur content if it is maintained as part of this log); and,

d) Records of all maintenance and repair actions performed on the engine and emissions control equipment.

[District Rule 204; 17 CCR 93115.10(e)]

6. The Diesel Particulate Matter (DPM) emission rate from this diesel ICE shall comply with one of the following:

a. 0.01 grams DPM per brake horsepower-hour, or less [17 CCR 93115.7(a)]; or,

b. A certified engine rating of 0.15 grams DPM per brake horsepower-hour, or less and install a verified control device with a diesel PM efficiency of 85% or more. [17 CCR 93115.13(f)]

7. The following sources of data may be used in whole or part to demonstrate compliance with the emissions standards or requirements of Conditions #6 and #7:

a) Off-road engine certification test data for the stationary diesel-fueled CI engine;

b) Engine manufacturer test data;

c) Emissions test data from a similar engine;

d) Emissions test data used in meeting the requirements of the Verification Procedure for the emission control strategy implemented; or,

e) An alternative compliance demonstration as described in section 93115.13(f).

[17 CCR 93115.13(a)]

8. As an alternative emission control strategy, the owner/operator shall install, operate and maintain the CleanAIR Systems, Inc. PERMT diesel particulate filter (DPF) on this engine in accordance with California Air Resources Board (CARB) Executive Order DE-05-002-02. Records of maintenance and repairs on this DPF must be kept in accordance with Condition #5.

[17 CCR 93115.13(f)]

9. A manufacturer installed diesel particulate filter shall be accompanied by a backpressure monitor that notifies the owner/operator when the high backpressure limit of the engine is approached.

[17 CCR 93115.10(d)(2); 40 CFR 60.4209(b)]

10. This Facility shall not emit more than 11.9 tons per year of PM10 and not more than 19.9 tons per year of NOx or VOC.

[District Rule 204; District Rule 1303(B): Offsets]

11. Facility-wide emissions of Federal Hazardous Air Pollutants or HAP, as listed in Section 112(b) of the Federal Clean Air Act (CAA), shall not exceed 7.9 tons per year for any single HAP and 19.9 tons per year for any combination of HAPs.

[District Rule 204; District Rule 1201(S): Definition of a Major Source]

12. This engine is subject to the requirements of 17 CCR 93115, the Airborne Toxic Control Measure (ATCM) for Stationary Compression Ignition Engines and 40 CFR 60, Subpart IIII - Standards of Performance for Stationary Compression Ignition Internal Combustion Engines (NSPS). In the event of a conflict between these conditions and the ATCM or NSPS, the more stringent requirements shall govern.

[District Rule 1302; 17 CCR 93115; 40 CFR 60, Subpart IIII]

13. A facility wide Comprehensive Emission Inventory (CEI) for all emitted criteria and toxic air pollutants must be submitted to the District, in a format approved by the District, upon District request.

[District Rule 107(b); H&S Code 39607 & 44341-44342; 17 CCR 93400 et seq.; 40 CFR 51, Subpart A]