Facility Name: Lakeside Union School District

Equipment Type: 34H – Emergency Diesel Engine

Application #: APCD2024-APP-008407

ID#: APCD2024-SITE-04626

Equipment/Facility Address: 9700 Riverview Avenue,

Lakeside CA 92040

Facility Contact: Lisa Davis, 619-390-2680

lisadavis@lsusd.com

Applicant Contact: Annette Lane, 858.486.1758

annette@gemindustrialinc.com

10/11/2024

X Hawzhin Muhamed

Hawzhin muhamed Assistant APC Engineer Signed by: E089831

Permit Engineer:

11/19/2024



Signed by: jherzig

Joseph Herzig Senior Air Pollution Control Engineer

Senior Engineer Signature:

1.0 Background

- **1.1 Type of Application:** New installation of a 158 bhp emergency diesel engine driving a 118-kW generator
- **1.2 Permit History:** This is the initial application for this equipment.
- **1.3 Facility Description:** This is a new technology building. This facility has another permit with SDAPCD at other site. No other applications are open at this site.
- **1.4 Other Background Info:** No hearing board actions, permit denials, legal settlements, open NOV, or nuisance complaints. This site is not a Title V facility.

2.0 Process Description

2.1 Equipment Description.

Emergency Diesel Engine: Manufacturer: John Deere

S/N: TBD

Model: 4045HF285I Model Year: 2024

Tier: 3

Engine Family: RJDXL04.5119

Equipped with aftermarket Diesel Particulate Filter (DPF) JM, Oxidation Catalyst,

MODEL#: SDPF-1-N-MS-BITO-A/A-LP Horsepower (maximum rated): 158 BHP

Driving a 118-kW emergency-use standby generator.

3.6-inch diameter, vertical exhaust with Flapper, 10 feet above ground.

2.2 Process Description.

This is a diesel-powered generator to be used in situations of emergency and for limited operations for maintenance and testing purposes.

2.3 Emissions Controls.

This is a Tier 3 certified diesel engine. It is equipped with an aftermarket, CARB Verified DPF Johnson Matthey, diesel particulate filter (DPF). This DPF also acts as a Diesel Oxidation Catalyst (DOC).

2.4 Attachments.

Generator and DPF specification sheets.

3.0 Emissions

3.1 Emissions estimate summary. Estimated emissions from the process are shown below. Table 1: Estimated PTE for criteria pollutants

Emission Hourly Daily **Factor Emissions Emissions Annual Emissions** g/bhp-hr lbs/yr Compound lbs/hr lbs/day tons/vear 2.51 0.87 20.95 0.02 43.65 NOx 0.19 0.07 0.00 3.38 CO 1.62 0.03 0.01 0.28 0.0003 0.58 **NMHC** PM 0.02 0.01 0.16 0.0002 0.331 0.00004 0.04162 SOx NA 0.00173 0.08672

3.2 Estimated Emissions Assumptions.

- Table 1 evaluates the emission unit assuming full load operations, 24 hours per day and total of 50 hours per year.
- Manufacturer-provided emissions were EPA certified emission factors.
- Standard toxics emission factors for diesel engines (see method E15).
- 15 ppmw sulfur fuel

- Expected actual emissions same as PTE.
- Other standard assumptions as stated in calculation sheets.

3.3 Emissions Calculations.

Calculations were performed using the attached spreadsheets using standard calculation methods.

3.4 Attachments.

Emission Calculations.

4.0 Applicable Rules

4.1 District Prohibitory Rules

Emergency diesel engines at non-major sources are subject to the following District prohibitory rules: 50, 51, 53, 62 and 69.4.1. The proposed engine is expected to comply with all applicable requirements as shown in the table on the following page with standard permit conditions for this equipment type.

	Table 3	: Prohibitory	Rule Discussion	
Applicable Section	Requirement	Engine Complies?	Explanation	Condition
	Visible Emissions not to exceed	-	Compliance with this requirement is achieved	
	20% opacity or Ringlemann 1 for		through the use of an EPA certified engine,	
D 1 50	more than 3 minutes in a 60	***	and permit conditions will specify this	G20412
Rule 50	minute period	Yes	requirement.	C28413
			Due to the intermittent operation of an	
			emergency engine that meets all emission	
			requirements, it is anticipated that this will not	
	Cannot cause or contribute to a		cause a public nuisance. Permit conditions will prohibit this engine from causing a public	
Rule 51	public nuisance	Yes	nuisance.	C28414
Kule 51	Emissions of sulfur compounds	168	nuisance.	C20414
	calculated as SO2 on a dry basis		Permit conditions will require use of CARB	
	shall not exceed 0.05 % by volume		diesel fuel (15 ppm Sulfur by weight), which	
Rule 53	on a dry basis.	Yes	will ensure compliance with this requirement.	C28412
Ruic 22	on a dry busis.	105	Permit conditions will require use of CARB	C20112
	Sulfur content of liquid fuel shall		diesel fuel (15 ppm Sulfur by weight), which	
Rule 62	not exceed 0.5 % sulfur by weight.	Yes	will ensure compliance with this requirement.	C28412
Rule 69.4.1				
	Emission standards for NOx and			
	CO emissions. For a new or			
	replacement certified diesel			
	engine, NOx emissions shall not			
	exceed: 3.5 g/bhp-hr if			
	50\leq bhp<100; 3.0 g/bhp-hr if			
	100≤bhp<175; 3.0 g/bhp-hr if			
	175≤bhp<750; 4.8 g/bhp-hr if			
	bhp≥750. For a new or		Use of an EPA certified tier 3 engine (tier 2 for	
	replacement certified diesel		engines with a rated power in excess of 750	
	engine, CO emissions shall not		bhp) ensures that NOx emissions comply with	
69.4.1(d)(1)(ii)(E)	exceed: 3.7 g/bhp-hr if	Yes	this requirement.	NA

	50\leq bhp<100; 3.7 g/bhp-hr if 100\leq bhp<175; 2.6 g/bhp-hr if 175\leq bhp<750; 2.6 g/bhp-hr if			
	bhp≥750.			
	Engines operated on diesel fuel		Permit conditions will require use of CARB	
69.4.1(d)(2)	shall use only California Diesel Fuel.	Yes	diesel fuel (15 ppm Sulfur by weight), which will ensure compliance with this requirement.	C28412
0>111(4)(2)	All engines must be equipped with	105	win ensure compinance with this requirement.	020112
	a non-resettable totalizing fuel or			
	hour meter which shall be replaced		Permit conditions will require installation of a	
	in accordance with subsection		non-resettable hour meter and specify the	
69.4.1(e)(3)	(g)(7) of this rule.	Yes	requirements for replacement.	C28419
	The owner or operator must			
	conduct specific maintenance on			
	the engine and control equipment, including oil change/analysis, and			
	checking hoses and belts.			
	Maintenance is required according			
	to engine/control equipment			
	manufacturer's instructions or		Annual maintenance of engine according to	
	other written procedure, at least		written procedure will be required by permit	
69.4.1(f)(2)	once each calendar year.	Yes	conditions.	C43433
			Manufacturer and model number, brake	
			horsepower rating, combustion method and	
			fuel type are contained in the permit	
			application. Documentation of CARB diesel fuel certification and manual of recommended	
	Specifies engine information that		maintenance will be specified in permit	
69.4.1(g)(1)	must be maintained on-site.	Yes	conditions.	C45251
(g) (=)	Requires keeping an operating log			0.000
	containing dates and times and			
	purpose of each period of engine			
	operation, cumulative operation of		Compliance with this provision is expected and	
60.44(engine for each calendar year and		this requirement is specified in permit	
69.4.1(g)(2)	maintenance records including	Yes	conditions.	C45252

	dates maintenance is performed.			
	Engines within 500 feet of schools			
	must record the time of day when			
	the engine is operated for testing			
	and maintenance. Specific records			
	for internal, external, and partial			
	external power outages is required.			
	Requires records of the dates and			
	times when fuel is being			
	combusted and cumulative			
	operating time if claiming a		The applicant has not claimed a	
69.4.1(g)(6)	commissioning exemption.	NA	commissioning period is needed.	NA
	Demains and Gradien to ADCD			
	Requires notification to APCD		Compliance with this provision is expected and	
	within 10 calendar days of		this requirement is specified in permit	~~~
69.4.1(g)(7)	replacing an hour meter.	Yes	conditions.	C28419
	Requires specified records to be			
	maintained on-site for at least		Compliance with this provision is expected and	
	three years and made available to		this requirement is specified in permit	
69.4.1(g)(9)	the District upon request.	Yes	conditions.	C43432
	Requires periodic source testing to			
	confirm compliance with		This subsection does not apply to certified	
69.4.1(i)(1)	applicable emission standards.	NA	emergency engines.	NA

4.2 New Source Review (NSR) Rule 20.1-20.4

This application is subject to District NSR rules. This site is considered a non-major stationary source, for each pollutant, as shown in the following table, and is therefore subject to District Rule 20.2. Calculation of emissions and determination of applicable requirements is performed in accordance with District Rule(s) 20.1 through 20.3.

Table 4: Classification of Major/PSD Source and Modification New Source Review (NSR) Requirements

	NOx	voc	PM-10	PM-2.5	SOx	CO	Lead
Major Source Threshold (ton/year)	50	50	100	100	100	100	100
Major Source? (yes/no)	No	No No	No No	No	No	No	No No
Major Modification Threshold (ton/year)	25	25	15	10	40	100	0.6
Major Modification at a Major Source?	No	No No	No No	No No	No	No	No.0
Contemporaneous Calculations Performed?	No	No	No	No	No	No	No
Federal Major Stationary Source Threshold (ton/year)	110	110	110	110	110	110	110
(Severe non-attainment status)	25	25	100	100	100	100	100
Federal Major Stationary Source?	No	No	No	No	No	No	No
Federal Major Modification Threshold (ton/year)	110	110	110	110	110	110	110
(Severe non-attainment status)	25	25	15	10	40	100	0.6
Federal Major Modification?	No	No	No	No	No	No	No
Contemporaneous Net Calculations Performed	No	No	No	No	No	No	No
PSD Threshold (ton/year)	250	250	250		250	250	
PSD Modification Threshold (ton/year)	40	40	15		40	100	0.6
PSD New or Modification?	No	No	No	No	No		No

District Rule 20.2 contains requirements for Best Available Control Technology (BACT), Air Quality Impact Assessment (AQIA), Prevention of Significant Deterioration (PSD) and public notification. No requirements of this rule apply as shown in the table on the following page.

	Table 5: New	Source Rev	iew Discussion	
Rule/Requirement	Requirement	Applicability	Discussion	Condition
			This is not a major	
	Rule 20.2 applies to		source, so Rule 20.2	
Applicability	non-major sources	Yes	applies.	NA
Type of				
application	New	Yes	NA	NA
	No exemptions			
T (*	apply to this	27.4	NA.	NIA
Exemptions	equipment	NA	NA	NA
20.2(d)(1) - BACT			,	T
			The potential to emit for	
	Installation of		this pollutant is 20.95	
	BACT is required if	Triggered,	lbs/day, which exceed this	
	emissions of NOx	see discussion	trigger level, so BACT is	
BACT - NOx	exceed 10 lbs/day	below	required.	NA
	Installation of		The potential to emit for	
	BACT is required if	Not	this pollutant does not	
	emissions of VOC	Triggered, no	exceed this trigger level,	
BACT - VOC	exceed 10 lbs/day	permit limit	so BACT is not required.	NA
	Installation of		The potential to emit for	
	BACT is required if	Not	this pollutant does not	
DACE DAGA	emissions of PM-10	Triggered, no	exceed this trigger level,	27.4
BACT - PM-10	exceed 10 lbs/day	permit limit	so BACT is not required.	NA
	Installation of		The potential to emit for	
	BACT is required if	Not	this pollutant does not	
DACT CO-	emissions of SOx	Triggered, no	exceed this trigger level,	NIA
BACT - SOx	exceed 10 lbs/day	permit limit	so BACT is not required.	NA
20.2(d)(2) – AQIA	I =	Г		T
	Required for			
	project emission		The increase in emissions	
	increases in excess		of this air contaminant	
	of 25 lbs/hr, 250		from this project does not	
	lbs/day or 40 ton/yr		exceed any of these	
AOIA NO-	of NOx calculated	Not Take and 1	levels, so no AQIA is	NIA
AQIA - NOx	as NO2	Not Triggered	required.	NA
	Daminad for		The increase in emissions	
	Required for		of this air contaminant	
	project emission increases in excess		from this project does not	
			exceed any of these	
AQIA - PM-10	of 100 lbs/day or 15	Not Triggered	levels, so no AQIA is required.	NA
AVIA - I M-10	ton/yr of PM-10	110t Higgered	The increase in emissions	11/1
	Required for		of this air contaminant	
	project emission		from this project does not	
	increases in excess		exceed any of these	
	of 25 lbs/hr, 250		levels, so no AQIA is	
AQIA - SOx	lbs/day or 40 ton/yr	Not Triggered	required.	NA
AUA - SUX	105/day 01 40 toll/yr	Tiot Higgered	required.	11/17

	of SOx calculated as SO2			
AQIA - CO	Required for project emission increases in excess of 100 lbs/hr, 550 lbs/day or 1000 ton/yr of CO	Not Triggered	The increase in emissions of this air contaminant from this project does not exceed any of these levels, so no AQIA is required.	NA
20.2(d)(3) - PSD	Applicable to source that may have a significant impact on a class I area	NA	This is not a PSD source and emissions are not expected to impact a class I area	NA
20.2(d)(4) - Public	Requires 30 day public notice if an AQIA was required or if increase in VOC emissions from the project exceed 250 lbs/day		AQIA was not required and VOC emission increase from this project does not exceed these	
Notice	or 40 ton/year	NA	levels.	NA

20.2(d)(1) - BACT

The PTE for NOx is 20.95 lbs/day based on 24 hours of non-emergency operation, which is greater than the 10 lbs/day threshold for BACT. Alternatives that were considered include natural gas and propane engines, Tier 4F engines including SCR and DPF, and installing an add-on DOC to control VOC. Gas-fueled engines are not feasible as backup power for operations that must occur if natural gas lines are damaged in the event of an emergency like an earthquake. An engine of this size would also likely require SCR for NOx emissions control and DOC for VOC emissions control, methods which are not cost effective as described below. The cost-effectiveness evaluation did not take into account the likely short periods of operation of this engine for maintenance. In many maintenance situations, the engine is operated at low loads and for approximately 30 minutes, some of which the SCR catalyst has not reached appropriate temperature for effectively controlling emissions.

NOx Analysis:

A tier 4 engine is the lowest emitting BACT option. Cost-effectiveness has previously been evaluated under applications APCD2021-APP-006831, and APCD2021-APP-006981, comparing incremental costs of a tier 2 vs. 4 engine, the results of which are summarized below. Note that this analysis is conservative and does not take into account the likely short periods of operation of this engine for maintenance as noted above which would lower the level of emission reductions achieved.

Project	Engine Size (bhp)	Capital Cost Tier	Capital Cost Tier 4	Annual Cost Tier 2	Annual Cost Tier 4	Annual Incremental Cost	Annual Emission Reduction (lb/yr)	Cost Effectiveness
6831	2346	\$329.050	\$603,826	\$127,026	\$200.228	\$73,202	1.112	\$65.82
6981	2937	\$810,000	\$1,200,000	\$131,824	\$195,294	\$63,471	1,322	\$48.03

This analysis shows that a Tier 4F engine, the lowest-emitting category of diesel engines, is not cost-effective. The analysis is based on the assumption that the engine allowed to run up to 50 hours per year for maintenance and testing, the maximum NOx emissions were calculated using the emission standards for a tier 2 and tier 4 engine. Capital costs were provided by the permit applicants which were annualized and added to expected maintenance and operating costs to determine an overall annual cost. While the previous analysis was conducted for larger engines, it is still representative for this application too because the equipment is very similar aside from engine size, and NOx emissions and costs are expected to scale roughly linearly with engine size. Additionally, the cost for an add-on SCR to a tier 2 engine is expected to have a similar cost to the incremental cost of a tier 4 engine, so this analysis also demonstrates that use of an SCR would not be cost effective, in addition to being technologically infeasible because it would not function during most periods of testing and maintenance.

A tier 3 certified engine is the next lowest emitting option and therefore satisfies BACT requirements for NOx.

20.2(d)(2) - AQIA

No AQIA limits were triggered by this engine, therefore no AQIA is required for this project.

4.3 Toxic New Source Review - Rule 1200

District Rule 1200 applies to any application that is part of a project which results in an emission increase of toxic air contaminants. The rule limits the increase in acute and chronic health hazard index (HHI) to no more than one from the project and limits the increase in cancer risk from the project to no more than one in one million if the engine is not equipped with Toxics BACT (T-BACT) or no more than ten in one million if the project meets T-BACT requirements. The following table contains an in-depth review of Rule 1200 requirements. If a refined HRA was required, the HRA report is attached.

Table 6a: Rule 1200 Applicable Requirements and Discussion

Question	Answer	Discussion
		The application does result in an increase in toxic
Does the application		emissions of specific trace heavy metals and organics (as
result in an increase in		shown in emission calculations section). See HRA for
toxic emissions?	Yes	detail.
Do any special		
exemptions apply to		
this equipment?	No	No exemptions apply to this equipment
Are there any other		
applications that are		
part of the project?	No	NA
What type of HRA was		Engine passed de minimis evaluation. See calculations
used?	De Minimis	sheet.
Is the Project Equipped		
with T-BACT?	Yes	This engine is equipped with a DPF verified by CARB.
Cancer Risk increase		
(per one million)	0.18	Meets standard of one.
Chronic HHI	0.03	Meets standard of one.
Acute HHI	0.05	Meets standard of one.
		Maintenance and testing (non-emergency operation) must
		be limited by permit conditions to 50 hours per calendar
Passes Rule 1200?	Yes	year.

Based on this analysis, the proposed engine complies with all applicable requirements of District Rule 1200.

4.4 AB3205

Requirements in the California Health and Safety Code in sections 42301.6 through 42301.9 (a.k.a. "AB3205 requirements") specify that prior to issuing an authority to construct for sources located within 1000 feet of a K-12 school, a 30-day public notification process must be conducted.

This project is located within 1000 feet of two schools (River Valley High School and Lakeside Middle School), so public notice is required for this section. A copy of the public notice is attached to the file and when the notice is issued, this evaluation and relevant attachments will be made available on the District's website for review. If any

comments are received, they will be reviewed, considered and responded to prior to taking action on the permit including revising any requirements as necessary in response to comments received.

4.5 State and Federal Regulations.

This engine is subject to both the State Air Toxic Control Measure for Stationary Engines (Stationary ATCM) and federal EPA issued National Emission Standards for Hazardous Air Pollutants (NESHAPs) and New Source Performance Standards (NSPS).

Applicable requirements of the Stationary ATCM include purchasing an engine certified to EPA standards and meeting specified emission standards of the rule, installing an hour meter, conducting maintenance according to a written plan, restrictions on operating the engine for purposes other than emergency use and limited (50 hours/year) use for maintenance and testing, and maintaining records to substantiate compliance with these requirements. This engine is expected to comply with all these requirements as described in the detailed analysis shown in the table following the discussion of NESHAP/NSPS requirements.

The NESHAP (subpart ZZZZ) requires that all new emergency engines comply with the rule by complying with the NSPS (subpart IIII). Applicable requirements of the NSPS include purchasing a certified engine, operating it as directed by the manufacturer, and maintaining records to substantiate compliance. These requirements closely mirror the ATCM requirements, except that the NSPS is somewhat less stringent in regards to allowable PM emission rate and contains some allowance for other types of operation not allowed by the ATCM. This means the more stringent ATCM requirements apply. A detailed analysis of NESHAP and NSPS requirements is shown in the following table.

Table 7a: State and Federal Requirement Discussion – Stationary ATCM					
Applicable Section	Requirement	Engine Complies/Expect ed to Comply?	Explanation	Condition	
Stationary ATCM					
93115.3	There are no exemptions that apply to this engine	NA	This engine is not one of the engines exempted from any applicable requirements	NA	
93115.4	Definitions. Permit conditions ensure that the engine only operates in a manner allowed for engines designated as "Emergency Standby"	Yes	Permit conditions require that the engine operate only as an emergency engine	C40239	
93115.5	Requires the use of CARB diesel as fuel.	Yes	Permit conditions will require use of CARB diesel fuel (15 ppm Sulfur by weight), which will ensure compliance with this requirement.	C28412	
93115.6 (a)(1)	Prohibits non-emergency operation of an emergency engine between 7:30 AM and 3:30 PM during school days if within 500 feet of school and during all school sponsored activities if located on school grounds. This rule does not apply if the engine emits no more than 0.01g/bhp-hr of diesel PM.	Yes	Permit conditions specify this requirement.	C28415	
	Allows for engine to be started 30		Permit conditions specify this	~~~~	
93115.6(a)(2) 93115.6(a)(3)(A)(1)(b)	minutes prior to rotating outage Requires that all engines used for emergency purposes be certified to at least tier 3 standards (tier 2	Yes	requirement. Use of an EPA certified tier 3 engine (tier 2 for engines with a rated power in excess of 750 bhp) with PM emission	C28560 NA	

	for engines with a rated power in		below this level satisfies this	
	excess of 750 bhp) and have Disel		requirement.	
	PM emissions less than 0.15			
	g/bhp-hr			
	Restricts maintenance and testing			
	operation to no more than 50		Permit conditions specify this	
93115.6(a)(3)(A)(1)(c)	hours per calendar year	Yes	requirement.	C28643
	Does not allow emergency			
	standby engines to operate as part			
	of "demand response programs"			
	unless additional requirements are		Permit conditions specify this	
93115.6(c)	met	Yes	requirement.	C40907
	Requires that specified		The submitted application contained all	
	information is submitted to the		of the required contact/location	
	District as part of application		information, engine data, and emission	
93115.10(a)-(b)	package	Yes	information	NA
	Requires installation of a non-			
	resettable hour meter and for			
	engines with DPFs, a		Permit conditions require the	
	backpressure monitor that alerts		installation and use of a non-resettable	
	the operator when the		hour meter. Permit conditions require	
	backpressure limit of the engine		installation and use of a backpressure	C40721,
93115.10(d)	is approached	Yes	monitor between the engine and DPF.	C28419
	Specifies that the owner or			
	operator must keep records and			
	prepare a monthly summary of			
	hours of operation and purpose			
	(emergency, maintenance and			
	testing, emission testing, start-up			
02115 10(6)	testing, other, demand response)	V	The engine meets the PM standard and	C45252
93115.10(f)	of each period of operation	Yes	also uses a DPF verified by CARB.	C45252
			Permit conditions require that documentation of the CARB diesel	
	Deguines mesends of CADD discol			
02115 10(f)	Requires records of CARB diesel	Vac	certification for all fuel used be	C42424
93115.10(f)	fuel certification	Yes	maintained	C43434

93115.10(f)	States that records must be kept on-site for at least 24 months and off-site for an additional 12 months (total 36 months)	Yes	Compliance with this provision is expected and this requirement is specified in permit conditions.	C43432
30120(Z)	Allows the use of certification data or other emission test data to demonstrate compliance with		The manufacturer's engine rating specific emission data plus DPF emission reduction guarantee were used to determine compliance and for	0.0.02
93115.13(a)	emission limits	Yes	emission calculations	NA
	For engines equipped with DPFs, allows the use of an engine certified to a PM-10 emission level of no more than 0.15 g/bhp-hr and a verified DPF in lieu of source testing (or other alternative		The engine meets the PM standard and	
93115.13(f)	means as listed)	Yes	also uses a DPF verified by CARB.	NA

Table 7b: State and Federal Requirement Discussion						
Applicable Section	Requirement	Engine Complies/Expected to Comply?	Explanation	Condition		
NESHAP ZZZZ	2000	vo compiy	2	0 011011011		
40 OFF (2 (500 d.) ()	Requires that new emergency engines comply with the NESHAP by complying with		g yang i li			
40 CFR 63.6590(b)-(c)	the applicable NSPS	Yes	See NSPS section below.	NA		
NSPS IIII		1				
40 0777 60 4007	Requires that engines meet emission limits equivalent to tier 3 levels (tier 2 for engines		Use of an EPA certified tier 3 engine (tier 2 for engines with a rated power in excess of 750 bhp) satisfies this			
40 CFR 60.4205	750 bhp or higher)	Yes	requirement.	NA		
40 CFR 60.4207	Sets maximum fuel sulfur limits for fuel equivalent to CARB diesel requirements	Yes	Permit conditions will require use of CARB diesel fuel (15 ppm Sulfur by	C28412		

			weight), which will ensure compliance with this requirement.	
	Requires installation of a non-		Permit conditions require the installation and use of a non-resettable	
40 CFR 60.4209	resettable hour meter	Yes	hour meter.	C28419
	Requires that the engine be operated according to manufacturer's emission related instructions and that no changes are made to emission			
	related settings unless allowed		Permit conditions specify this	
40 CFR 60.4211(a)	by manufacturer	Yes	requirement.	C43433
40 CFR 00.4211(a)	Requires that the engine be	168	Use of an EPA certified tier 3 engine	C43433
	certified under EPA		(tier 2 for engines with a rated power in	
40 CFR 60.4211(c)	regulations	Yes	excess of 750 bhp).	NA
40 CFR 60.4211(e)	Restricts operation of emergency engines for non-emergency purposes Requires records of operation	Yes	Compliance ensured by permit conditions for ATCM limiting operation for maintenance and testing to no more than 50 hours per calendar year and restricting non-emergency operation for only those uses allowed by the permit (maintenance and testing). ATCM requirements more stringent than NSPS.	C40239, C40907, C28643
	to show that engine is operated		Compliance is expected and specified in	
40 CFR 60.4214(b)	as an emergency engine	Yes	permit conditions.	C45252
	For engines with DPFs,		The engine is a certified Tier 3 engine that uses an aftermarket DPF. The engine is equipped with a backpressure monitor to ensure proper operation of the DPF which fulfills this requirement.	
	requires records of corrective		Permit conditions specify following	
	actions taken when the high		manufacturer's instructions which	C43433
	backpressure limit is		ensures compliance with this	C40145
40 CFR 60.4214(c)	approached	NA	requirement	C40721

			Compliance with this provision is	
	Requires that all records be		expected and this requirement is	
40 CFR 60.7(f)	maintained for at least 2 years	Yes	specified in permit conditions.	C43432

ENGINEERING EVALUATION ATTACHMENTS

4.6 Title V.

This is not a Title V facility therefore this requirement does not apply.

5.0 Recommendations

This equipment is expected to comply with all rules and regulations, and therefore it is recommended, pending completion of the AB3205 noticing and comment process, that an authority to construct be issued with the following conditions.

6.0 Recommended Conditions

Standard BEC APCD2020-CON-001714 is recommended with 50 hour/year limit for non-emergency/maintenance and testing use and a backpressure limit of 30 inches of water.