

DOCKETED

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Project Title:	COMPLIANCE-Luz Solar Electric Generating System Cogeneration AFC (150 MW) Units III-VII.
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Document Title:	SEGS III - VII 2020 Annual Compliance Report
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NextEra Energy Operating Services, Inc., 41100 US Highway 395, Boron, CA
93516
760-762-5562

February 16, 2021

Mr. John Heiser
Compliance Project Manager (87-AFC-1C)
California Energy Commission
1516 Ninth Street (MS-2000)
Sacramento, CA 95814-5512

Dear Mr. Heiser:

Please find attached the Annual Compliance Report for the calendar year 2020 for operations at the Kramer Junction site, SEGS III-VII. The specific compliance conditions addressed are noted within the report.

Sincerely,

A handwritten signature in black ink that reads "Glen T. King".

Glen T. King
Environmental Specialist
Agent for
LUZ Solar Partners III - VII

cc: file

2020 COMPLIANCE REPORT

SEGS III-VII

I. CURRENT PROJECT STATUS

The SEGS VI and VII facilities were placed into cold layup in the fourth quarter of 2018 and the SEGS III – V facilities were placed in cold layup October 31, 2019.

The SEGS VI and SEGS VII facilities were placed in cold lay up in October 2018 and November 2018, respectively, per Cold Lay Up Plan submitted to the California Energy Commission (CEC). The SEGS III – V facilities were placed in cold lay up in October 2019 per the updated Cold Lay Up Plan submitted to the CEC.

The facility remained in cold lay up throughout 2020. All remaining HTF was removed from all five solar fields and Power Blocks during the first quarter of 2020.

Renewed AQMD permits are pending, and copies of previous permits are attached to this report, per COC 1-16 and 1-35.

II. Compliance Condition Reports

Condition 1-11

AQMD Rules

The SEGS III-VII projects have maintained compliance with all applicable rules and regulations of the MDAQMD during 2020.

The CEC-CPM has been provided copies of all agency correspondence, where required by Conditions of Certification.

Condition 1-12

CFR Rules

Audits of the CEMS were not performed during year at the SEGS III – VII facilities. The Monitoring Plan reports were submitted for each calendar quarter, which included outages, drift and exceedence reports.

Conditions 1-19, 11-14

Malfunctions/Spill Reports

During 2020, there were 44 shipments of hazardous waste from the site. All transporters and disposal facilities are certified, and appropriate manifests were submitted.

The solid wastes were transported to Clean Harbors Buttonwillow, CA. A total of 8.23 tons of contaminated debris was transported in the shipments.

The liquid wastes were transported to the recycling facility at Demenno/Kerdoon Compton, CA, Asbury Environmental Fontana, CA, and US Ecology Beatty, NV. The shipments consisted of used oil, HTF, diesel, sulfuric acid, and sodium hydroxide with a combined total of 811.78 tons.

Condition 1-24 **Compliance Tests**

Annual emission compliance tests for SEGS III - V were not performed due to cancellation of the boiler permits.

Condition 1-25 **Natural Gas Source**

The auxiliary heaters have used only commercial grade natural gas fuel. The gas was purchased from NextEra Power Marketing and delivered through Pacific Gas and Electric (PG&E).

Condition 1-29 **Emissions Monitoring Report**

Reports of all Monitoring Plan reporting requirements were submitted to MDAQMD within 30 days following the end of each calendar quarter, with copies provided to CEC-CPM, EPA and CARB.

Condition 1-33 **Diesel Fuel Usage**

Diesel fuel usage amounts, BTU content, and sulfur content are listed below for all diesel fuel purchased during the reporting period.

Date	Quantity Gal.	Sulfur Content ppm	BTU Content BTU/gal
2/12/2020	600	15	134000

Condition 6-2 **Evaporation Pond Monitoring**

Monitoring reports have been submitted to LRWQCB on a semi-annual basis, as is required per the conditions of the permit issued April 3, 1997. Copies of these reports were submitted under separate cover.

Condition 11-1, 11-8 **Waste Disposal Verification**

Pursuant to all applicable Laws, Ordinances, Regulations and Standards (LORS), Luz Solar Partners III - VII is handling and disposing of all wastes (hazardous and non-hazardous) within all known compliance parameters.

Applicable hazardous waste manifests were submitted to Cal-EPA Department of Toxic Substances Control as per requirements. Submittal of copies of these manifests to CEC is no longer required, per verbal communication with CEC-CPM June 13, 1991. A summary of waste generation is shown in tabular form per Condition 11-6.

Condition 11-6 **Waste Summary Report**

Non-Hazardous Wastes

Sanitary Wastes

No significant amount of wastes from chemical toilets was disposed of off-site.

Approximately 300,000 gallons of wastewater from flush facilities were discharged to on-site leach fields.

Municipal Wastes Approximately 1,100 cubic yards of uncompacted rubbish were disposed of off-site.

Hazardous Wastes

Liquid Wastes 811.078 tons of liquid waste materials were removed for off-site recycling at a permitted hazardous waste recycling facility.

Solid Wastes 8.23 tons of solid waste materials were removed for disposal at permitted Class 1 landfills.

Condition 11-10

HTF Accounting

The table that follows represents an accounting of heat transfer fluid (Therminol VP-1 and Dowtherm A) at each of the SEGS Units III through VII. The inventory figures are based on data collected over the reporting period. The inventory volumes are corrected to the HTF density at 100°F. Due to variations in the temperature profile of each solar field and interpretation of level indicators, the numbers presented here are subject to a possible error of 2.5% or more as can be seen by the very large variation year over year in the table. It is a practice to periodically transfer HTF between SEGS units; therefore, a site total inventory is shown.

Reportable Spills are incidents in which more than 20 gallons are spilled onto the soil and/or a significant vapor release occurs. Non-reportable spills are either incidental amounts or are completely contained.

HTF INVENTORY					
December 31, 2019 - December 31, 2020					
<i>(Quantities Shown in Gallons)</i>					
SEGS	Inventory December 2019	Inventory December 2020	HTF Purchased	Reportable Spills (gal.)	Non-Reportable Spills (gal.)
III	53,700	0*	0	0	0
IV	51,450	0*	0	0	0
V	63,000	0*	0	0	0
VI	0	0*	0	0	0
VII	0	0*	0	0	0
Storage	0	0	0	---	---
Site Totals	168,150	0	0	0	0

* December 2020 inventory amounts reflect shipments made to World Oil for recycling from all five plants. During the year, SEGS III shipped 50,733 gallons, SEGS IV shipped 63,195 gallons, and SEGS V shipped 69,507 gallons to World Oil.

Condition 12-9

Fire Program Examination

The mutual aid agreement between the San Bernardino County Fire Department and KJC Operating Company (KJC OC) was renewed in April 2002. This agreement was cancelled in 2010 by the new site owners.

Condition 14-1

SCE T-Line Inspection

A letter requesting a copy of the most recent Sungen/Kramer transmission line annual inspection report was submitted to Southern California Edison July 17, 1990. The reply received July 27, 1990 stated that SCE does not provide such records to any outside agency or organization. The letter did describe SCE's inspection procedure. A copy of this letter was attached to the annual report submitted August 1991.

Condition 14-4

Induced Voltage Complaints

There have been no complaints to date from property owners or the public regarding problems due to induced voltage on vehicles, irrigation equipment, or any other objects within the power line right-of-way. Therefore, there are no records from which to gather a summary.

Condition 14-5

Radio Interference Complaints

There have been no complaints of, nor does Luz Solar Partners III - VII know of, any occurrences of radio and television interference attributed to our transmission line facilities. Therefore, there are no case files from which to compile a summary of corrective actions.

Condition 14-6

Transmission Line Inspection

The Kramer site transmission lines were inspected December 2020 and were found to be free of waste material, rubbish and significant vegetation. The inspection included transmission lines both inside and outside of the site perimeter fence.

Condition 19-1, 19-2

Production Data Report

A report of the required production data for 2020 is not included with this report as no production occurred during the reporting period.

Condition 24-1

Transportation Permits

Luz Solar Partners III - VII did not obtain or receive any transportation permits during the 2020 calendar year.

Luz Solar Partners III - VII does not independently transport hazardous or oversized loads over public highways; therefore, Luz Solar Partners III - VII has not applied, nor intends to apply, for a permit of this type. All loads received or commissioned to be delivered to our facilities, which are subject to such D.O.T., Cal-Trans or Highway Patrol permits, are obtained by and are the responsibility of the transporter providing that service.

III. FUTURE COMPLIANCE ACTIVITIES

There are no compliance activities planned for the 2021 calendar year beyond the normal monitoring and reporting.

IV. AGENCY SUBMITTALS

Correspondences with other governmental agencies are listed below. For those items where the Conditions of Certification require that copies be provided to the CEC, copies have already been provided or a copy is attached (denoted as “att.”).

DATE	TO	FROM	SUBJECT
Jan 20	LRWQCB	LSP III - VII	Pond Monitoring Report
Jan 20	LRWQCB	LSP III - VII	Bioremediation Report
Jan 20	MDAQMD	LSP III - VII	Emission Monitoring
Apr 20	MDAQMD	LSP III - VII	Emission Monitoring Report
May 20	MDAQMD	LSP III - VII	Title V Report
Jul 20	LRWQCB	LSP III - VII	Bioremediation Report
Jul 20	LRWQCB	LSP III - VII	Pond Monitoring Report
Jul 20	MDAQMD	LSP III - VII	Emission Monitoring Report
Sep 20	MDAQMD	LSP III - VII	Emission Compliance Test Report
Oct 20	MDAQMD	LSP III - VII	Emission Monitoring Report
Nov 20	MDAQMD	LSP III - VII	Title V Compliance certification
Dec 20	MDAQMD	LSP III - VII	Title V Report
Jan 21	LRWQCB	LSP III - VII	Bioremediation Report
Jan 21	LRWQCB	LSP III - VII	Pond Monitoring Report
Jan 21	MDAQMD	LSP III - VII	Emission Monitoring Report

Abbreviations

LSP III - VII	Luz Solar Partners III - VII
LRWQCB	Lahontan Region Water Quality Control Board
MDAQMD	Mojave Desert Air Quality Management District
SBC Fire	San Bernardino County Fire Department

**MDAQMD
PERMITS-TO-OPERATE**





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

B009350

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: JANUARY 2021

OWNER OR OPERATOR (Co. #277)

FPL Energy Solar Partners III-VII, LLC
41100 Highway 395
Boron, CA 93516

EQUIPMENT LOCATION (Fac. #941)

SEGS (III through VII)
41100 Highway 395
Boron, CA 93516

Description:

PORTABLE IC ENGINE, DIESEL AIR COMPRESSOR 02 consisting of: Model Year 2010, Tier III Engine Family AJDXL04.5112

One John Deere, Diesel fired internal combustion engine Model No. 4045TF and Serial No. PE4045L109852, producing 85 bhp with 4 cylinders at 2500 rpm while consuming a maximum of 5 gal/hr. This equipment powers a Sullair Compressor Model No. 250PJD and Serial No. 2903, rated at 150 psi.

EMISSIONS RATES

Emission Type	Est. Max Load	Unit
CO	0.158	lbs/hr
NOx	0.55	lbs/hr
PM10	0.043	lbs/hr
SOx	0.001	lbs/hr
VOC	0.029	lbs/hr

CONDITIONS:

1. This equipment 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

Fee Schedule: 1 (b)

Rating: 85 bhp

SIC: 4911

SCC: 20200102

Location/UTM(Km):
450E/3874N

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.

FPL Energy Solar Partners III-VII, LLC
41100 Highway 395
Boron, CA 93516

By:
Brad Poiriez

Air Pollution Control Officer

application for this permit.

2. This diesel ICE and its associated equipment cannot be operated at the same footprint (spot) for more than 365 consecutive days. (This system must be moved within this facility or moved to another facility annually.)

3. This unit shall only be fired on ultra-low sulfur diesel fuel, whose sulfur concentration is less than or equal to 0.0015% or 15 ppm on a weight per weight basis per CARB Diesel or equivalent requirements. (Title 17 CCR Section 93116.3(a))

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

5. This engine shall not be operated for more than 3 hours in any calendar day (24 hour period) and more than 100 hours in any rolling 12 month year.

6. The o/o shall maintain a operations log for this unit current and on-site (or at a central location) for a minimum of three (3) 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. Date of each use and duration of each use (in hours);
- b. Reason for use (testing & maintenance, emergency, required emission testing);
- c. Calendar year operation in terms of fuel consumption (in gallons) and total hours; and,
- d. Fuel sulfur concentration (the o/o may use the supplier's certification of sulfur content if it is maintained as part of this log).

7. The fleet under control of this o/o is subject to and shall comply with the weighted PM emission fleet averages expressed as grams per brake horsepower-hour (g/bhp-hr) by the listed compliance dates in Title 17 CCR Section 93116.3(c).

Fleet Standard Compliance;

Engines <175 bhp	Engines >175 to 749 bhp	Engines >750 bhp	
Date (g/bhp-hr)	(g/bhp-hr)	(g/bhp-hr)	
1/1/2013	0.3	0.15	0.25
1/1/2017	0.18	0.08	0.08
1/1/2020	0.04	0.02	0.02

Fleet is defined in Title 17 CCR Section 93116.2(16).

8. The o/o of this unit must submit a Statement of Compliance signed by the Responsible Official that the fleet standards are being achieved and a summary that identifies each portable engine in the fleet and the associated emission rate (g/bhp-hr) and other required information, see Title 17 CCR 93116.4(e)(2), (3), (4), (5), (6) and (7) for the following compliance statement submittal dates:

Weighted DPM Emission Fleet Average	Date Submit by
January 1, 2013	March 1, 2013
January 1, 2017	March 1, 2017
January 1, 2020	March 1, 2020

9. This portable equipment shall not be operated and/or located within 1,000 feet of a public or private school (kindergarten through 12th grade) of more than 12 students for more than 45 consecutive days without completing the notification required by Health and Safety Code \S\S 42301.6.

10. This unit is subject to the requirements of the Airborne Toxic Control Measure For Diesel Particulate Matter From Portable Engines Rated At 50 Horsepower and Greater (Title 17 CCR 93116). In the event of conflict between these conditions and the

ATCM, the more stringent shall govern.



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

E009445

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: JANUARY 2021

OWNER OR OPERATOR (Co. #277)

FPL Energy Solar Partners III-VII, LLC
41100 Highway 395
Boron, CA 93516

EQUIPMENT LOCATION (Fac. #941)

SEGS (III through VII)
41100 Highway 395
Boron, CA 93516

Description:

GASOLINE IC ENGINE, EMERGENCY GENERATOR consisting of:

One Ford, 87U fired internal combustion engine Model No. LSG-8751-6005-A and Serial No. 17806 T-18-TT, producing 87 bhp with 8 cylinders at 1800 rpm while consuming a maximum of 9 gal/hr. This equipment powers a 75 Onan Generator Model No. 60EN and Serial No. B890206154, rated at 60kW.

EMISSIONS RATES

Emission Type	Est. Max Load	Unit
CO	211.7	gm/bhp-hr
NOx	8.8	gm/bhp-hr
VOC	2.8	gm/bhp-hr

CONDITIONS:

1. This equipment 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.

Fee Schedule: 7 (g)

Rating: 1 device

SIC: 4911

SCC: 20300301

Location/UTM(Km):
450E/3874N

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.

FPL Energy Solar Partners III-VII, LLC
41100 Highway 395
Boron, CA 93516

By:
Brad Poiriez

Air Pollution Control Officer

2. Engine may operate in response to notification of impending rotating outage if the area utility has ordered rotating outages in the area where the engine is located or expects to order such outages at a particular time, the engine is located in the area subject to the rotating outage, the engine is operated no more than 30 minutes prior to the forecasted outage, and the engine is shut down immediately after the utility advises that the outage is no longer imminent or in effect.

3. This ICE shall only be fired on gasoline.

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

5. This unit shall be limited to use for emergency power, defined as in response to a fire or when commercially available power has been interrupted. In addition, this unit shall be operated no more than 20 hours per year for testing and maintenance, excluding compliance source testing. Time required for source testing will not be counted toward the 20 hour per year limit.

6. The o/o shall maintain a 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. Date of each use and duration of each use (in hours);
- b. Reason for use (testing & maintenance, emergency, required emission testing); and
- c. Calendar year operation in terms of fuel consumption (in gallons) and total hours.



MOJAVE DESERT AIR QUALITY MANAGEMENT DISTRICT

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760.245.1661 -- 800.635.4617 -- FAX 760.245.2022

PERMIT TO OPERATE

N005073

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: JANUARY 2021

OWNER OR OPERATOR (Co. #277)

FPL Energy Solar Partners III-VII, LLC
41100 Highway 395
Boron, CA 93516

EQUIPMENT LOCATION (Fac. #941)

SEGS (III through VII)
41100 Highway 395
Boron, CA 93516

Description:

GASOLINE DISPENSING FACILITY (NON-RETAIL) consisting of: SEGS VI

DISPENSING EQUIPMENT

Fuel Type	Quantity
87U	1
Diesel	1

VAPOR CONTROL EQUIPMENT

Type	Equipment Name	Compliance
PII	BAL	G-70-167
PI	CO	G-70-167

CONDITIONS:

1. The toll-free telephone number that must be posted is 1-800-635-4617.
2. The owner/operator, o/o, shall maintain a log of all inspections, repairs, and maintenance on equipment subject to Rule 461.

Fee Schedule: 5 (a)

Rating: 5000 gallons

SIC: 4911

SCC: 40600603

Location/UTM(Km):
450E/3874N

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.

FPL Energy Solar Partners III-VII, LLC
41100 Highway 395
Boron, CA 93516

By:


Brad Poiriez

Air Pollution Control Officer

This log shall be kept current, on-site for a minimum of 2 years and provided to District personnel on request.

3. Any modifications or changes to the piping or control fittings of the vapor recovery system requires prior approval from the District.

4. The vapor vent pipes are to be equipped with pressure relief valves.

5. The owner or operator shall conduct and pass the following tests annually using the latest adopted version of the following test procedures:

a. Pressure Decay Tests per CARB test method TP-201.3B.

b. Liquid Removal Test (if applicable) per TP-201.6

c. Emergency vents and manways shall be leak free when tested at the operating pressure of the tank in accordance with CARB test methods, as specified in Title 17, California Code of Regulations.

The District shall be notified a minimum of 10 days prior to performing the required tests with the final results submitted to the District within 30 days of completion of the tests.

6. The annual throughput of gasoline shall not exceed 60,000 gallons per year. Throughput records shall be kept on site and available to District personnel upon request, and annual throughput for the previous calendar year shall be provided to the District not later than the end of February of each year. Before this annual throughput can be increased the facility is required to submit to the District an application to modify the permit which may require a Health Risk Assessment (HRA). In addition, public notice and/or a commenting period may be required.

[District Rule 1320 - NSR for Toxic Air Contaminants; District Rule 107(b); H&S Code 39607 & 44341-44342; and 40 CFR 51, Subpart A]

7. The o/o shall maintain and operate this equipment in compliance with CARB Executive Order G-70-167.