DEPARTMENT OF ENVIRONMENTAL QUALITY AIR QUALITY DIVISION ACTIVITY REPORT: Self Initiated Inspection

U63170338539809

FACILITY: Fire Defense Equipment Company, Inc.		SRN / ID: U631703385
LOCATION: 4350 Delemere Boulevard, Royal Oak		DISTRICT: Southeast Michigan
CITY: Royal Oak		COUNTY: OAKLAND
CONTACT: Robert Kelly , Owner		ACTIVITY DATE: 04/21/2017
STAFF: Samuel Liveson	COMPLIANCE STATUS: Compliance	SOURCE CLASS:
SUBJECT: Self-initiated inspec	tion of a minor source.	
RESOLVED COMPLAINTS:		

On April 21, 2017, I conducted a self-initiated, level 2 inspection of Fire Defense Equipment Company, Inc. (Fire Defense), located at 4350 Delemere Boulevard in Royal Oak, Michigan. The purpose of this inspection was to determine the facility's compliance with the federal Clean Air Act; Part 55, Air Pollution Control, of the Natural Resources and Environmental Protection Act, 1994 PA 451, as amended (NREPA); and the Air Pollution Control Rules.

I arrived on site around 10:30 AM. I met with Mr. Robert Kelly, Owner. Mr. Kelly provided a walkthrough of the facility. I provided Mr. Kelly with my contact information and explained the purpose of our unannounced inspections.

I originally visited the location the previous day (April 20th) but was asked to come back when the owner was available.

Facility Walkthrough

Fire Defense is in fire extinguisher sales and service, and the company also fills propane tanks.

Emergency Generator

A 60 kilowatt (kW) natural gas-fired emergency generator on site appears to be subject to 40 CFR Subpart JJJJ: Standards of Performance for Stationary Spark Ignition Internal Combustion Engines. The generator was produced on September 8, 2011 according to the generator nameplate. On May 8, I reached out to Mr. Patrick Morgan from Michigan Generator Service, Inc., who Mr. Kelly told me maintains the unit. On May 12, Mr. Morgan provided the engine emission certificate so that the engine appears to be certified per §60.4243(b)(1). The engine also appears to have a non-resettable hours meter per §60.4237 (c), which read 146.4 hours during the facility inspection. According to Mr. Kelly, the engine is serviced once per year by Mr. Morgan, and an automatic test occurs once a week for ten minutes. I did not request maintenance records or operating hours for the emergency engine.

Miscellaneous Equipment

A 4 ton tank of carbon dioxide pressurized to 300 pounds per square inch appears to be exempt from obtaining a Permit to Install per R 284(2)(j). An 800 gallon storage tank of propane appears to be exempt from obtaining a Permit to Install per R 284(2)(b).

The company fills fire extinguishers with particulate fire suppressant, of monoammonium phosphate or sodium bicarbonate. The filling operation occurs on a surface with negative pressure to collect particulate and send it through a dust collector located outside. The exhaust returns to the building rather than emit outside. This fire extinguisher filling operation appears to be exempt from obtaining a Permit to Install per R 285(2)(ff).

A steel pellet blaster is used to clean fire extinguishers. Exhaust travels through a filter before

exhausting outside. The unit appears to be exempt from obtaining a Permit to Install per R 285(2)(l)(vi)(C).

Fire extinguishers may be hand-painted with a roller in a booth enclosed on three sides with negative pressure. Talking with a worker on site, less than a can of paint is generally used each year. A mesh filter is in place in the booth. According to the worker on site, the mesh filter is 2.5 years old, although it looks new because paint is brushed rather than sprayed. This painting appears to be exempt from obtaining a Permit to Install per R 287(2)(c).

Aerosol cans of Rust-Oleum may be applied as well, which appears to be exempt from obtaining a Permit to Install per R 287(b).

Compliance

Based on the AQD inspection and records review, it appears that Fire Defense is in compliance with the federal Clean Air Act, NREPA, and the Air Pollution Control Rules.

DATE 5/15/17 SUPERVISOR SK