IN THE UNITED STATES DISTRICT COURT
FOR THE NORTHERN DISTRICT OF GEORGIA
ROME DIVISION

UNITED STATES OF AMERICA, Plaintiff, vs. MFG CHEMICAL, LLC, Defendant.	Civ. No.

COMPLAINT

The United States of America, by authority of the Attorney General of the United States and through the undersigned attorneys, acting at the request of the Administrator of the United States Environmental Protection Agency ("EPA"), alleges as follows:

NATURE OF THE ACTION

1. This is a civil action for penalties and injunctive relief brought pursuant to Section 113(b) of the Clean Air Act ("CAA"), 42 U.S.C. § 7413(b), against Defendant MFG Chemical, LLC ("Defendant") for violations of the General Duty Clause of Section 112(r)(1) of the CAA, 42 U.S.C. § 7412(r)(1), at Defendant's chemical manufacturing and processing facility located at 117 Callahan Road SE, Dalton, Georgia ("the Facility"), resulting in a chemical explosion on May 21, 2012.

JURISDICTION AND VENUE

2. This Court has jurisdiction over the subject matter of this action, pursuant to 28 U.S.C. §§ 1331, 1345, and 1355, and Section 113(b) of the CAA, 42 U.S.C. § 7413(b).

3. Venue is proper in this District under Section 113(b) of the CAA, 42 U.S.C. § 7413(b) and 28 U.S.C. §§ 1391(b) and (c) and 1395(a), because the Defendant does business in, and these claims arose within, this judicial district.

4. Notice of commencement of this action has been given to the State of Georgia pursuant to Section 113(b) of the CAA, 42 U.S.C 7413(b).

PARTIES

5. Plaintiff is the United States of America, acting at the request of the EPA, an agency of the United States.

6. Defendant is the current owner and operator of the Facility, and is organized under the laws of the State of Delaware, and is doing business in this judicial district.

7. On or about June 22, 2017, Defendant became the successor to MFG Chemical, Inc., which had been organized under the laws of the State of Georgia and which had been the owner and operator of the Facility at the time of the May 21, 2012, explosion.

GENERAL ALLEGATIONS

8. Defendant or its predecessor, MFG Chemical, Inc. (collectively referred to herein as "Defendant"), owned and operated the Facility at all times relevant hereto.

9. The Facility is a "stationary source" within the meaning of CAA Section 112(r)(2)(C), 42 U.S.C. § 7412(r)(2)(C), and 40 C.F.R. § 68.3.

10. The Facility produces, processes, handles, stores, and disposes of hazardous substances and extremely hazardous substances within the meaning of Section 112(r)(1) and (3) of the CAA, including but not limited to hydrogen peroxide, and did so at all times relevant hereto.

11. Hydrogen peroxide is a strong oxidizing agent that can pose an explosion hazard and that has the characteristics of reactivity and corrosivity, and can therefore cause death, injury, or property damage in connection with releases to the air.

12. One of the chemical products being manufactured at the Facility in May 2012 was Coagulant 129, which is the final product of a mixture of hydrogen peroxide, maleic anhydride, caustic soda and calcium hydroxide.

13. On May 21, 2012, a chemical explosion occurred during production of a batch of coagulant 129 in a reactor vessel, following an uncontrolled rise in the temperature of the chemical mixture in the reactor vessel.

14. The pressure inside the reactor increased until it exceeded the reactor's maximum capacity, resulting in a process upset and an explosion that caused a manway cover on top of the tank to blow off.

15. The explosion resulted in the rapid expulsion of the chemical mixture containing hydrogen peroxide that had been inside the reactor, and propelled the manway cover and chemical mixture upwards through the roof of the reactor building at the Facility and through the wall of a neighboring carpet business approximately 300 feet away.

16. The chemical mixture that was expelled from the reactor tank settled onto surrounding surfaces including building roofs, vehicles, pavements and lawns downwind from the release source.

17. Approximately 47 people who worked in the industrial park around the Facility had to be decontaminated by the Dalton, Georgia, HazMat team and were taken to the hospital to be examined for possible injuries, including potential respiratory problems and skin irritation.

COUNT 1 – Failure to Identify Hazards That Can Result from Accidental Releases Using Appropriate Hazard Assessment Techniques

18. Paragraphs 1-17 are incorporated herein by reference.

19. In August 2010, Defendant was expressly informed about the hazards associated with the production of coagulant 129 when one of Defendant's large

corporate purchasers of coagulant 129 forwarded information regarding potential rates of reaction and/or decomposition specific to this chemical product.

20. The information provided to Defendant in August 2010 included information regarding two runaway chemical reactions that had occurred during the manufacture of coagulant 129 and a warning that after the addition of hydrogen peroxide certain process deviations could lead to rapid decomposition of the peroxide to gaseous products causing a pressure spike in the reactor vessel and the possibility of an explosion.

21. The information provided to Defendant in August 2010 also warned that production system design must account for these conditions and appropriate safeguards should be implemented and strictly followed to prevent a repeat of such incidents.

22. Defendant failed to follow well-established industry practices and failed to conduct the necessary tests and experiments to evaluate and analyze the thermodynamics and kinetics of the reaction associated with the manufacture of the coagulant 129.

23. Defendant also failed to evaluate and analyze the heat removal capability of the Facility's existing cooling system in the context of a production process that involved the use of a reactive chemical like hydrogen peroxide.

24. Defendant failed to properly identify hazards associated with the use of a reactive chemical, hydrogen peroxide, in its chemical manufacturing process.

25. Defendant's failure to identify hazards associated with the use of hydrogen peroxide in its chemical manufacturing process is a violation of the General Duty of Care under Section 112(r)(1) of the CAA, 42 U.S.C. § 7412(r)(1).

26. Pursuant to CAA Section 113(b), 42 U.S.C. § 7413(b), as amended, Defendant is liable for assessment of a civil penalty of up to $25,000 per day for each violation, as adjusted for inflation under the Federal Civil Penalties Inflation Adjustment Act Improvements Act of 2015, 28 U.S.C. § 2461 note [Pub. L.114-74, Section 701], and pursuant to EPA's Civil Monetary Penalty Inflation Adjustment Rule, 40 C.F.R. Part 19.4.

COUNT 2 – Failure to Design and Maintain a Safe Facility, Taking such Steps as are Necessary to Prevent the Release of an Extremely Hazardous Substance

27. Paragraphs 1-26 are incorporated herein by reference.

28. In accordance with EPA guidelines and standard industry practice, a facility should develop and implement a preventative maintenance program that should include, at a minimum, schedules for replacement, repair, or regular maintenance for the equipment, quality requirements for spare parts, installation and repair procedures, testing, quality controls, replacement-in-kind controls,

maintenance enforcement procedures, and reasonably detailed maintenance records.

29. Prior to the May 21, 2012, explosion at the Facility, Defendant's insurance company performed a facility assessment at the Facility and notified Defendant that development of an acceptable preventative maintenance program was necessary as one did not exist at the time of the assessment in January of 2012.

30. Defendant failed to develop and implement an acceptable preventative maintenance program that met EPA guidelines and standard industry practice.

31. Industry standards require that an adequate process cooling system be installed in facilities that handle and process reactive chemicals in order to prevent or mitigate a runaway chemical reaction.

32. Defendant failed to equip its reactors with an emergency cooling system that could prevent or mitigate a possible runaway chemical reaction, and did not have an independent backup source of cooling water to supplement the municipal water source used at the Facility.

33. Generally accepted good engineering practice requires that pressure relief systems for reactor vessels be sized for the worst credible over-pressurization scenario.

34. The pressure relief vent for the reactor vessel used at the Facility to manufacture coagulant 129 was undersized according to recognized industry

standards and methodologies for evaluation of appropriate pressure relief mechanisms as applied to processes involving chemicals such as coagulant 129, causing excessive pressure buildup leading to the May 21, 2012, explosion.

35. Industry standards covering facilities that process reactive chemicals such as hydrogen peroxide require the installation of appropriate alarm systems to provide warnings in the event of runaway chemical reactions.

36. Defendant operated the Facility without installing high temperature and pressure alarms or a facility-wide emergency notification system in the Facility.

37. Defendant failed to design and maintain a safe facility and failed to take such steps as are necessary to prevent the release of hydrogen peroxide, an extremely hazardous substance.

38. Defendant's failure to design and maintain a safe facility and to take such steps as are necessary to prevent the release of an extremely hazardous substance is a violation of the General Duty of Care under Section 112(r)(1) of the CAA, 42 U.S.C. § 7412(r)(1).

39. Pursuant to CAA Section 113(b), 42 U.S.C. § 7413(b), as amended, Defendant is liable for assessment of a civil penalty of up to $25,000 per day for each violation, as adjusted for inflation under the Federal Civil Penalties Inflation Adjustment Act Improvements Act of 2015, 28 U.S.C. § 2461 note [Pub. L.114-74,

Section 701], and pursuant to EPA's Civil Monetary Penalty Inflation Adjustment Rule, 40 C.F.R. Part 19.4.

COUNT 3 – Failure to Minimize the Consequences of a Release of an Extremely Hazardous Substance

40. Paragraphs 1-39 are incorporated herein by reference.

41. EPA guidance and industry standards require adequate employee training on standard operating, management of change, and emergency operation procedures in order to assure that the consequences of a release of an extremely hazardous substance are minimized.

42. Defendant failed to provide training on standard operating and management of change procedures for employees involved in covered processes like the coagulant 129 reaction to adequately address modifications to the process, equipment, procedures, chemicals, and process conditions outside of normal operating procedures.

43. Defendant did not provide the necessary employee training pertaining to emergency operations, including shut-down and safe work practices, and did not adequately train employees regarding the nature and characteristics of the chemicals with which they were working.

44. Defendant failed to minimize the consequences of a release of hydrogen peroxide, an extremely hazardous substance.

45. Defendant's failure to minimize the consequences of a release of an extremely hazardous substance is a violation of the General Duty of Care under Section 112(r)(1) of the CAA, 42 U.S.C. § 7412(r)(1).

46. Pursuant to CAA Section 113(b), 42 U.S.C. § 7413(b), as amended, Defendant is liable for assessment of a civil penalty of up to $25,000 per day for each violation, as adjusted for inflation under the Federal Civil Penalties Inflation Adjustment Act Improvements Act of 2015, 28 U.S.C. § 2461 note [Pub. L.114-74, Section 701], and pursuant to EPA's Civil Monetary Penalty Inflation Adjustment Rule, 40 C.F.R. Part 19.4.

RELIEF SOUGHT

WHEREFORE, Plaintiff United States of America respectfully prays that this Court provide the following relief:

1. An injunction prohibiting Defendant from operating the Facility except in accordance with the Clean Air Act;

2. A judgment ordering Defendant to pay a civil penalty of $25,000 per day for each violation of the Clean Air Act as adjusted for inflation under the Federal Civil Penalties Inflation Adjustment Act Improvements Act of 2015, 28 U.S.C. § 2461 note [Pub. L.114-74, Section 701], and pursuant to EPA's Civil Monetary Penalty Inflation Adjustment Rule, 40 C.F.R. Part 19.4;

3. An order awarding the United States its costs of this action; and

4. Such further relief as this Court may deem just and proper.

Respectfully submitted this 21st day of May, 2018.

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