

The United States of America (“United States”), by the authority of the Attorney General and through the undersigned attorneys, acting at the request and on behalf of the Administrator of the United States Environmental Protection Agency (“EPA”), files this Complaint and alleges as follows:

1. This is a civil action against Infineum USA LP (“Infineum”) under Sections 113(b) and 502(a) of the Clean Air Act (“CAA” or “Act”), 42 U.S.C. §§ 7413(b), 7661a(a). The Complaint seeks civil penalties and injunctive relief based on alleged violations of the CAA at Infineum’s Bayway chemical plant located at 1400 Park Avenue, Linden, Union County, New Jersey (“Bayway Plant”). The claims involve the Bayway Plant’s steam-assisted flare, also known as the paratone flare (“the Flare”).

- The National Emission Standards for Hazardous Air Pollutants (“NESHAPs”) promulgated at 40 C.F.R. Part 63, Subparts A and FFFF, under Section 112 of the CAA, 42 U.S.C. § 7412; and

- The requirements of Title V found in Section 502(a) of the CAA, 42 U.S.C. § 7661a(a).

JURISDICTION AND VENUE

3. This Court has jurisdiction over the subject matter under 28 U.S.C. §§ 1331, 1345, and 1355 and Sections 113(b) of the CAA, 42 U.S.C. §§ 7413(b). This Court has personal jurisdiction over Infineum, which does business in the State of New Jersey.

4. 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 alleged violations in this Complaint occurred at the Bayway Plant, which is located in this District.

AUTHORITY

5. The United States Department of Justice has authority to bring this action on behalf of EPA under, *inter alia*, 28 U.S.C. §§ 516 and 519 and under Section 305(a) of the CAA, 42 U.S.C. § 7605(a).

DEFENDANT

6. Defendant Infineum is a limited partnership organized under the laws of the State of Delaware and authorized to do business in the State of New Jersey.

7. At all times pertinent to this suit, Infineum has been the “owner or operator” of the Bayway Plant and the Flare, as that term is defined in Sections 112(a)(9) of the CAA, 42 U.S.C. § 7412(a)(9).

8. Infineum is a “person” within the meaning of Sections 113(b) and 302(e) of the CAA, 42 U.S.C. §§ 7413(b) and 7602(e), and applicable federal and state regulations promulgated under the CAA.

CLEAN AIR ACT STATUTORY AND REGULATORY BACKGROUND

9. The Clean Air Act establishes a regulatory scheme designed to protect and enhance the quality of the nation's air to promote the public health and welfare and the productive capacity of its population. 42 U.S.C. § 7401(b)(1).

I. STATUTORY AND REGULATORY BACKGROUND FOR FLARING CLAIMS

A. National Emission Standards for Hazardous Air Pollutants

10. Section 112 of the Clean Air Act sets forth a national program for the control of hazardous air pollutants ("HAPs"). 42 U.S.C. § 7412.

11. Congress established a list of 187 HAPs believed to cause adverse health or environmental effects. 42 U.S.C. § 7412(b)(1).

12. Congress directed EPA to publish a list of all categories and subcategories of, *inter alia*, major sources of HAPs. 42 U.S.C. § 7412(c).

13. Congress directed EPA to promulgate regulations establishing emissions standards for each category or subcategory of, *inter alia*, major sources of HAPs. 42 U.S.C. § 7412(d)(1). These emission standards must require the maximum degree of reduction in emissions of HAPs that the Administrator, taking into consideration the cost of achieving such emission reduction, and any non-air quality health and environmental impacts and energy requirements, determines is achievable for the new or existing sources in the category or subcategory to which the emission standard applies. 42 U.S.C. § 7412(d)(2).

14. The emission standards promulgated under Section 112 of the 1990 Amendments of the CAA, 42 U.S.C. § 7412, are known as the National Emission Standards for Hazardous Air Pollutants ("NESHAPs") for source categories subject to maximum achievable control technology ("MACT") requirements, among others. These emission standards are found in Part 63 of Title 40 of the Code of Federal Regulations.

15. Subject to an exception not applicable here, after the effective date of any emission standard, limitation, or regulations promulgated pursuant to Section 112 of the CAA, no person may operate a source in violation of such standard, limitation, or regulation. 42 U.S.C. § 7412(i)(3).
16. “Major source” is defined as any stationary source or group of stationary sources located within a contiguous area and under common control that emits or has the potential to emit considering controls, in the aggregate, 10 tons per year or more of any HAP or 25 tons per year or more of any combination of HAPs. 42 U.S.C. § 7412(a)(1).
17. “Stationary source” is defined as any building, structure, facility, or installation which emits or may emit any air pollutant. 42 U.S.C. § 7412(a)(3) (stating that “stationary source” shall have the same meaning as such term has under section 7411(a) of the CAA).
18. “Affected source” is defined as the collection of equipment, activities, or both within a single contiguous area and under common control that is included in a Section 112(c) source category or subcategory for which a Section 112(d) standard or other relevant standard is established under Section 112 of the CAA. 40 C.F.R. § 63.2.
19. “Hazardous air pollutant” means any air pollutant listed pursuant to subsection (b) of Section 7412 of the CAA. 42 U.S.C. § 7412(a)(6); 42 U.S.C. § 7412(b).
20. “Owner or operator” means any person who owns, leases, operates, controls, or supervises a stationary source. 42 U.S.C. § 7412(a)(9).
21. A “category” of sources is a group of sources having some common features suggesting that they should be regulated in the same way and on the same schedule. 57 Fed. Reg. 31576, 31578 (July 16, 1992). A single stationary source can be comprised of multiple source categories. *Id.*
22. A manufacturing process unit (“MCPU”) includes any equipment necessary to operate a miscellaneous organic chemical manufacturing process. 40 C.F.R. § 63.2435(a) and (b).

B. Part 63, Subpart A: General

23. Under Section 112(d) of the CAA, 42 U.S.C. § 7412(d), as it existed after the 1990 CAA Amendments, EPA promulgated regulations that contain general provisions applicable to sources that are subject to the MACT standards of Part 63 of Title 40 of the Code of Federal Regulations. 40 C.F.R. Part 63, Subpart A, §§ 63.1-63.16 (“Subpart A”).

24. Under Subpart A, the provisions of 40 C.F.R. Part 63 “apply to the owner or operator of any stationary source that, (i) [e]mits or has the potential to emit any hazardous air pollutant listed in or pursuant to section 112(b) of the Act; and (ii) [i]s subject to any standard, limitation, prohibition, or other federally enforceable requirement established pursuant to this part.” 40 C.F.R. § 63.1(b).

25. Under Subpart A, each relevant standard in Part 63 must identify explicitly whether each provision in Subpart A is or is not included in such relevant standard. 40 C.F.R. § 63.1(a)(4)(i).

C. Part 63 Subpart A: 40 C.F.R. § 63.6(e)(1)(i)

26. Within Subpart A of Part 63, EPA promulgated a requirement that at all times, including periods of startup, shutdown, and malfunction, the owner or operator must operate and maintain any affected source, including associated air pollution control equipment, such as a flare, in a manner consistent with safety and good air pollution control practices for minimizing emissions. 40 C.F.R. § 63.6(e)(1)(i).

D. Part 63 Subpart A: 40 C.F.R. § 63.11(b)

27. Within Subpart A of Part 63, EPA promulgated requirements that owners or operators of flares shall:

- a. Monitor their flares to assure they are operated and maintained in accordance with their designs. 40 C.F.R. § 63.11(b)(1).
- b. Operate their flares at all times when emissions may be vented to them. 40 C.F.R. § 63.11(b)(3).

- c. Assure that their flares are designed for and operated with no visible emissions, except for periods not to exceed a total of 5 minutes during any 2 consecutive hours. 40 C.F.R. § 63.11(b)(4).
- d. Operate their flare with a flame present at all times. 40 C.F.R. § 63.11(b)(5).
- e. Operate their flares with the proper net heating value of the gas that is being combusted. 40 C.F.R. § 63.11(b)(6)(ii).
- f. Assure that their steam-assisted flares are operated in accordance with the proper exit velocity. 40 C.F.R. § 63.11(b)(7)(i)-(iii).

E. Applicable MACT Standards: Part 63, Subpart FFFF

- 28. Under Section 112(c) of the CAA, 42 U.S.C. § 7412(c), EPA identified Miscellaneous Organic Chemical Manufacturing as a source category of HAPs. 67 Fed. Reg. 16154-01, 16158 (April 4, 2002).
- 29. Under Section 112(d) of the CAA, 42 U.S.C. § 7412(d), EPA promulgated the National Emissions Standards for Hazardous Air Pollutants: Miscellaneous Organic Chemical Manufacturing. 68 Fed. Reg. 63852-01 (Nov. 10, 2003). These standards are commonly referred to as the “MON” and are used to establish requirements to demonstrate initial and continuous compliance with emission limits and standards for HAPs. 40 C.F.R. Part 63, Subpart FFFF, §§ 63.2430-63.2550 and associated tables.
- 30. Table 12 of 40 C.F.R. Pt. 63, Subpart FFFF states that owners and operators of a MCPU are subject to the general duty provision of 40 C.F.R. §63.6(e)(1)(i).

II. TITLE V

- 31. Title V of the Clean Air Act, 42 U.S.C. §§ 7661–7661f, establishes an operating permit program for certain sources, including major sources subject to Section 112 (“NESHAP/MACT program”) of the CAA. The purpose of Title V is to ensure that all “applicable requirements” that a source is subject to under the CAA are contained in one permit. 42 U.S.C. § 7661c(a).

32. Under Section 502(b) of the CAA, 42 U.S.C. § 7661a(b), EPA promulgated regulations implementing the requirements of Title V and establishing the minimum elements of a Title V permit program to be administered by any state or local air pollution control agency. 57 Fed. Reg. 32250 (July 21, 1992). These regulations are codified at 40 C.F.R. Part 70.

33. New Jersey has an EPA-approved Title V program. N.J.A.C. 7:27-22 (the New Jersey Title V Operating Permit Program) (approved at 66 Fed. Reg. 63,168, Nov. 30, 2001). New Jersey is authorized to issue and enforce Title V permits. In all respects relevant to this Complaint, the Title V regulations of New Jersey comport with the federal Title V regulations codified at 40 C.F.R. Part 70.

34. Section 502(a) of the CAA, 42 U.S.C. § 7661a(a) and the Title V permit program and regulations of New Jersey provide that, after the effective date of the state Title V permit program, no person may violate any requirement of a Title V permit.

35. Section 502(a) of the CAA, 42 U.S.C. § 7661a(a), the implementing regulations at 40 C.F.R. §§ 70.1(b) and 70.7(b), and the Title V permit program and regulations of New Jersey provide that, after the effective date of the state Title V permit program, no source subject to Title V may operate except in compliance with a Title V permit.

36. Section 504(a) of the CAA, 42 U.S.C. § 7661c(a), the implementing regulations at 40 C.F.R. § 70.6(a) and (c), and the Title V permit programs and regulations of New Jersey requires each Title V permit to include, *inter alia*, enforceable emission limitations and standards, a schedule of compliance, and such other conditions as are necessary to assure compliance with all applicable requirements of the CAA, including the requirements of the applicable SIP.

37. All terms and conditions of a Title V permit are enforceable by EPA. 42 U.S.C. § 7413(b); 40 C.F.R. § 70.6(b).

III. ENFORCEMENT OF THE CAA

38. Sections 113(a)(3) of the CAA, 42 U.S.C. § 7413(a)(3), authorize EPA to bring a civil action under Section 113(b) if EPA finds that any person is in violation of the NESHAP/MACT program or a Title V permit.

39. Section 113(b) of the CAA, 42 U.S.C. § 7413(b), authorizes EPA to bring a civil action under Section 113(b) for violations of the NESHAP/MACT program or a Title V permit.

40. Section 113(b) of the CAA, 42 U.S.C. § 7413(b), authorizes civil penalties of up to \$25,000 per day for each violation of the CAA. The Civil Penalties Inflation Act of 1990, 28 U.S.C. § 2461 *et seq.*, as amended by the Debt Collection Improvements Act of 1996, 31 U.S.C. § 3701 *et seq.*, requires EPA to periodically adjust its civil penalties for inflation. On December 31, 1996, February 13, 2004, and December 11, 2008, EPA adopted and revised regulations entitled “Adjustment of Civil Monetary Penalties for Inflation,” 40 C.F.R. Part 19, to upwardly adjust the maximum civil penalty under the CAA. For each violation that occurs between January 31, 1997, and March 15, 2004, inclusive, penalties of up to \$27,500 per day may be assessed; for each violation that occurs between March 16, 2004, and January 12, 2009, inclusive, penalties of up to \$32,500 per day may be assessed; and for each violation that occurs between January 13, 2009, and November 2, 2015, inclusive, penalties of up to \$37,500 per day may be assessed. 40 C.F.R. § 19.4; *See also* 60 Fed. Reg. 69,360 (Dec. 31, 1996); 60 Fed. Reg. 7121 (Feb. 12, 2004); 73 Fed. Reg. 75,340 (Dec. 11, 2008).

GENERAL ALLEGATIONS

41. Infineum is the “owner or operator,” within the meaning of the CAA, of the Bayway Plant. 42 U.S.C. § 7412(a)(9).

42. The Bayway Plant uses one steam-assisted flare as a pollution control device, which is referred to as the Flare in this Complaint.

43. The Bayway Plant is a “major source,” a “stationary source,” and an “affected source” within the meaning of the CAA, the NESHAP/MACT program and regulations, and the EPA-approved New Jersey Title V program. 42 U.S.C. § 7412(a)(1); 40 C.F.R. § 63.2.

44. The Bayway Plant has a Title V permit that the State of New Jersey issued.

45. The Flare is a combustion device that uses an uncontrolled volume of ambient air to burn waste gases.

46. The Flare is a steam-assisted flare that uses steam piped to the flare tip to assist in combustion of waste gas.

47. Injecting too much steam at the flare tip, also referred to as over-steaming, reduces the flare’s combustion efficiency and causes excess emissions of HAPs and volatile organic compounds, which is not consistent with proper operation for safety and good air pollution control practices for minimizing emissions.

Clean Air Act Claims

Claim 1: Flares

Violation of NESHAP/MACT Subpart A Requirement related to Flares and Title V Permit that Incorporate this Requirement

48. Plaintiff re-alleges and incorporated by reference Paragraphs 1-46 as if fully set forth herein.

49. As a “major source,” a “stationary source,” and an “affected source,” the Bayway Plant is subject to the NESHAP: Miscellaneous Organic Chemical Manufacturing requirements found at 40 C.F.R. Part 63, Subpart FFFF, §§ 63.2430 through 63.2550 (“the MON”), promulgated under Sections 112 and 114 of the CAA.

50. Under 40 CFR Part 63, Table 12 to Subpart FFFF, the General Provisions of 40 C.F.R. § 63.1(e)(6) are explicitly incorporated as an applicable requirement.

51. The Flare is used as a pollution control device and is subject to the General Provisions of the NESHAP found at Subpart A. Under 40 C.F.R. § 63.1(e)(6) (found in Subpart A), Infineum must, at all times, including periods of startup, shutdown, and malfunction, to the extent practicable, maintain

and operate the Flare in a manner consistent with safety and good air pollution control practice for minimizing emissions.

52. Good air pollution control practices for minimizing emissions at flares involve, *inter alia*, combusting the hydrocarbons and HAPs in the gases sent to the Flare by ensuring that the waste gas being combusted at the Flare has sufficient heating value to allow for complete combustion.

53. Good air pollution control practices for minimizing emissions at flares also involves adding a sufficient amount of steam to a flare to ensure visible emissions, i.e. smoke, are prevented.

54. For steam-assisted flares, such as to the Flare, good air pollution control practices for minimizing emissions also involve, *inter alia*, injecting steam at a rate that maximizes flame stability and flare combustion efficiency.

55. In order to ensure that the gases sent to flares have sufficient heating value to ensure complete combustion, the applicable General Provisions for flares involve, *inter alia*, monitoring, measuring, and/or calculating the net heating value (“NHV”) of the waste gases being combusted at the Flare.

56. In addition, supplemental gas must be immediately available for addition to the gas being sent to the flare, commonly referred to as the waste gas, to ensure that the net heating value of the combustion zone gas is maintained at a level that ensures adequate flare combustion efficiency.

57. In order to inject steam at a proper rate, good air pollution control practices for minimizing emissions at steam-assisted flares involve, *inter alia*, monitoring the waste gas flow rate and steam flow rate to the flare so that the ratio of the waste gas to the steam added (often referred to as the “steam-to-waste gas ratio”) allows for optimal combustion efficiency and therefore minimizes emissions.

58. On numerous occasions from February 1, 2010 to February 22, 2015, Infineum operated the Flare with excess steam, which reduced its combustion efficiency and the net heating value of the combustion zone. This resulted in excess, preventable emissions to the atmosphere of uncombusted

and partially-combusted HAPs and hydrocarbons (including volatile organic compounds also referred to as “VOCs”) and carbon monoxide.

59. The acts and omissions identified in this Claim constitute the following violations of Section 112 of the CAA, 42 U.S.C. § 7412, the implementing regulations at 40 C.F.R. §§ 63.6(e)(1) and 63.11(b) of Subpart A of Part 63 (NESHAP/MACT), and 40 C.F.R. § Part 63, Subpart FFFF, §§ 63.2430 through 63.2550 (the MON), Infineum’s Title V Permit that require compliance with the statutory and regulatory requirements and the prohibitions against violating the terms of a Title V permit, which are found at 42 U.S.C. § 7661a(a) and 40 C.F.R. § 70.7(b).

60. Under Section 113(b) of the CAA, 42 U.S.C. § 7413(b), the Civil Penalties Inflation Act of 1990 as found in 28 U.S.C. § 2461, and the Adjustment of Civil Monetary Penalties for Inflation under 40 C.F.R. Pt. 19, Infineum is subject to injunctive relief, mitigation of the effects of excess emissions, and civil penalties of up to \$37,500 per day for each violation after January 12, 2009.

Claim 2: Flares
Violation of Title V Permit Requirements

61. Plaintiff re-alleges and incorporated by reference Paragraphs 1-59 as if fully set forth herein.

62. On numerous occasions from February 1, 2010 to February 22, 2015, Infineum violated its Title V Permit by failing to operate the Flare with a destruction efficiency of greater than or equal to 99.5 percent.

63. On numerous occasions from February 1, 2010 to February 22, 2015, Infineum violated its Title V Permit by failing to operate the Flare with total HAP emissions of less than or equal to 6.74 tons per year or 2.97 lbs./hr.

64. On numerous occasions from February 1, 2010 to February 22, 2015, Infineum violated its Title V Permit by failing to operate the Flare with total VOC emissions of less than or equal to 48.99 tons per year or 56.59 lbs./hr.

65. The acts and omissions identified in this Claim constitute a violation of the prohibitions against violating the terms of a Title V permit, which are found at 42 U.S.C. § 7661a(a) and 40 C.F.R. § 70.7(b) and the federal provisions cited in N.J.A.C 7:27-22.1, 7:27-22.16(b)(5), and (g)(1).

66. Under Section 113(b) of the CAA, 42 U.S.C. § 7413(b), the Civil Penalties Inflation Act of 1990 as found in 28 U.S.C. § 2461, and the Adjustment of Civil Monetary Penalties for Inflation under 40 C.F.R. Part 19, Infineum is subject to injunctive relief, mitigation of the effects of excess emissions, and civil penalties of up to \$37,500 per day for each violation after January 12, 2009.

PRAYER FOR RELIEF

WHEREFORE, based upon allegations in Paragraphs 1 to 65 of this Complaint, the United States requests that this Court;

1. Permanently enjoin Infineum from operating its Facility except in accordance with the CAA and all applicable federal regulations and applicable federally enforceable state regulations;
2. Order Infineum to operate its Facility in compliance with the CAA statutory and regulatory requirements set forth herein and the Title V permit applicable to the Facility.
3. Order Infineum to take other appropriate actions to remedy, mitigate, and offset the harm to public health and the environment caused by the violations of the CAA alleged herein;
4. Assess a civil penalty against Infineum for each violation of the CAA occurring between February 1, 2010 and February 22, 2015 of up to \$37,500 for each violation.
5. Award Plaintiff its costs of this action; and
6. Grant such other relief as the Court deems just and proper.

Respectfully Submitted,

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