

UNITED STATES DISTRICT COURT
EASTERN DISTRICT OF MICHIGAN
SOUTHERN DIVISION

UNITED STATES OF AMERICA,

Plaintiff,

Case No. 22-11191
U.S. DISTRICT COURT JUDGE
GERSHWIN A. DRAIN

and

SIERRA CLUB and
CITY OF RIVER ROUGE,

Plaintiff-Intervenors,

v.

EES COKE BATTERY, LLC, *et al.*,

Defendants.

_____/

FINDINGS OF FACT AND CONCLUSIONS OF LAW

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I. INTRODUCTION

The Government initiated the present action against Defendant EES Coke Battery, LLC (“EES Coke”) on June 1, 2022. It alleged that EES Coke violated the Clean Air Act’s New Source Review program (“NSR”) by (1) undertaking a “major modification” at the EES Coke Facility (“the Facility”) without first complying with NSR permitting requirements, and (2) failing to comply with NSR’s “reasonable possibility” reporting requirements. The Government later amended its complaint to add DTE Energy Services, Inc. (“DTEES”), DTE Energy Resources, LLC (“DTEER”), and DTE Energy Company (“DTEEC”) (collectively, “the DTE Defendants”) to this case as defendants, alleging that they are also liable for the Facility’s Clean Air Act violations as “operators” of the Facility. Sierra Club and the City of River Rouge moved to intervene in this case, and the Court granted their motions.

At summary judgment, the Court found EES Coke liable for the alleged Clean Air Act violations, but determined that genuine issues of material fact existed with respect to the DTE Defendants’ liability and the appropriate remedy. The Court held a bench trial on those issues from September 15, 2025 to September 29, 2025. Following the trial, the parties submitted proposed findings of fact and conclusions of law.

For the reasons explained below, and upon careful consideration of the

evidence presented and the parties' proposed findings of fact and conclusions of law, the Court finds as follows. The Government has proven by a preponderance of the evidence that the DTE Defendants are "operators" of the Facility and, thus, liable for the Facility's Clean Air Act violations. As a remedy, Defendants shall (1) pay a civil penalty in the amount of \$100,000,001.00, (2) come into compliance with the Clean Air Act by applying for and obtaining the requisite NSR permits, and (3) form a Community Quality Action Committee and provide it with \$20 million in funding for community air quality improvement projects.

II. BACKGROUND

A. The Clean Air Act and New Source Review

The Clean Air Act is a federal law that aims to safeguard "the quality of the Nation's air resources so as to promote the public health and welfare and the productive capacity of its population." 42 U.S.C. § 7401(b)(1). It imposes strict liability on owners and operators that violate its provisions, *United States v. Anthony Dell'Aquilla, Enters. and Subsidiaries*, 150 F.3d 329, 332 (3d Cir. 1998), broadly defining the term "owner or operator" as "any person who owns, leases, operates, controls, or supervises a stationary source." 42 U.S.C. § 7411(a)(5). For a defendant to be found civilly liable for violating the Clean Air Act, the Government must prove the violation by a preponderance of the evidence. *See United States v. Ameren Mo.*, 229 F. Supp. 3d 906, 916 (E.D. Mo. 2017).

The Clean Air Act charges the United States Environmental Protection Agency (“EPA”) with formulating national ambient air quality standards (“NAAQS”) for certain air pollutants, including sulfur dioxide (“SO₂”) and particulate matter (“PM_{2.5}”). Each state, in turn, must develop a State Implementation Plan (“SIP”) that sets forth how the NAAQS will be achieved and maintained within the state. 42 U.S.C. § 7407(a). The SIPs must be approved by the EPA, and once approved, they are “added to the Code of Federal Regulations and become[] federal law.” *Sierra Club v. Korleski*, 681 F.3d 342, 343 (6th Cir. 2012). Michigan’s SIP is developed and enforced by the Michigan Department of Environment, Great Lakes, and Energy (“EGLE”).

NSR is a key component of the Clean Air Act. It prohibits the construction of new sources of air pollution without first following specific permitting requirements, *United States v. DTE Energy Co.*, 711 F.3d 643, 644-45 (6th Cir. 2013), and consists of the Prevention of Significant Deterioration provisions (“PSD”) and the Non-Attainment New Source Review provisions (“NNSR”). PSD applies to areas that are in compliance with NAAQS, referred to as “attainment” areas, and NNSR applies to “nonattainment” areas, which are areas that do not meet NAAQS. Mich. Admin. Code R. 336.2802(1); Mich. Admin. Code R. 336.2902(1).

Michigan’s PSD regulations prohibit a source from undertaking a “major modification” without first obtaining a permit and complying with applicable PSD

permitting requirements. *See* Mich. Admin. Code R. 336.2802(3). Once such requirement is that the source apply “best available control technology,” commonly referred to as “BACT,” for each regulated NSR pollutant for which the modification would result in a significant net emissions increase. Mich. Admin. Code R. 336.2810(3). BACT is defined as:

[A]n emissions limitation, including a visible emissions standard, based on the maximum degree of reduction for each regulated new source review pollutant, which would be emitted from any proposed major stationary source or major modification which [EGLE] – on a case-by-case basis, taking into account energy, environmental, and economic impacts and other costs – determines is achievable for such source or modification through application of production processes or available methods, systems, and techniques, including fuel cleaning or treatment or innovative fuel combination techniques for control of the pollutant.

Mich. Admin. Code R. 336.2801(f).

Similarly, Michigan’s NNSR regulations prohibit a source from undertaking a “major modification” without first obtaining a permit and complying with applicable NNSR permitting requirements. *See* Mich. Admin. Code R. 336.2903. Once such requirement is that the source comply with the “lowest achievable emissions rate,” or “LAER,” for each regulated NSR pollutant for which the area is designated as nonattainment. Mich. Admin. Code R. 336.2908(3). LAER is defined as the more stringent rate of emissions of the following:

- (i) The most stringent emissions limitation that is contained in the implementation plan of any state for the same class or category of stationary source, unless the owner or operator of the proposed stationary source demonstrates that the limitations are not achievable.

- (ii) The most stringent emissions limitation that is achieved in practice by the same class or category of stationary sources. This limitation, when applied to a modification, means the lowest achievable emissions rate for the new or modified emissions units within a stationary source.

Mich. Admin Code R. 336.2901(s).

Section 113(b) of the Clean Air Act authorizes district courts to “restrain such violation[s], to require compliance, to assess [a] civil penalty, . . . and to award any other appropriate relief” where a source owner or operator violates the Act. 42 U.S.C. § 7413(b). Under the plain text of the statute, the Court has broad discretion to fashion a remedy for Defendants’ Clean Air Act violations.

B. Factual¹ and Procedural Background

Defendant EES Coke owns and operates the EES Coke Facility located on Zug Island, River Rouge in Michigan. The Facility maintains a coke oven battery consisting of 85 six-meter-high ovens used to produce blast furnace coke, an essential component in steel manufacturing. The ovens are powered by burning fuel at the underfire, and EES Coke has historically fueled the battery by using a mixture of blast furnace gas (“BFG”) and coke oven gas (“COG”). As a byproduct of the coking process, the Facility generates COG, which can be used in three ways: (1) burned at the underfire as fuel, (2) sent to other facilities for use as fuel, or (3) burned

¹ The Court made these factual findings when it found EES Coke liable for the alleged Clean Air Act violations.

at the flare, a safety mechanism used to dispose of excess COG. Burning COG at the flare is a last-resort option because it yields no beneficial use, while using it as fuel serves a productive purpose. Any COG that is not used as fuel at underfire or sent to other facilities must be burned at the flare. When burned, COG emits SO₂ into the air, among other pollutants.

Over time, EES Coke's use of BFG as fuel began to cause premature damage to the battery. To mitigate further damage, EES Coke submitted a permit application to EGLE in May 2013 for the temporary removal of the heat input limit on COG combustion at underfire, which had been imposed by a permit issued to EES Coke's predecessor. In its application, EES Coke explained that eliminating this limit would allow it to reduce its reliance on BFG by enabling it to solely use COG as fuel at underfire. EES Coke also indicated its intent to file a separate permit application for the permanent removal of the COG combustion limit. EGLE approved the application and issued the permit in November 2013 ("the 2013 Permit").

In June 2014, EES Coke submitted a second permit application seeking the permanent removal of the underfire COG combustion limit. EES Coke conducted an NSR analysis to determine whether this proposed change would constitute a major modification with respect to SO₂ and PM_{2.5}, which would have required it to implement BACT and LAER. Based on its analysis, EES Coke concluded that the

proposed change was not a major modification with respect to SO₂ and PM_{2.5}. EGLE approved the permit in November 2014 (“the 2014 Permit”).

In September 2020, the EPA issued a Notice of Violation to EES Coke, alleging that the 2014 Permit's elimination of the underfire COG combustion limit caused a significant emissions increase and significant net increase of SO₂ emissions, rendering the change a “major modification” under NNSR. The EPA further asserted that, because SO₂ is a precursor to PM_{2.5}, the increase also rendered the change a major modification under PSD.

The Government initiated the present lawsuit on June 1, 2022, alleging that EES Coke violated NSR by (1) undertaking a major modification without first complying with NSR's permitting requirements (Count I), and (2) failing to comply with NSR's “reasonable possibility” reporting requirements (Count II). The Government later amended its complaint to add the DTE Defendants to this case, claiming they are also liable for the alleged Clean Air Act violations as “operators” of the Facility. Furthermore, the Court allowed Sierra Club and the City of River Rouge to participate in this case as intervening plaintiffs.

In February 2025, the Government, EES Coke, the DTE Defendants, and Sierra Club filed motions for summary judgment. The Government sought summary judgment solely with respect to EES Coke's liability. The Court granted the Government's motion and denied EES Coke's motion, finding EES Coke liable on

Counts I and II. The Court denied the DTE Defendants' motion for summary judgment, finding that genuine issues of material fact existed with respect to whether they are operators of the Facility. Lastly, Sierra Club moved for summary judgment on two issues: its standing in this case and the remedy the Court should impose. The Court denied Sierra Club's motion, finding that it had not demonstrated a need to establish standing and that the appropriate remedy would be determined at trial.

The Court held a bench trial on the DTE Defendants' liability and the appropriate remedy from September 15, 2025 to September 29, 2025. The City of River Rouge did not present any evidence or argumentation. Following the trial, the parties submitted their proposed findings of fact and conclusions of law.

III. LEGAL STANDARD

Federal Rule of Civil Procedure 52 provides that, "[i]n an action tried on the facts without a jury . . . the court must find the facts specially and state its conclusions of law separately." Fed. R. Civ. P. 52(a)(1). "The findings and conclusions . . . may appear in an opinion or a memorandum of decision filed by the court." *Id.*

IV. THE DTE DEFENDANTS' OPERATOR LIABILITY

A. Findings of Fact

The Court finds the facts stated herein based on its evaluation of the evidence, including the credibility of the witnesses, and the inferences that the Court has found reasonable to draw from the evidence.

1. The DTE Defendants exhibit a high degree of control over the Facility, including over environmental decision-making and the Facility's emissions-related activities. This is shown through the individual actions of the DTE Defendants' employees and is baked into the DTE corporate structure. The Facility cannot function without the DTE Defendants exercising control. (ECF No. 374, PageID.26061).

2. EES Coke has no employees of its own. (*Id.* at PageID.26072). As set forth below, all individuals involved in the management and operations of the Facility are employed by other companies, including DTEES and DTEER.

i. DTEES

3. EES Coke is a subsidiary of DTE Coke Holdings LLC ("Coke Holdings"), a Delaware limited liability company. (ECF No. 372, PageID.25721). Coke Holdings, in turn, is a subsidiary of DTEES, a Michigan corporation. (*Id.* at PageID.25721-22).

4. In 2008, DTEES and EES Coke entered into a Management Services Agreement ("2008 MSA"). The 2008 MSA provides that DTEES "shall . . . provide all services as may be required to facilitate the proper management and administration of [EES Coke's] activities in respect of the Facility, including those services more particularly described in Schedule A." (Pl's. Ex. 556). The services described in Schedule A include: (1) the "[d]ay-to-day management and

administration of [EES Coke's] business relating to the Facility"; (2) "maintain[ing] and monitor[ing] compliance with all Permits and notify[ing] [EES Coke] of . . . the need for any new or further Permits"; (3) "[act[ing] on [EES Coke's] behalf in all dealings with Governmental Authorities, including . . . negotiating and preparing agreements with, or Permits issued or to be issued by, Governmental Authorities"; and (4) monitoring "the environmental health and safety of the Facility . . . including (a) identifying the existence of any significant environmental issues and (b) evaluating any new or alternate technologies to address any significant environmental issues." (*Id.*). The 2008 MSA remains in effect today. *See id.*

5. Employees of DTEES or other affiliated entities perform the services under the 2008 MSA.

6. For example, Gary Gross was employed by DTEES and served as EES Coke's Vice President from 2008 to 2015. (ECF No. 372, PageID.25720; Pl.'s. Ex. 836 at 21).

7. David Smith is employed by DTEES and has served as EES Coke's Vice President from 2015 to present. (ECF No. 372, PageID.25721; Pl.'s. Ex. 836 at 21). Mr. Smith is responsible for various aspects of the Facility's compliance with environmental regulations, including NSR. (Pl.'s Ex. 837 at 11-12).

8. Marion Krchmar is employed by DTEES and has served as the Facility's Plant Manager since 2015. (Pl.'s Ex. 837 at 21).

9. Ronald Burnette is a DTEES employee who has served as EES Coke's Director of Operations since March 2015. (Pl.'s Ex. 837 at 11-12). He previously served as the Facility's Plant Manager from 2012 to 2015. (Pl.'s Ex. 837 at 15).

10. Mr. Burnette and Mr. Krchmar are responsible for leading the Facility's day-to-day operations and making day-to-day management decisions. (Pl's. Ex. 837 at 21; ECF No. 392, PageID.27488).

11. All personnel working to service EES Coke take direction from Mr. Burnette. (ECF No. 391, PageID.27443; ECF No. 392, PageID.27488).

12. Mr. Burnette is responsible for various aspects of the Facility's compliance with environmental regulations at the Facility, including NSR. (Pl's. Ex. 837 at 11-12).

13. Mr. Burnette and Mr. Gross made the final decision to seek the 2013 Permit and the 2014 Permit. (Pl's. Ex. 836 at 8).

14. Mr. Burnette had signatory authority for the 2014 Permit and signed the application on behalf of EES Coke. (Pl's. Ex. 1; Pl's. Ex. 165).

15. Dr. Michael Shafer is a DTEES employee who served as Business Unit Manager starting in 2010, and became General Manager of Technology in 2022. (Pl's. Ex. 836 at 15).

16. Dr. Shafer is responsible for developing EES Coke's coal blend on an annual basis, and doing so is one of his main responsibilities as a DTEES employee.

(ECF No. 394, PageID.27638-39). Managing the sulfur content in the coal blend is the main control EES Coke has in place to manage its SO₂ emissions. (*Id.*). The higher the coal blend's sulfur content, the more SO₂ emissions are released as a result of burning coal at the Facility. (ECF No. 392, PageID.27554-55).

17. Dr. Shafer is responsible for developing EES Coke's operating plan, which, among other things, sets forth the Facility's environmental goals for the year. (ECF No. 394, PageID.27640-43; Pl's. Ex. 556; Pl's. Ex. 1017; Pl's. Ex. 1018; Pl's. Ex. 1019). While, under the 2008 MSA, the operating plan is to be drafted by DTEES and approved by EES Coke, Dr. Shafer provided final approval of the operating plan on at least one occasion. (Pl's. Ex. 1017; Pl's. Ex. 1018).

18. David Fanning was a DTEES employee from 2007 to 2020. (Pl.'s Ex. 836 at 12-13).

19. In 2015, EES Coke looked into implementing desulfurization equipment at the Facility, and Mr. Burnette and Dr. Shafer made the ultimate decision to not implement this equipment at the Facility. (ECF No. 392, PageID.27500-02).

20. Dr. Shafer, Mr. Smith, and Mr. Fanning participated in meetings with U.S. Steel to discuss desulfurization options and costs at the Facility. (*See* Pl's. Ex. 86).

ii. DTEER

21. DTEES is a subsidiary of DTEER, a Delaware limited liability company. (*See* ECF No. 372, PageID.25722). DTEER is also referred to as DTE Vantage. (ECF No. 377, PageID.26190).

22. In April 2017, DTEES and DTEER entered into a Management Services Agreement (“2017 MSA”). (Pl’s. Ex. 424). While DTEER does not have a management services agreement with EES Coke directly, the 2017 MSA gives DTEER “the authority to do on behalf of DTEES, in DTEES’ name, all things that are necessary, proper or desirable to carry out the duties of DTEER under this Agreement, including the authority to perform on DTEES’ behalf any agreement entered into by DTEES with respect to” the Facility. (*Id.* at 2). In this way, the 2017 MSA gives DTEER a level of control over the Facility that is materially similar to that of DTEES under the 2008 MSA.

23. No such agreement between DTEES and DTEER existed before April 2017. (ECF No. 375, PageID.26117-18; ECF No. 392, PageID.27526-27). The lack of an agreement means that any actions taken by DTEER employees on behalf of EES Coke before April 2017 were taken solely in their capacity as DTEER employees.

24. Fadi Mourad, a DTEER employee, served as Director of Environmental Affairs from 2011 to 2013. (Pl’s. Ex. 836 at 14). Mr. Mourad was responsible for

various aspects of compliance with environmental regulations at the Facility, including NSR. (Pl's. Ex. 837 at 11-12).

25. In 2012, DTEER hired NTH Consultants, Ltd. ("NTH") to assist it with preparing the 2013 Permit for the Facility. (Pl's. Ex. 470). NTH's proposal and cost estimate was addressed to Mr. Mourad. *Id.*

26. Steve Zervas, a DTEER employee, served as an Environmental Engineer or Supervisor from 2010 to 2017. (Pl's. Ex. 836 at 16).

27. Mr. Zervas was responsible for various aspects of the Facility's compliance with environmental regulations, including NSR. (Pl's. Ex. 837 at 11-12). For instance, he led the permitting process with support for Mr. Mourad. Mr. Zervas initiated and developed the 2013 Permit and 2014 Permit applications, communicated with NTH, and engaged with EGLE on behalf of EES Coke. Furthermore, Mr. Zervas worked directly with NTH to develop a permit strategy for the Facility to use 100% coke oven gas full-time. (Pl's Ex. 31; Pl's Ex. 88; Pl's. Ex. 90; Pl's. Ex. 95; Pl's. Ex. 97; Pl's. Ex. 450; Pl's. Ex. 836 at 6-10).

28. Robert Sanch, a DTEER employee, has served as an Environmental Affairs Supervisor from 2013 to present. (Pl's. Ex. 836 at 15). Mr. Sanch is responsible for various aspects of the Facility's compliance with environmental regulations, including NSR. (Pl's. Ex. 837 at 11-12).

29. Brenna Harden, a DTEER employee, served as an Environmental

Engineer from 2013 to 2023. (Pl's. Ex. 836 at 13). Ms. Harden was responsible for various aspects of the Facility's compliance with environmental regulations, including NSR. (Pl's. Ex. 837 at 11-12).

30. Ms. Harden regularly served as the point of contact for EPA regarding the Facility's Clean Air Act compliance. (Pl's. Ex. 24; Pl's. Ex. 390; ECF No. 383, PageID.26701).

31. DTEER plays a role in EES Coke's entry into sales and supply agreements. For example, in 2022, DTEER sought DTEEC's approval for EES Coke to enter into a COG supply agreement. (Pl's. Ex. 279; Pl's. Ex. 280; ECF No. 377, PageID.26198-99).

iii. DTEEC

32. DTEER is a subsidiary of DTEEC, a Michigan corporation. (ECF No. 372, PageID.25722).

33. EES Coke does not maintain any cash of its own or have its own bank account. (ECF No. 375, PageID.26162). Instead, all of its cash is swept into a centralized bank account that is managed by DTEEC. (*Id.*).

34. In 2021, DTEEC and EES Coke entered into a Cash Management Services and Working Capital Loan Agreement ("2021 Cash and Loan Agreement"), under which DTEEC directly manages EES Coke's cash and pays expenses on its behalf. (Pl's. Ex. 557). The 2021 Cash and Loan Agreement also authorizes

DTEEC to provide EES Coke with loans not to exceed the loan limits established by DTEEC. (*Id.*).

35. Under the 2021 Cash and Loan Agreement, loan limits are to be dictated by DTEEC. In practice, DTEEC regularly adjusts the loan limits to reflect EES Coke's financial position. (ECF No. 375, PageID.26163-64; Pl's. Ex. 601; Pl's Ex. 602; Pl's. Ex. 604).

36. Prior to entering into the 2021 Cash and Loan Agreement, EES Coke acted as though this agreement was in effect, going back at least to 2013. DTEEC controlled EES Coke's cash and its access to capital even in the absence of a written agreement authorizing it to do so. (ECF No. 375, PageID.26159).

37. EES Coke cannot make capital expenditures of any amount at the Facility without parent company approval, including for environmental expenditures. (ECF No. 377, PageID.26188-92). For example, capital expenditures for projects costing between \$10 million and \$25 million must be approved by DTEEC's Chief Financial Officer and Chief Operating Officer. (Pl's. Ex. 631).

38. DTEEC plays a role in approving EES Coke's sales and supply contracts. For example, in 2022, DTEER sought DTEEC's approval for EES Coke to enter into a COG sales agreement with Carmeuse. (Pl's. Ex. 280; ECF No. 377, PageID.26198-99).

B. Conclusions of Law

i. Operator Liability Under the Clean Air Act

The Clean Air Act imposes strict liability on owners and operators that violate its provisions. *United States v. Anthony Dell'Aquila Enters. and Subsidiaries*, 150 F.3d 329, 332 (3d Cir. 1998). The Act broadly defines the term “owner or operator” as “any person who owns, leases, operates, controls, or supervises a stationary source.” 42 U.S.C. § 7411(a)(5). In the absence of a more precise definition of this term, courts look to the Supreme Court’s decision in *United States v. Bestfoods*, 524 U.S. 51 (1998), where it interpreted the term as used in the Comprehensive Environmental Response, Compensation, and Liability Act of 1980 (“CERCLA”). *See, e.g., Anthony Dell'Aquila*, 150 F.3d at 332. *Bestfoods* is instructive because the purposes of CERCLA and the Clean Air Act are “the same,” and the definition of the term “owner or operator” is nearly identical in both statutes. *Id.* at 334.

The question before the *Bestfoods* Court was “whether a parent corporation that actively participated in, and exercised control over, the operations of a subsidiary may, without more, be held liable as an operator of a polluting facility owned or operated by the subsidiary.” *Bestfoods*, 524 U.S. at 55. The Court held that a parent company cannot be held liable solely by virtue of its control over the subsidiary, unless the corporate veil can be pierced. *Id.* This conclusion rests on the “general principle of corporate law . . . that a parent corporation (so-called because

of control through ownership of another corporation's stock) is not liable for the acts of its subsidiaries.” *Id.* at 61.

Critically, however, the Court distinguished between a parent company's control over the *subsidiary* and its control over the *facility*. The former, which typically involves activities that “are consistent with the parent's investor status, such as monitoring of the subsidiary's performance, supervision of the subsidiary's finance and capital budget decisions, and articulation of general policies and procedures,” does not, without more, give rise to operator liability. *Id.* at 72. Rather, to be directly liable as an operator, the parent company must have “actively participated in, and exercised control over, the operations of the facility itself.” *Id.* at 55. This control must “specifically relate[] to pollution, that is, operations having to do with the leakage or disposal of hazardous waste, or decisions about compliance with environmental regulations.” *Id.* at 66-67. “[T]he statute obviously meant something more than mere mechanical activation of pumps and valves, and must be read to contemplate ‘operation’ as including the exercise of direction over the facility’s activities.” *Id.* at 71.

The Court articulated three potential ways in which a parent corporation's operation of a facility can lead to direct liability. First, “a parent can be held directly liable when the parent operates the facility in the stead of its subsidiary or alongside the subsidiary in some sort of a joint venture.” *Id.* Second, in instances where the

parent company and the subsidiary share corporate officers, the parent company is an operator where “a dual officer or director might depart so far from the norms of parental influence exercised through dual officeholding as to serve the parent, even when ostensibly acting on behalf of the subsidiary in operating the facility.” *Id.* Lastly, operator liability can be found where “an agent of the parent with no hat to wear but the parent's hat might manage or direct activities at the facility.” *Id.* At bottom, “[t]he critical question is whether, in degree and detail, actions directed to the facility by an agent of the parent alone are eccentric under accepted norms of parental oversight of a subsidiary's facility.” *Id.* at 72.

Following *Bestfoods*, the Sixth Circuit adopted the “actual control” test to determine whether an entity is an operator under CERCLA. *United States v. Township of Brighton*, 153 F.3d 307, 314 (6th Cir. 1998). This test requires a parent to “perform affirmative acts” in order to be an operator. *Id.* “The failure to act, even when coupled with the ability or authority to do so, cannot make an entity into an operator.” *Id.* However, “[o]nce affirmative acts have been found to render someone an operator, it is no defense to liability for that operator to say it was not the actor responsible for a *particular* hazard.” *Id.* at 315 (emphasis in original). The Sixth Circuit has cautioned that “[a]s helpful as the ‘actual control’ test may be,” it “does not supplant the primary question of whether an entity’s activities satisfy the ordinary meaning of the term ‘operator.’” *Am. Premier Underwriters, Inc. v. Gen.*

Elec. Co., 14 F.4th 560, 575 (6th Cir. 2021) (cleaned up). Determining whether a parent company is an operator is a “fact-intensive inquiry” that requires analyzing the “totality of the circumstances.” *Id.*

The existence of a bargained-for services agreement, under which the parent is to provide services for the subsidiary, does not, standing alone, insulate the parent from operator liability. Under the plain language of the Clean Air Act, *any* person who operates a source is strictly liable for the source’s Clean Air Act violations, regardless of whether the person is operating the facility pursuant to a contractual agreement. This reading of the statute is reinforced by *Bestfoods*, which stands for the proposition that corporate formalities alone cannot shield a parent company from operator liability when the parent exercises control over the subsidiary’s facility. As such, even where the parent operates the facility pursuant to a contractual agreement, it may nevertheless still be found liable for the facility’s Clean Air Act violations. To hold otherwise would allow companies to structure their affairs in a manner that allows them to skirt Clean Air Act liability under the guise of arm’s length agreements.

ii. DTEES is an Operator of the Facility

DTEES is an operator of the Facility because it actively participates in, and exercises actual control over, the Facility’s environmental and emissions-related activities. The 2008 MSA grants DTEES exceptionally broad authority over the

Facility's operations, and DTEES employees exercise that authority in practice. For example, since at least 2012, DTEES employees have led the Facility's day-to-day operations, with all of the Facility's personnel working under their direction.

Moreover, DTEES employees are responsible for various aspects of the Facility's compliance with environmental regulations, including NSR. Notably, DTEES employees made the final decision to pursue the 2013 Permit and 2014 Permit, and worked to obtain them for EES Coke. Without the 2014 Permit, the Facility could not have burned enough COG at underfire to cause the significant increase in SO₂ emissions. And although the permits predate EES Coke's Clean Air Act violations by several years, DTEES's direct involvement in obtaining them constitutes an affirmative act that enabled the Facility's subsequent emissions.

DTEES employees have also exercised actual control over the Facility's pollution controls. For instance, when EES Coke looked into installing desulfurization technology at the Facility in 2015, DTEES employees made the ultimate decision not to do so. That decision was an affirmative act demonstrating DTEES's actual control over the Facility, and the installation of that technology could have resulted in less SO₂ emissions during the violation period. Lastly, Dr. Shafer, a DTEES employee, is responsible for developing EES Coke's coal blend, which is the Facility's primary mechanism for controlling its SO₂ emissions. This is an affirmative act that directly influences the amount of SO₂ emitted by the Facility.

DTEES's participation in, and control over, the Facility's operations is eccentric under accepted norms of parental oversight over a subsidiary. Its conduct goes well beyond what is consistent with a parent company's investor status, which typically involves activities such as monitoring and supervising the subsidiaries performance, finance, and capital budget decisions, and articulating general policies and procedures. Rather, DTEES's conduct amounts to actual, sustained control over the Facility's environmental and emissions-related activities.

For these reasons, the Court finds that the Government has established by a preponderance of the evidence that DTEES is an operator of the Facility, rendering it liable for the Facility's Clean Air Act violations.

iii. DTEER is an Operator of the Facility

DTEER is an operator of the Facility because it actively participates in, and exercises actual control over, the Facility's operations as they relate to its environmental and emissions-related activities. The 2017 MSA grants DTEER exceptionally broad authority over the Facility's operations, and DTEER employees exercise that authority in practice. For example, DTEER employees have been responsible for various aspects of the Facility's compliance with environmental regulations, including NSR, and interface with the EPA regarding the Facility's Clean Air Act violations. Moreover, DTEER played a critical role in EES Coke obtaining the 2013 Permit and the 2014 Permit. Without the 2014 Permit, the Facility

could not have burned enough COG at underfire to cause the significant increase in SO₂ emissions. And although the permits predate EES Coke's Clean Air Act violations by several years, DTEER's direct involvement in obtaining them constitutes an affirmative act that enabled the Facility's subsequent emissions.

DTEER's participation in, and control over, the Facility's operations is eccentric under accepted norms of parental oversight over a subsidiary. Its conduct goes well beyond what is consistent with a parent company's investor status. Rather, DTEER's conduct amounts to actual, sustained control over the Facility's emissions-related activities.

For these reasons, the Court finds that the Government has established by a preponderance of the evidence that DTEER is an operator of the Facility, rendering it liable for the Facility's Clean Air Act violations.

iv. DTEEC is an Operator of the Facility

DTEEC is an operator of the Facility because it actively participates in, and exercises actual control over, the Facility's environmental and emissions-related activities. For example, EES Coke has no bank account of its own, and at all times relevant to this case, DTEEC has managed EES Coke's cash on its behalf, including cash used on environmental issues and the 2014 Permit. This level of control is eccentric under accepted norms of parental oversight. Moreover, EES Coke cannot make capital expenditures of any amount at the Facility without parent company

approval, including for environmental expenditures. According to Defendants' own 2014 estimates, installing desulfurization at the Facility would have had a capital cost of \$165 million. Had Defendants installed desulfurization at the Facility at the time it emitted excess SO₂ emissions, this capital expenditure would have needed to be approved by DTEEC. Lastly, DTEEC approval is needed for EES Coke to enter into certain COG sales agreements. Given that the significant SO₂ emissions at issue in this case are the product of the Facility burning excess COG at underfire, these contracts directly influence the amount of COG burned at the Facility and, consequently, the amount of SO₂ emitted by the Facility. For these reasons, the Court finds that the Government has established by a preponderance of the evidence that DTEEC is an operator of the Facility, rendering it liable for the Facility's Clean Air Act violations.

DTEEC's participation in, and control over, the Facility's operations is eccentric under accepted norms of parental oversight over a subsidiary. Its conduct goes well beyond what is consistent with a parent company's investor status. Rather, DTEEC's conduct amounts to actual, sustained control over the Facility.

In conclusion, the Government has proven by a preponderance of the evidence that the DTE Defendants are operators of the Facility. They exhibit a high degree of control over the Facility, including over environmental decision-making and operations. This is shown through the individual actions of the DTE Defendants'

employees and is baked into the DTE corporate structure. The Facility cannot function without the DTE Defendants exercising control, and in this way, they operate the Facility “in the stead” of EES Coke. As such, the DTE Defendants are, along with EES Coke, liable for the Facility’s Clean Air Act violations.

V. CIVIL PENALTY

A. Findings of Fact

The Court finds the facts stated herein based on its evaluation of the evidence, including the credibility of the witnesses, and the inferences that the Court has found reasonable to draw from the evidence.

39. The statutory maximum penalty for Count I is \$304,843,700.00, and the statutory maximum penalty for Count II is \$111,236,844.00. (ECF No. 383, PageID.26716-19).

40. Government expert Dan Leistra-Jones credibly testified that, by failing to install pollution controls at the time of the major modification, Defendants gained an economic benefit between \$46.4 million and \$99.1 million. (ECF No. 395, PageID.27781-88).

41. Mr. Leistra-Jones calculated several versions of economic benefit with various inputs. He used the Weighted Average Cost of Capital (“WACC”) and the Hurdle Rate as discount rates to measure Defendants’ time value of money. (ECF No. 377, PageID.26233). WACC is a widely used discount rate for estimating the

time value of money and represents the return that investors demand from a business in return for their investment. (*Id.*) The Hurdle Rate, on the other hand, is the minimum rate of return the company itself seeks to achieve of the expenditure to be acceptable. (*Id.* at PageID.26234-35). Mr. Leistra-Jones then adjusted his calculations to consider the installation date of pollution controls and the changes in tax law regarding capital expenditures. (ECF No. 395, PageID.27778-81).

42. Using the inputs Mr. Leistra-Jones found most appropriate:

a. Based on costs from a 2006 EPA study that incorporated Defendants' comments, Mr. Leistra-Jones calculated an economic benefit of approximately \$47 million to \$56.5 million. (ECF No. 395, PageID.27782, PageID.27788).

b. Based on costs from a 2011-2012 study performed for Defendants, Mr. Leistra-Jones calculated an economic benefit of \$68.2 million to \$99.1 million. (ECF No. 395, PageID.27786; PageID.27788).

43. Mr. Leistra-Jones also provided testimony regarding each Defendant's ability to pay for purposes of funding injunctive relief and a civil penalty. He credibly testified that Defendants each have a substantial ability to pay, either through annual cash flow or debt, providing the following calculations:

Defendant	Annual Cash Flow	10-Year Cash Flow Total	10-Year Debt Capacity
EES Coke	\$12.8-\$22 million	\$128.1-\$219.6 million	\$102.5-\$176.2 million
DTEES	\$48.9 million	\$489 million	\$391.7 million
DTEER	\$85.5 million	\$855 million	\$684.7 million

(ECF No. 377, PageID.26208-16). In addition, DTEEC could pay at least \$77 million per year by reducing certain expenditures, including dividends, capital expenditures, and operation and maintenance expenditures. (*Id.* at PageID.26219-22). DTEEC also has the ability to incur additional debt or issue additional equity. (*Id.* at PageID.26222).

44. After EES Coke received the Notice of Violation in September 2020, the Facility continued to emit SO₂ and PM_{2.5} in excess of the significance threshold. (ECF No. 383, PageID.26714-15).

45. EGLE represented to EES Coke that, under the 2014 Permit, it was not required to comply with NSR's "reasonable possibility" reporting requirements. (*See* ECF No. 385, PageID.26859-60; Dfts.' Ex. 316 at 5).

B. Conclusions of Law

i. Civil Penalties Under the Clean Air Act

The Clean Air Act provides that, in determining the amount of any civil penalty to be assessed against a violator of its provisions, the court "shall take into consideration (in addition to such other factors as justice may require) the size of the business, the economic impact of the penalty on the business, the violator's full compliance history and good faith efforts to comply, the duration of the violation as established by any credible evidence (including evidence other than the applicable

test method), payment by the violator of penalties previously assessed for the same violation, the economic benefit of noncompliance, and the seriousness of the violation.” 42 U.S.C. § 7413(e)(1).

There are two approaches that can be used in determining the appropriate penalty for a Clean Air Act violation. The first is a “top down” approach, under which the maximum possible penalty is first established, then reduced following an examination of the mitigating factors set forth above. *United States v. Mun. Auth. of Union Tp.*, 150 F.3d 259, 265 (3d Cir. 1998).² The second uses a “bottom up” approach “whereby the economic benefit a violator gained by noncompliance is established and adjusted upward or downward using the” remaining mitigating factors. *See id.* Because the statute does not itself prescribe either method, the Court is free to use its discretion in choosing the appropriate method. *Id.* No party to this case has advocated for the top-down approach, and they appear to agree that the bottom-up approach is appropriate here. The Court will therefore use the bottom-up approach, which starts with the economic benefit of noncompliance and adjusts up or down depending on other penalty factors.

² While many of the cases cited in this part involve the Clean Water Act, the Court finds them instructive, as civil penalty provision of that statute is similar to that of the Clean Air Act. *See United States v. Stauffer Chemical Co.*, 684 F.2d 1174, 1187 (6th Cir. 1982) (holding that “the Clean Air and Clean Water Acts are *in pari materia* with one another”).

This Court has recognized that the economic benefit of noncompliance “should serve as the floor below which the maximum civil penalty should not be mitigated.” *United States v. Midwest Suspension and Brake*, 824 F. Supp. 713, 737 (E.D. Mich. 1993) (citation omitted). This is because ensuring “that violators do not reap economic benefit by failing to comply with the statutory mandate [of the Clean Air Act] is of key importance if the penalties are successfully to deter violations.” *Id.* (citation omitted). Courts have routinely recognized that it is difficult to prove a violator’s precise economic benefit, and as such, “a court need only make a ‘reasonable approximation’ of economic benefit when calculating a penalty.” *Sierra Club v. Cedar Point Oil Co.*, 73 F.3d 546, 576 (5th Cir. 1996).

ii. Civil Penalty for Count I

The Court finds that a civil penalty of \$100 million for Defendants’ violations under Count I is appropriate. In determining the appropriate penalty, the Court begins with the economic benefit of noncompliance. The Court acknowledges that there are multiple methods for calculating this economic benefit, and the Government and Defendants presented competing expert testimony on this issue. The Court was most persuaded by the testimony of the Government’s expert, Mr. Leistra-Jones, and finds his estimates to be reliable and appropriate. *See United States v. Smithfields Foods, Inc.*, 972 F. Supp. 338, 349 (E.D. Va. 1997) (finding “the avoided and/or delayed cost of compliance, and the weighted average cost of

capital (WACC) as a discount/interest rate in the economic benefit calculation, to be both the best and the appropriate method to determine how much money defendants made on the funds they did not spend for compliance”).

The Court further finds that \$70 million is a rational benchmark for Defendants’ economic benefit of noncompliance. This figure falls within the estimate range calculated by Mr. Leistra-Jones. By delaying or avoiding compliance costs, Defendants were able to use that money in other ways, including for income-producing purposes and reinvesting in their own operations. To ensure the civil penalty levels the economic playing field and adequately deters future Clean Air Act violations, the Court will impose a 1.5 multiplier on the economic benefit of noncompliance. Other courts have recognized that district courts have the discretion to calculate the civil penalty in this manner, as long as the penalty remains below the statutory maximum. *See, e.g., United States v. Allegheny Ludlum Corp.*, 366 F.3d 164, 178 n.6 (3d Cir. 2004) (finding that the district court “was well within its discretion” to calculate civil penalty by doubling the economic benefit of noncompliance); *United States v. Mun. Auth. of Union Twp.*, 150 F.3d 259, 265 (3d Cir. 1998) (same); *United States v. Smithfield Foods, Inc.*, 191 F.3d 516, 529 (4th Cir. 1999) (“[E]ven if the court had simply trebled the economic benefit to determine the appropriate penalty, that was within its discretion, as long as it was below the statutory maximum[.]”). This multiplier brings the civil penalty to \$105 million,

which is well below the statutory maximum.

Next, the Court finds that Defendants' good faith efforts to comply with the 2014 Permit warrants a modest \$5 million reduction in the penalty. Indeed, Defendants did not curtail the Facility's SO₂ emissions following its receipt of the EPA's Notices of Violation, nor have they taken steps to obtain the required NSR permits. Nevertheless, it appears Defendants earnestly believed their excess emissions were lawful under the 2014 Permit. This reduction brings the civil penalty to \$100 million.

Upon consideration of the remaining § 7413(e)(1) factors, the Court finds that none of them warrant increasing or decreasing the penalty. Accordingly, the Court will assess a civil penalty of \$100 million for Defendants' violations under Count I.

iii. Civil Penalty for Count II

The Court finds that a nominal penalty of \$1.00 for Defendants' violations under Count II is appropriate. EGLE represented to EES Coke that no reasonable possibility reporting was required under the 2014 Permit. Moreover, Defendants have since provided the required reporting and have otherwise complied with NSR's reasonable reporting requirements. As such, the Court will assess a nominal penalty of \$1.00.

VI. EQUITABLE RELIEF SOUGHT BY THE GOVERNMENT

A. Findings of Fact

The Court finds the facts stated herein based on its evaluation of the evidence, including the credibility of the witnesses, and the inferences that the Court has found reasonable to draw from the evidence.

46. At trial, Government expert Virginia Galinsky credibly testified that LAER at the Facility would require an emissions limit of 10 grains of hydrogen sulfide (H₂S) per 100 dry standard cubic feet of COG. (ECF No. 384, PageID.26789). In developing this opinion, Ms. Galinsky reviewed state implementation plans and permits issued at facilities of the same class or category as the EES Coke Facility—namely, byproduct coke oven batteries—and this was the most stringent limit Ms. Galinsky found in a state SIP or permit. (*Id.* at PageID.26789-90).

47. Ms. Galinsky credibly testified that a “desulfurization plant” would need to be installed at the Facility for it to achieve this emissions limitation. (ECF No. 384, PageID.26794). She also testified that desulfurization is a “general term” to describe a process by which H₂S is removed from COG prior to combustion. (ECF No. 383, PageID.26732). Doing so prevents H₂S from being emitted as SO₂, which in turn reduces SO₂ emissions. (*Id.*).

48. There are different kinds of desulfurization systems. (*Id.*; ECF No. 384,

PageID.26794; Pl's. Ex. 270). There are also different methods that can be used to achieve desulfurization. (Pl's. Ex. 472 at 53-54).

49. Desulfurization is mature and well-established in the coking industry and other related fields such as oil refining. (ECF No. 384, PageID.26760; Pl's. Ex. 270). It has consistently been found to be very effective at reducing SO₂ emissions. For instance, in 1977, the EPA found that various forms of desulfurization processes were capable of reducing SO₂ emissions by approximately 93 to 97 percent. (Pl's. Ex. 788 at 21; ECF No. 383, PageID.26726). Furthermore, in 2006, an EPA analysis found that the installation of a desulfurization unit should generally be able to reduce SO₂ emissions by at least 90 percent over the long term. (Pl's. Ex. 472 at 55).

B. Conclusions of Law

i. Equitable Relief Award

The Government seeks injunctive relief requiring Defendants to bring the Facility into compliance with NSR. It requests an order requiring Defendants to apply for the required NSR permits within 90 days and to “propose a limit of no greater than 10 grains of hydrogen sulfide per 100 dscf as LAER and full desulfurization as BACT.” ECF No. 405, PageID.28214. The Government further contends that Defendants should be required to install and operate “full desulfurization” at the Facility within three years. *Id.*

The Court agrees that requiring Defendants to achieve NSR compliance at the

Facility constitutes appropriate injunctive relief. Accordingly, the Court will order Defendants to bring the Facility into compliance by applying for and obtaining the requisite NSR “major modification” permits. Because the Facility is located in an area that is in attainment for PM_{2.5} and nonattainment for SO₂, Defendants must obtain NNSR and PSD permits. The Court finds that 250 days is a reasonable amount of time for Defendants to prepare the permit applications, and as such, Defendants shall submit those applications to EGLE within 250 days of the Court’s entry of judgment.

The Court declines to impose any specific emissions limits or pollution controls as BACT or LAER. While the Government presented evidence demonstrating the effectiveness of desulfurization at reducing SO₂ emissions, it did not sufficiently demonstrate what “full desulfurization” would require. Indeed, the evidence presented suggests that there are various kinds of desulfurization processes that are used to reduce SO₂ emissions, and the Court cannot say with reasonable certainty what “full desulfurization” would entail. Moreover, the Court believes that EGLE is best positioned to determine BACT and LAER. EGLE possesses specialized expertise in air permitting and, in the course of the permitting process, evaluates technical information, engages with permit applicants, and considers public input. The Court is reluctant to substitute its judgment for that of this specialized state agency. Lastly, because BACT and LAER are permit requirements,

their selection and implementation will necessarily follow from Defendants obtaining the permits. Accordingly, the Court will not impose specific BACT or LAER requirements and will instead defer to EGLE to make those determinations through the permitting process.

ii. Appropriateness of Equitable Relief

Ordinarily, a party seeking injunctive relief must satisfy the four-part test set forth in *eBay Inc. v. MercExchange, LLC*, 547 U.S. 388, 391 (2006), before a court may grant such relief. Specifically, the party must demonstrate: “(1) that it has suffered an irreparable injury; (2) that remedies available at law, such as monetary damages, are inadequate to compensate for that injury; (3) that, considering the balance of hardships between the plaintiff and defendant, a remedy in equity is warranted; and (4) that the public interest would not be disserved by a permanent injunction.” *Id.*

However, when the injunction is sought pursuant to a federal statute, the court’s exercise of its traditional equitable discretion is “conditioned by the necessities of the public interest which Congress has sought to protect.” *United States v. Scotty’s Inc.*, 173 F. Supp. 3d 549, 553 (E.D. Mich. 2016) (quoting *United States v. Painesville*, 644 F.2d 1186, 1193 (6th Cir. 1981)). Congress may displace the court’s traditional equitable discretion either through the statute’s plain text or by “a necessary and inescapable inference” demonstrating its intent to do so. *Amoco*

Production Co. v. Village of Gambell, 480 U.S. 531, 542 (1987). When Congress has limited this court’s traditional equitable discretion, “unlike with a standard injunction determination, courts do ‘not need to consider whether there is an adequate legal remedy or irreparable injury.’” *Scotty’s Inc.*, 173 F. Supp. 3d at 553 (quoting *United States v. S. Serra Cheese Co.*, No. 14-13077, 2015 WL 6156961, at *6 (E.D. Mich. Oct. 20, 2015)). Instead, “the Government only needs to establish that Defendants violated the statute and there is some cognizable danger of recurrent violation.” *Id.* (cleaned up) (citation omitted).

The Sixth Circuit has recognized that, “[i]n enacting the Clean Air Act, Congress made a determination that the public interest required that substantial measures be taken to combat the deleterious effects of air pollution.” *Painesville*, 644 F.2d at 1193 (citing 42 U.S.C. § 7401). Its enactment of the Clean Air Act “established a high priority for the control of air pollution,” and Congress “recognized that compliance would be expensive in some cases, but the choice was made to require compliance with the standards promulgated by EPA.” *Id.* “Having made that choice, Congress did not contemplate that its decision would be thwarted by judicial reluctance to require compliance when enforcement proceedings are brought and liability is proven.” *Id.* “The district court’s discretionary measures [are] therefore tempered by its obligation to carry out the congressional mandate contained in the Clean Air Act.” *Id.* In this way, Congress limited this Court’s

traditional equitable discretion. Thus, the *eBay* factors do not govern, and the Government need only establish that Defendants violated the statute and there is some cognizable danger of recurrent violation.

Applying these principles, the Court finds that injunctive relief is appropriate. First, the Court has already found that Defendants violated the Clean Air Act. Second, there is a cognizable danger of recurrent violation of Count I, as Defendants have neither obtained the required NSR permits nor implemented pollution control technology to address their excess SO₂ and PM_{2.5} emissions.

Even if *eBay* governed, injunctive relief would still be appropriate. For one, the Supreme Court has long recognized that “[e]nvironmental injury, by its nature, can seldom be adequately remedied by money damages and is often permanent or at least of long duration, *i.e.*, irreparable.” *Amoco*, 480 U.S. at 545. Moreover, the balance of hardships strongly weighs in favor of injunctive relief. An injunction requiring Defendants to comply with NSR imposes a relatively minor hardship, and it is the cost of following the law. The balance of hardships favors injunctive relief. Lastly, the public will benefit from Defendants’ compliance with the law. Accordingly, the Court finds that the injunctive relief is appropriate.

VII. EQUITABLE RELIEF SOUGHT BY SIERRA CLUB

A. Findings of Fact

The Court finds the facts stated herein based on its evaluation of the evidence,

including the credibility of the witnesses, and the inferences that the Court has found reasonable to draw from the evidence.

i. Sierra Club

50. Sierra Club is a membership organization with approximately 17,000 members in Michigan, 7,000 of whom are in Wayne County. (ECF No. 388, PageID.27079). As Sierra Club's Michigan Chapter Director Elayne Coleman testified, its mission is for all people to explore, enjoy, and protect the outdoors. (*Id.* at PageID.27076). In Detroit, Sierra Club hears its members' air quality concerns, and it advocates and litigates so that they can enjoy their parks, neighborhoods, and a healthier community. (*See id.* at PageID.27075-77).

51. At trial, three Sierra Club members provided credible testimony concerning the harms caused by the Facility's excess emissions: Theresa Landrum, Dr. Dolores Leonard, and Vicki Dobbins.

52. Ms. Landrum has lived in Detroit's 48217 zip code for 71 years. She lives approximately three miles from the Facility. (ECF No. 387, PageID.26995).

53. Ms. Landrum described the Facility as "a big giant black monster" that she sees flaring, located in an area with dusty and pungent air. (*Id.* at PageID.26998-99). When she is near the Facility, she has difficulty breathing, coughs, feels her chest tighten, sneezes, and gets serious headaches and eye irritation. (*Id.* at PageID.27000, PageID.27002).

54. Because of the Facility's emissions, Ms. Landrum has reduced her outdoor activities such as bike riding, running, and speedwalking. (*Id.* at PageID.27000-02). Ms. Landrum has also taken steps to reduce her exposure to air pollution at home, such as installing an air purifying system, investing in air conditioning and better air filters for her furnace, and keeping her windows closed. (*Id.*) She believes that her home air purification system improves air quality and "has improved [her] life" by helping to manage her exposure to air pollution. (*Id.* at PageID.27003). She also believes that others in her community would benefit from such systems but lack the financial means to purchase their own. (*Id.* at PageID.27003-04).

55. Dr. Leonard has lived in Detroit's 48217 zip code since 1957. (*Id.* at PageID.27028-29).

56. Dr. Leonard no longer goes in the direction of the Facility because of its odor and a feeling she gets in her chest when near it. (*Id.* at PageID.27034).

57. Dr. Leonard used to spend hours at a time gardening in her backyard. (*Id.* at PageID.27040). Now, however, she can only spend a half-hour to an hour gardening before going inside because of chest pain and trouble breathing. (*Id.* at PageID.27038-40).

58. Ms. Dobbins has lived in River Rouge, about two miles from the Facility, since 1945. (ECF No. 388, PageID.27061).

59. Ms. Dobbins is concerned about air pollution from the Facility. (*Id.* at PageID.27062). These concerns cause her to keep her windows closed at home, and she no longer rides her bike in the neighborhood. (*Id.* at PageID.27062-63). If there was less air pollution in the neighborhood, Ms. Dobbins would ride her bike in the neighborhood and leave her windows open at home. (*Id.* at PageID.27064).

ii. Harm to Communities Surrounding the Facility

60. The Facility is one of Michigan's largest SO₂ emissions sources. (ECF No. 383, PageID.26709).

61. Government expert Lyle Chinkin provided credible testimony concerning the impacts of the Facility's excess emissions. He used AERMOD to compare the Facility's emissions in the first "few miles" beyond its fence line to a scenario in which its combustion stack and flare SO₂ emissions were reduced by 95 percent. (ECF No. 378, PageID.26351-54). He used CAMx to analyze the impacts on ambient PM_{2.5} concentrations throughout the United States from the conversion of the Facility's excess SO₂ emissions in the atmosphere. (ECF No. 379, PageID.26382-99).

62. Mr. Chinkin's AERMOD results showed that the Facility's excess SO₂ emissions reached the neighboring communities of River Rouge and the 48217 zip code in concentrations of approximately 11 to 18 parts per billion ("ppb"). (Pl's. Ex. 989; ECF No. 388, PageID.27077-78). For every location modeled within several

miles of the Facility, SO₂ concentrations resulting from the excess SO₂ emissions were at least 4.3 ppb, which is greater than EPA's Significant Impact Level of 3 ppb. (ECF No. 379, PageID.26371-72). Mr. Chinkin credibly testified that these are "extremely large impacts from one source," with significant impacts at nearby schools, hospitals, and parks. (*Id.* at PageID.26377-80).

63. Mr. Chinkin's CAMx results showed that the highest concentrations of PM_{2.5} formed from the Facility's excess SO₂ emissions are present in the Detroit area, including River Rouge and the 48217 zip code. (*See, e.g.*, Pl's. Ex. 996).

64. Government expert Dr. Joel Schwartz, a leading scientist on the health effects of air pollution, provided credible testimony about the health effects of SO₂ and PM_{2.5}.

65. Even very brief exposure to SO₂ can cause increased risks for asthma attacks, as well as other respiratory effects and the exacerbation of respiratory diseases. (ECF No. 382, PageID.26590-92).

66. PM_{2.5} exposure can cause numerous adverse health effects, including asthma attacks, heart attacks, strokes, increased blood pressure, and increased risk of cancer, asthma, Alzheimer's disease, and early deaths. (ECF No. 380, PageID.26497). These effects are well-established and the subject of scientific consensus. (ECF No. 382, PageID.26547-56).

B. Conclusions of Law

i. Sierra Club's Standing to Seek Injunctive Relief

Sierra Club seeks injunctive relief, distinct from that sought by the Government, that aims to redress the harm Defendants have caused to the communities surrounding the Facility. An intervenor must establish standing when it seeks different relief from the plaintiff. *Chapman v. Tristar Prods., Inc.*, 940 F.3d 299, 304 (6th Cir. 2019). An organization has standing to sue if (1) at least one of its members would otherwise have standing to sue in their own right; (2) the interests at stake in the litigation are germane to the organization's purpose; and (3) neither the claim asserted nor the relief requested requires an individual member's participation in the lawsuit. *Friends of the Earth, Inc. v. Laidlaw Env. Servs., Inc.*, 528 U.S. 167, 182 (2000) (citation omitted).

1. At Least One Sierra Club Member Would Otherwise Have Standing

At least one Sierra Club member would have standing to sue. To have standing, an individual must satisfy three requirements. First, she must have suffered a "injury in fact" that is both (a) concrete and particularized and (b) actual or imminent, not conjectural or hypothetical. *Lujan v. Defenders of Wildlife*, 504 U.S. 555, 560 (1992). Second, the injury must be fairly traceable to the challenged action. *Id.* at 561. Third, it must be likely, not just speculative, that a favorable decision will

redress the injury. *Id.*

First, individual Sierra Club members have suffered injuries in fact. For example, when near the Facility, Ms. Landrum experiences difficulty breathing, tightness in her chest, serious headaches, coughing, and eye irritation, and Dr. Leonard experiences a bad feeling in her chest. Furthermore, at her home near the Facility, Dr. Leonard experiences chest pain and difficulty breathing after just a half hour of outdoor gardening. Moreover, Ms. Landrum bikes, speedwalks, and runs outside less often. Ms. Dobbins keeps her windows closed and stopped riding her bike in the neighborhood. The Sixth Circuit has recognized that aesthetic and recreational injury from “regional haze,” reduced “outdoor activities,” and potential physical injury in the form of “respiratory symptoms” caused by increased particulate matter is each a judicially cognizable form of injury. *Club v. EPA*, 793 F.3d 656, 663 (6th Cir. 2015). Moreover, the Supreme Court has held that “environmental plaintiffs adequately allege injury in fact when they aver that they use the affected area and are persons ‘for whom the aesthetic and recreational values of the area will be lessened’ by the challenged activity.” *Friends of the Earth, Inc.*, 528 U.S. at 183; *see also Sierra Club v. Morton*, 762 F.3d 971, 977 (9th Cir. 2014) (“In addition, ‘evidence of a credible threat to the plaintiff’s physical well-being from airborne pollutants’ may establish an injury in fact.”).

Second, these injuries are fairly traceable to Defendants' excess SO₂ and PM_{2.5} emissions because they arise in close geographical proximity to the Facility. Moreover, the respiratory symptoms described by Sierra Club members are consistent with the effects of SO₂, as Dr. Schwartz testified. Where there are multiple pollution sources in an area, injuries need not be traced to a single facility. *See Sierra Club v. Cedar Point Oil Co. Inc.*, 73 F.3d 546, 558 (5th Cir. 1996) (“[T]he fairly traceable element does not require that the plaintiffs ‘show to a scientific certainty that [the] defendant’s effluent, and [the] defendant’s effluent alone, caused the precise harm suffered by the plaintiffs.’”). Rather, it is sufficient for Sierra Club to show that the Facility’s excess emissions *contributed* to the pollution that is the source of its members’ injuries. *See id.* (citing *Nat’l Res. Def. Council, Inc. v. Watkins*, 954 F.2d 974, 980 (4th Cir. 1992); *Pub. Int. Rsch. Grp. of New Jersey, Inc. v. Powell Duffryn Terminals Inc.*, 913 F.2d 64, 72 n.8 (3d Cir. 1990).

Lastly, Ms. Landrum’s, Dr. Leonard’s, and Ms. Dobbin’s injuries are redressable by the equitable relief they seek, as this relief will serve to mitigate the health and recreational effects of Defendants’ SO₂ and PM_{2.5} emissions in their communities. As with civil penalties, requiring Defendants to spend money on environmental and health projects provides redress by deterring violations.

2. The Interests at Stake in the Litigation are Germane to the Organization’s Purpose

Next, the interests at stake in this litigation are germane to Sierra Club's purpose. As the Sixth Circuit has recognized, the subject matter of the suit must "bear[] a reasonable connection to the association's knowledge and experience." *Dayton Area Chamber of Com. v. Kennedy*, 147 F.4th 626, 632 (6th Cir. 2025) (citation omitted). Sierra Club's mission is to ensure all people are able to explore, enjoy, and protect the outdoors. This lawsuit, which centers around the Facility's excess SO₂ emissions into the air, certainly bears a reasonable connection to Sierra Club's organizational purpose.

3. The Relief Requested Does Not Require the Participation of Individual Sierra Club Members in the Lawsuit

Lastly, the equitable relief sought by Sierra Club does not require the participation of its individual members in this lawsuit. "The individual participation of an organization's members is 'not normally necessary when an association seeks prospective or injunctive relief for its members.'" *Sandusky Cnty. Democratic Party v. Blackwell*, 387 F.3d 565, 574 (6th Cir. 2004) (quoting *United Food & Com. Workers Union Local 751 v. Brown Group, Inc.*, 517 U.S. 544, 546 (1996)). Such is the case here.

For these reasons, the Court concludes that Sierra Club has standing to seek equitable relief.

ii. Equitable Relief Award

Sierra Club seeks an order requiring Defendants to form a Residential Air Purifier Program, which would entail distributing \$12 million worth of stand-alone High Efficiency Particulate Air (“HEPA”) air purifier devices to households within communities near the Facility. Sierra Club also seeks an order requiring Defendants to fund \$30 million worth of community air quality improvement projects and establish a Community Air Quality Action Committee to administer those projects. Sierra Club proposes that Defendants should be required to share their progress on this equitable relief by publishing semi-annual status reports on a public website.

In light of the testimony provided by Sierra Club members and the circumstances of this case, the Court will issue the following injunctive relief, which it believes is reasonable. Defendants are ordered to establish a Community Quality Action Committee (“Committee”) within 120 days of the Court’s entry of judgment in this case. The Committee shall be made up of seven members: one representative of Defendants; one representative from an academic institution with a focus on public health or the environment; two representatives from environmental advocacy organizations that are actively involved in River Rouge, Ecorse, or 48127; and three community representatives who reside in each of River Rouge, Ecorse, or 48217. Defendants shall consult with Sierra Club to identify a list of individuals to serve on the Committee.

Defendants shall be responsible for convening the Committee as necessary, but no less than once per quarter in its first three years, to consider and select projects with a goal of maximizing public health and air quality improvements in Ecorse, River Rouge, and 48217. The projects may include, but are not limited to, funding for and disbursement of stand-alone HEPA air purifier devices to households within communities near the Facility, the installation of air filtration systems in schools, and home weatherization programs. Defendants shall fund at least \$20 million worth of projects over the course of seven years, with at least \$5 million to be committed to projects within the first three years. The Committee shall make project selections by a majority vote of all members. It may make project selections on a rolling basis. The Committee shall not select, and Defendants shall not fund, any project that would provide a direct financial benefit to Defendants. To share their progress on this equitable relief, Defendants shall make semi-annual status reports available on a public website.

iii. Appropriateness of Equitable Relief

Ordinarily, a party seeking injunctive relief must satisfy the four-part test set forth in *eBay Inc. v. MercExchange, LLC*, 547 U.S. 388, 391 (2006) before a court may grant such relief. However, as the Court explained with respect to the injunctive relief sought by the Government, the *eBay* factors do not apply here, and Sierra Club need only establish that Defendants violated the statute and there is some cognizable

danger of recurrent violation. The Court has found that Defendants have violated the statute and there is a cognizable danger of recurrent violation. As such, injunctive relief is appropriate.

Even if *eBay* governed, the relief sought by Sierra Club would nevertheless still be appropriate. As mentioned above, the Supreme Court has long recognized that “[e]nvironmental injury, by its nature, can seldom be adequately remedied by money damages and is often permanent or at least of long duration, *i.e.*, irreparable.” *Amoco*, 480 U.S. at 545. Moreover, the balance of hardships strongly weighs in favor of injunctive relief. While requiring Defendants to form and fund the Community Quality Action Committee may pose some hardship for Defendants, Sierra Club members face substantial hardship as a result of the Facility’s excess SO₂ emissions. The balance of hardships favors injunctive relief. Lastly, the public will benefit from Defendants forming the Community Quality Action Committee and funding community air quality improvement projects. Accordingly, the Court finds that the injunctive relief is appropriate.

VIII. CONCLUSION

Based on the foregoing, the Court concludes that the Government has proven by a preponderance of the evidence that the DTE Defendants are “operators” of the Facility. Thus, the DTE Defendants are liable for the Facility’s Clean Air Act violations alongside EES Coke. As a remedy, Defendants shall (1) pay a civil penalty

in the amount of \$100,000,001.00, (2) come into compliance with the Clean Air Act by applying for and obtaining the requisite NSR permits, and (3) form a Community Quality Action Committee and provide it with \$20 million in funding for community air quality improvement projects.

It is further ordered that the Government, Sierra Club, and the City of River Rouge shall submit a joint proposed judgment in this matter through the CM/ECF Utilities function by Friday, February 20, 2026.

SO ORDERED.

Dated: February 17, 2026

/s/Gershwin A. Drain
GERSHWIN A. DRAIN
United States District Judge

CERTIFICATE OF SERVICE

Copies of this Order were served upon attorneys of record on February 17, 2026, by electronic and/or ordinary mail.

/s/ Marlena Williams
Case Manager