

October 26, 2018

VIA ELECTRONIC SUBMISSION

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1200 New Jersey Avenue, SE  
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**Attn: Docket No. NHTSA-2017-0069**

**Re: Comments of Environmental Defense Fund on National Highway Traffic Safety Administration’s Draft Environmental Impact Statement for the Proposed Safer Affordable Fuel-Efficient (SAFE) Vehicles Rule for Model Year 2021-2026 Passenger Cars and Light Trucks**

On behalf of our members across the country, Environmental Defense Fund (“EDF”) respectfully submits these comments—including the attached supporting document—on the National Highway Traffic Safety Administration (“NHTSA”)’s Draft Environmental Impact Statement (“DEIS”), Docket ID No. NHTSA-2017-0069-0178, for the Proposed Rule, *The Safer Affordable Fuel-Efficient (SAFE) Vehicles Rule for Model Years 2021–2026 Passenger Cars and Light Trucks*, 83 Fed. Reg. 42,986 (Aug. 24, 2018). NHTSA has proposed this rule jointly with the Environmental Protection Agency (“EPA”), *see* Docket ID No. EPA-HQ-OAR-2018-0283.

EDF is a non-partisan, non-governmental environmental organization representing over two million members nationwide. Since 1967, EDF has linked law, policy, science, and economics to create innovative, equitable, and cost-effective solutions to today’s most pressing environmental problems. EDF pursues initiatives at the state and national levels to protect human health and the environment. Among these initiatives, EDF has worked to reduce climate-destabilizing and health-harming emissions from the transportation sector and improve vehicle fuel economy.

Under the National Environmental Policy Act (“NEPA”), NHTSA is required to take a hard look at the environmental impacts of the proposed rulemaking. In the attachment,<sup>1</sup> EDF raises a number of procedural concerns with NHTSA’s NEPA review, as well as substantive concerns

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<sup>1</sup> A Department of Transportation regulation issued in 1977 established a 15-page limit for public comments and petitions submitted to the agency. 49 C.F.R. § 553.21; *see also* 42 Fed. Reg. 58,949 (Nov. 14, 1977). The validity of that regulation has never been adjudicated, and EDF believes it to be unlawful on its face and as applied to this case. It is also not clear that the regulation applies to comments on a Draft Environmental Impact Statement. But, in an abundance of caution, EDF is including an attachment to the public comment with the remainder of our discussion. *See, e.g.,* EPA & NHTSA, *Proposed Rulemaking To Establish Light Duty Vehicle Greenhouse Gas Emission Standards and Corporate Average Fuel Economy Standards*, 74 Fed. Reg. 49,454, 49,455 (Sept. 28, 2009) (“[Y]ou may attach necessary additional documents to your comments. There is no limit on the length of the attachments.”).

with the analysis in the DEIS. NHTSA's DEIS falls far short of the agency's NEPA obligations. In particular:

- NHTSA based its DEIS on erroneous technical analysis reflecting inaccurate and outdated assumptions and inputs. As a result, NHTSA fell well short of its obligation to take a hard look at the pollution and other harmful implications of the proposal, which would dramatically weaken the existing MY 2021-2025 standards.
- NHTSA also considered an unduly constrained set of alternatives, failing to consider policy options that would be *more* protective of our health and environment than the existing standards despite ample evidence that such standards are well within EPCA's command to set "maximum feasible" standards.
- Finally, NHTSA improperly circumscribed the public's ability to meaningfully participate and comment on the DEIS.

In light of the procedural and substantive failures identified herein, the current rulemaking is fatally flawed. NHTSA should withdraw this inadequate DEIS, correct its errors, and use an updated, improved analysis to issue a new DEIS and proposed rule; in the alternative, the agency should provide an opportunity for further public comment on a revised EIS before issuing a Final EIS and making a final decision.

We appreciate the opportunity to submit these comments, and encourage the agency to contact us with any questions.

Respectfully submitted,

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## I. Statutory Background

### A. National Environmental Policy Act

The National Environmental Policy Act “is our basic national charter for protection of the environment.” 40 C.F.R. § 1500.1(a). NEPA’s substantive intent is to:

[E]ncourage productive and enjoyable harmony between man and his environment; to promote efforts which will prevent or eliminate damage to the environment and biosphere and stimulate the health and welfare of man; [and] to enrich the understanding of the ecological systems and natural resources important to the Nation.

42 U.S.C. § 4321; *see also id.* § 4331(b)(1) (providing that “it is the continuing responsibility of the Federal Government to use all practicable means, consistent with other essential considerations of national policy, to improve and coordinate Federal plans, functions, programs, and resources” in order that the United States may “fulfill the responsibilities of each generation as trustee of the environment for succeeding generations”).

As the Supreme Court has recognized, “the thrust of [NEPA] is . . . that environmental concerns be integrated into the very process of agency decision-making.” *Andrus v. Sierra Club*, 442 U.S. 347, 350 (1979). Thus, while “NEPA itself does not mandate particular results, but simply prescribes the necessary process,” *Robertson v. Methow Valley Citizens Council*, 490 U.S. 332, 350 (1989), agency adherence to NEPA’s action-forcing statutory and regulatory mandates helps achieve NEPA’s noble purpose and policies. *See* 42 U.S.C. §§ 4321, 4331. As explained by NEPA’s implementing regulations: “The NEPA process is intended to help public officials make decisions that are based on [an] understanding of environmental consequences, and take actions that protect, restore, and enhance the environment.” 40 C.F.R. § 1500.1(c).

NEPA’s ability to “foster excellent action” is a product of its specific mandates, namely that federal agencies—such as NHTSA—must prepare a comprehensive Environmental Impact Statement where impacts may be significant; take a hard look at the direct, indirect, and cumulative impacts of a proposed action; consider reasonable alternatives to that proposed action; and meaningfully involve the public in the NEPA process.

As the Ninth Circuit has rightly explained, NEPA works “through the creation of a democratic decisionmaking structure that, although strictly procedural, is ‘almost certain to affect the agency’s substantive decision[s].’” *Or. Nat. Desert Ass’n v. BLM*, 531 F.3d 1114, 1120 (9th Cir. 2008) (quoting *Robertson*, 490 U.S. at 350). By requiring agencies “to place their data and conclusions before the public . . . NEPA relies upon democratic processes to ensure—as the first appellate court to construe the statute in detail put it—that ‘the most intelligent, optimally beneficial decision will ultimately be made.’” *Id.* (quoting *Calvert Cliffs’ Coordinating Comm. v.*

*U.S. Atomic Energy Comm'n*, 449 F.2d 1109, 1114 (D.C. Cir. 1971)). This process, in turn, ensures open, honest and public discussion “in the service of sound decisionmaking.” *Id.* at 1143.

These four NEPA responsibilities—to meaningfully involve the public, to consider alternatives, to prepare an EIS, and to take a hard look at impacts—are essential to NHTSA’s joint rulemaking. The careful, deliberate decisionmaking that NEPA requires is a prerequisite of reasoned and informed action, in particular where the stakes are so high given the wide-ranging implications of the proposed Model Year 2021-2026 CAFE and light-duty greenhouse gas emission standards for human health, our climate, consumers, and automakers.

## **B. Energy Policy & Conservation Act**

With the enactment of the Energy Policy and Conservation Act (“EPCA”) in 1975, Congress instructed NHTSA to oversee a program of fuel economy regulation. P.L. 94-163 (Dec. 22, 1975). The stated purposes of EPCA are, in relevant part: “to conserve energy supplies through energy conservation programs, and, where necessary, the regulation of certain energy uses,” and “to provide for improved energy efficiency of motor vehicles.” 42 U.S.C. § 6201(4), (5).

EPCA directs NHTSA to set “fuel economy standards for automobiles,” which “shall be the maximum feasible average fuel economy level that the Secretary [of Transportation] decides the manufacturers can achieve in that model year.” 49 U.S.C. § 32902(a). When setting the maximum feasible standards, NHTSA must consider “technological feasibility, economic practicability, the effect of other motor vehicle standards of the Government on fuel economy, and the need of the United States to conserve energy.” *Id.* at § 32902(f). The EPA greenhouse gas emission standards for light duty vehicles are among the “other vehicle standards of the Government” that NHTSA is bound to consider, 77 Fed. Reg. 62,669 (Oct. 12, 2012), as are the California Air Resources Board (“CARB”) standards that have been adopted in California and by other states under Clean Air Act Section 177. *Central Valley Chrysler-Jeep, Inc. v. Goldstene*, 529 F.Supp.2d 1151, 1173 (E.D. Cal. 2007); *Green Mountain Chrysler Plymouth Dodge Jeep v. Crombie*, 508 F.Supp.2d 295, 345 (D.Vt. 2007). Although NHTSA has latitude to balance these statutory factors, it must do so in a way that “does not undermine the fundamental purpose of the EPCA: energy conservation.” *Center for Biological Diversity v. NHTSA*, 538 F. 3d 1172, 1195 (9th Cir. 2008).

Congress reiterated its support for continued improvements to fuel efficiency with the passage of the Energy Independence and Security Act (EISA) in 2007. EISA, which amended EPCA, explicitly states that its purpose is to “increase the efficiency of products, buildings, and vehicles.” Pub. L. No. 110-140, 121 Stat. 1492 (2007). The statute requires that NHTSA establish CAFE standards for passenger cars and light trucks for each model year through 2030.

## **II. The Analysis of Environmental Impacts in the DEIS is Incomplete and Flawed. NHTSA Did Not Take a “Hard Look” at the Impacts of the Alternatives.**

The “heart” of the NEPA process is an agency’s duty to consider “alternatives to the proposed action” and to “study, develop, and describe appropriate alternatives to recommended courses of action in any proposal which involves unresolved conflicts concerning alternative uses of available resources.” 42 U.S.C. §§ 4332(2)(C)(iii), 4332(2)(E); 40 C.F.R. § 1502.14(a). In order to thoroughly assess the options for a proposed action under NEPA, the agency must engage in an analysis of the consequences of each alternative under consideration, which will “form[] the scientific and analytic basis for the comparisons.” 40 C.F.R. § 1502.16. This discussion will include “any adverse environmental effects which cannot be avoided should the proposal be implemented,” including the direct, indirect, and cumulative effects of each option. *Id.* § 1502.16(a)-(b). “Without substantive, comparative environmental impact information regarding other possible courses of action, the ability of [a NEPA analysis] to inform agency deliberation and facilitate public involvement would be greatly degraded.” *N.M. ex rel Richardson v. BLM*, 565 F.3d 683, 708 (10th Cir. 2009).

Here, the analysis of environmental impacts in NHTSA’s DEIS is fundamentally flawed. This comment outlines some of the most egregious issues with the Volpe model used for NHTSA’s DEIS analysis. EDF is also submitting to the DEIS docket more detailed comments with additional discussion on the numerous flaws in the NPRM’s underlying modeling and analysis; as appropriate, we cite here to the more detailed discussions in that submission.<sup>2</sup>

EDF corrected the errors and biases in the Volpe model and performed a reanalysis of the alternative scenarios. The results demonstrate that the pollution estimates in the DEIS severely misrepresent and underestimate the climate, criteria, and toxic pollution impacts of the proposed rollback scenarios. These severe and pervasive flaws demonstrate both that the DEIS falls well short of NHTSA’s statutory obligations under NEPA and that the agency’s analysis is arbitrary and capricious. Accordingly, NHTSA must redo its environmental impact analysis and release a new DEIS for further comment before moving forward with this proceeding.

### **A. Flaws in the DEIS Technical Analysis Render the Emission Estimates for Greenhouse Gases and Criteria Pollutants Incorrect**

The technical analysis conducted by NHTSA to estimate the emissions impacts of the various alternatives is deeply flawed, resulting in skewed results that do not reflect the true effect this proposal would have on toxics, climate, and criteria pollutant emissions from light-duty vehicles. To uncover and examine these deficiencies, EDF used and corrected NHTSA’s own Volpe model. The resulting analysis, described in detail below, more accurately demonstrates the

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<sup>2</sup> Comments of Environmental Defense Fund on National Highway Traffic Safety Administration’s and Environmental Protection Agency’s Proposed Rule: The Safer Affordable Fuel-Efficient (SAFE) Vehicles Rule for Model Years 2021–2026 Passenger Cars and Light Trucks, 83 Fed. Reg. 42,986 (Aug. 24, 2018), submitted to Docket Nos. EPA-HQ-OAR-2018-0283, NHTSA-2018-0067, NHTSA-2017-0069 (Oct. 26, 2018) (“EDF NPRM Comment”).

pollution emissions that would result from the proposed rule and alternatives and further illuminates the errors and inaccuracies in NHTSA's own analysis.

In our modeling, EDF made several alterations to correct errors in the Volpe model and conform the analysis to NHTSA's historical approach and the underlying factual record. Those changes include:

- **Rebound** – The rebound effect has been adjusted from 20%, which is used in the DEIS and NPRM, to 10%, which is the more commonly-accepted rebound level that was used in prior rulemakings to establish greenhouse gas emission and fuel economy standards.<sup>3</sup>
- **Scrappage/VMT** – NHTSA's scrappage module has been corrected because it is entirely disconnected from new vehicle sales in the model and therefore produces unreasonable (and inexplicable) distorted projections of vehicle miles traveled ("VMT") for used vehicles, relative to changes in new vehicle sales.
- **Over-compliance** – NHTSA set the Volpe model to project that, with CAFE standards remaining flat at MY2020 levels through MY2026, automakers would over-comply with the MY2020 standards by 9 grams/mile of CO<sub>2</sub> for cars and 15 g/mi of CO<sub>2</sub> for light trucks during the 2029-2032 timeframe, plus 1%/year improvements beyond MY2032. This assumption unreasonably obscures the impacts of the rollback and is not reflective of historical compliance performance. EDF eliminated NHTSA's faulty assumption of over-compliance and assumed that automakers would meet the standards.
- **Upstream emissions** – The upstream emissions calculations have been corrected to remove NHTSA's unjustified assumption that half of additional fuel consumed under the rollback would be imported. (In fact, almost all U.S. fuel is produced and refined domestically.) This assumption allowed NHTSA to underestimate criteria pollutant emissions from domestic oil refineries, even as the agency projected that fuel consumption would increase due to rising VMT.

A more detailed discussion of these improvements that EDF made to the Volpe model can be found in our technical comments on the NPRM.<sup>4</sup> The results derived from this corrected version of the Volpe model provide a more defensible estimate of the pollution implications of the proposal's alternative scenarios. In contrast, because the DEIS's figures are the product of inaccurate, flawed Volpe modeling, the DEIS unlawfully misrepresents the implications of the proposed alternative scenarios.

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<sup>3</sup> Extensive literature and analysis demonstrates that a 20% rebound figure is unsupported and the agencies' prior 10% figure is more appropriate (if not still too high). *See* Comment of Environmental Defense Fund & Union of Concerned Scientists, Re: EPA's Proposed Rule: The Safer Affordable Fuel-Efficient (SAFE) Vehicles Rule for Model Years 2021–2026 Passenger Cars and Light Trucks, 83 Fed. Reg. 42,986, submitted to Docket Nos. EPA-HQ-OAR-2018-0283, NHTSA-2018-0067, NHTSA-2017-0069 (Oct. 26, 2018) (discussing objections to the analysis and application of the rebound effect in the Proposal).

<sup>4</sup> *See* EDF NPRM Comment, Part II. For completeness of the record, EDF has also submitted this technical comment to NHTSA's DEIS docket.

Our analysis demonstrates that for every pollutant examined, the rollback will result in larger emission increases than the DEIS discloses. For example, NHTSA's analysis in the DEIS concluded that under the agency's preferred alternative, annual carbon dioxide emissions would increase by 95 million metric tons in 2040. But using the corrected Volpe model, EDF concluded that those emissions would actually rise by 189 MMT, further exacerbating the harmful effects of human-caused climate change. NHTSA similarly understated the pollution increases that will result without the Clean Car Standards for NO<sub>x</sub>, an ozone precursor that causes acute respiratory problems; PM<sub>2.5</sub>, which aggravates respiratory conditions and is associated with premature mortality; VOCs, another harmful ozone precursor; and diesel particulate, which is classified as a probable and known human carcinogen.



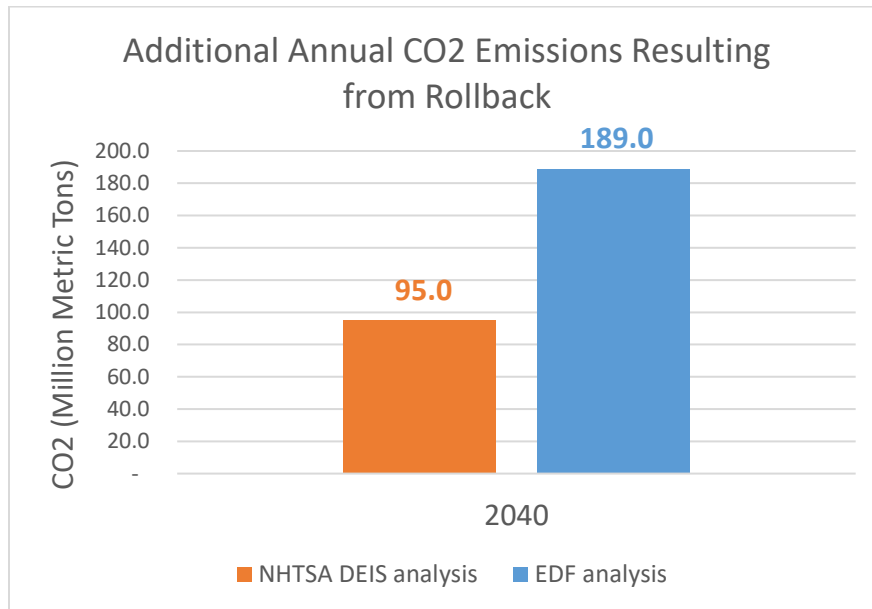
## 1. Climate Pollution Emissions Will Increase Drastically if NHTSA Rolls Back the Clean Car Standards

EDF’s analysis of the climate pollution impacts of the proposed alternatives, using the NHTSA Volpe model, shows that the DEIS analysis is flawed and improperly underestimates the climate pollution increases that will occur under the various rollback alternative scenarios.

While the DEIS concedes that climate pollution will increase under all rollback scenarios considered, NHTSA significantly underestimated the increase in greenhouse gas emissions at stake. The DEIS concludes that NHTSA’s preferred alternative—which flattens the fuel economy standards at 2020 levels through MY 2026—would result in additional annual carbon dioxide emissions of 95 million metric tons (“MMT”) by 2040, compared to levels if the Clean Car Standards remain in place. Using a corrected model, EDF projects that CO2 emission increases in 2040 will actually be *double* what NHTSA states in the DEIS: 189 million metric tons per year.

Figure A below shows the wide gap between the DEIS analysis and the numbers calculated by EDF when we corrected the model to conform to the underlying factual data and to NHTSA’s traditional modeling approaches. A corrected model consistently concludes that the rollback scenarios will yield significantly higher levels of climate pollution than those disclosed in NHTSA’s DEIS.

Figure A.<sup>5</sup>



Accordingly, the DEIS analysis severely underestimates the greenhouse gas emission impacts of the proposed CAFE and GHG standards being considered by NHTSA and EPA, respectively.

<sup>5</sup> NHTSA’s CO2 emissions increase estimate is derived from DEIS Appendix D, Tables D-9 and D-10.

Such faults with the underlying data violate NHTSA’s legal obligations under NEPA. NHTSA cannot claim to have thoroughly assessed and properly informed the public regarding the environmental impacts of the alternatives if its analysis distorts the climate pollution impacts at stake.

## ***2. Criteria Pollutant Emissions Will be Significantly Higher if NHTSA Rolls Back the Clean Car Standards***

Across the board, NHTSA misrepresents the extent to which harmful criteria pollutant emissions will increase if the Clean Car Standards are rolled back. The agency concedes in the DEIS that emissions of multiple criteria pollutants from the light-duty vehicle sector will increase under any of the action alternatives considered, and that harmful emissions would generally increase the most under the agency’s preferred alternative.<sup>6</sup>

NHTSA acknowledges that, “[a]ll action alternatives would result in increased adverse health impacts (mortality, acute bronchitis, respiratory emergency room visits, and work-loss days) nationwide compared to the No Action Alternative”—the existing Clean Car Standards—“as a result of increases in emissions of PM<sub>2.5</sub>, [diesel particulate matter] and SO<sub>x</sub>.”<sup>7</sup> NHTSA specifically notes that “the action alternatives would result in increased incidence of PM<sub>2.5</sub>-related adverse health impacts due to the emissions increases.”<sup>8</sup>

However, NHTSA underestimates the extent of the increase. The agency’s use of the scrappage model unjustifiably predicts that Americans will drive substantially fewer vehicle miles, and the model wrongly assumes that fuel will not primarily be processed in domestic oil refineries. Because of these errors, the agency underestimates the scope of the increase in annual criteria pollutant emissions under each of the alternatives.

The presentation of criteria pollutant emission impacts in the DEIS is incorrect and misleading, as demonstrated by the significant gaps between NHTSA’s results and the analysis conducted by EDF using a corrected version of the Volpe model. NHTSA’s preferred alternative will cause SO<sub>x</sub>, NO<sub>x</sub>, PM, and VOC emissions to increase significantly from the levels anticipated under the existing standards.

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<sup>6</sup> See NHTSA, Draft Environmental Impact Statement, The Safer Affordable Fuel-Efficient (SAFE) Vehicles Rule for Model Year 2021-2026 Passenger Cars and Light Trucks, Docket No. NHTSA-2017-0069 (July 2018) (“DEIS”), at S-7 (“In general, emissions of criteria air pollutants increase across all alternatives, with some exceptions.”); *id.* at S-8; *id.* at 2-26, Table 2.5.2-1, Direct and Indirect Impacts (showing increases in PM<sub>2.5</sub>, SO<sub>2</sub>, VOCs, and NO<sub>x</sub> for certain alternatives).

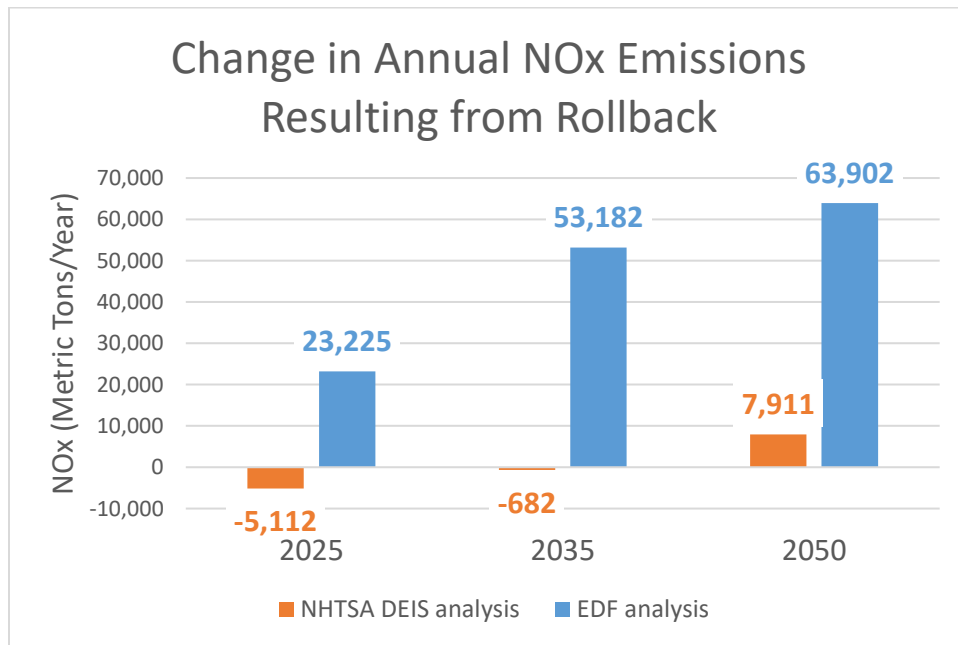
<sup>7</sup> DEIS at S-9.

<sup>8</sup> DEIS at S-7.

**Oxides of Nitrogen (NOx).** Figure B shows how much higher annual NOx emissions will be in 2025, 2035, and 2050 under the agency’s preferred alternative compared to the existing Clean Car Standards. For example, light-duty vehicle NOx emissions will be 63,902 tons/year *higher* in 2050 if the standards are flatlined than if the Clean Car Standards remained in effect. NOx is a precursor to the formation of ozone, and such additional air pollution will harm the health of all Americans, particularly those with asthma or other respiratory conditions, and those who live, work, or play in close proximity to roadways.

NHTSA downplays this emissions increase. The DEIS analysis drastically underestimates the annual increases in NOx emissions that will result from a rollback of the Clean Car Standards, and in fact the DEIS asserts that NOx emissions would be *lower* without the standards in 2025 and 2035. But as EDF’s analysis shows, this calculation is incorrect and the resulting DEIS presentation is deeply misleading. NHTSA’s analysis predicts that NOx emissions in 2035 would decrease by 682 tons per year under a complete rollback of the Clean Car Standards, while the EDF analysis concludes that annual NOx emissions would actually be 53,183 tons higher with a rollback. Figure B shows the extent to which NHTSA is miscalculating NOx emissions increases.

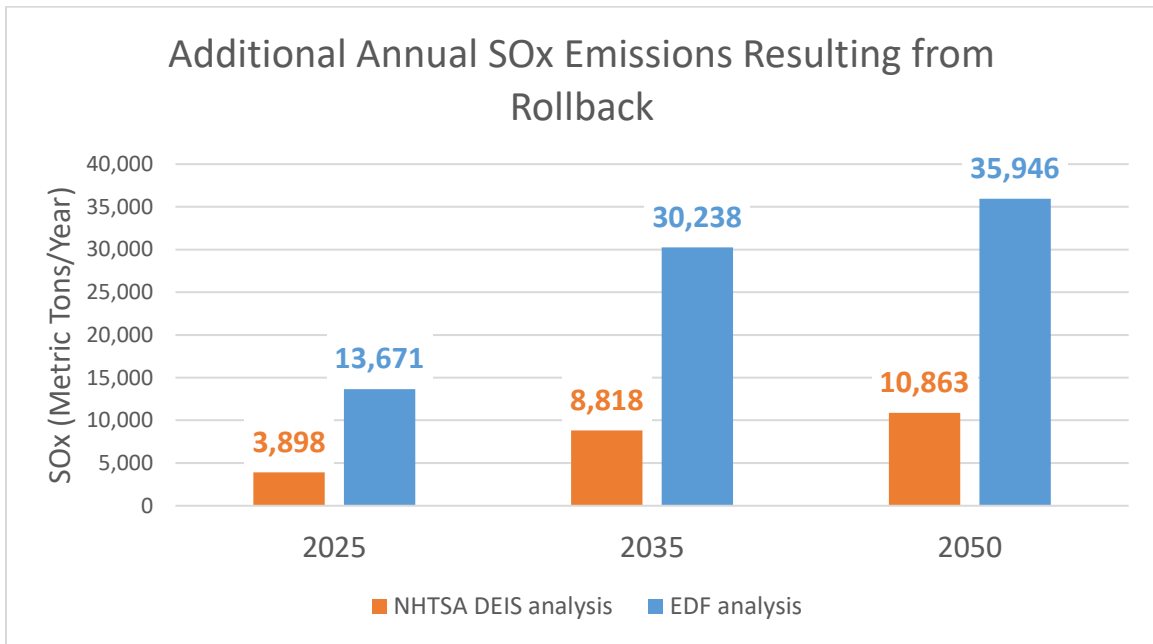
Figure B.<sup>9</sup>



<sup>9</sup> NHTSA’s NOx emissions increase projections are derived from DEIS Appendix D, Tables D-1, D-2, and D-3.

**Sulfur Oxide (SOx).** NHTSA’s emission impacts analysis in the DEIS underestimates the extent to which SOx emissions will increase as a result of rolling back the Clean Car Standards. As demonstrated in our analysis, compiled by running a corrected version of the Volpe model, SOx emissions will continue to rise at higher levels through 2025, 2035, and 2050 if the existing standards are flatlined.

Figure C.<sup>10</sup>

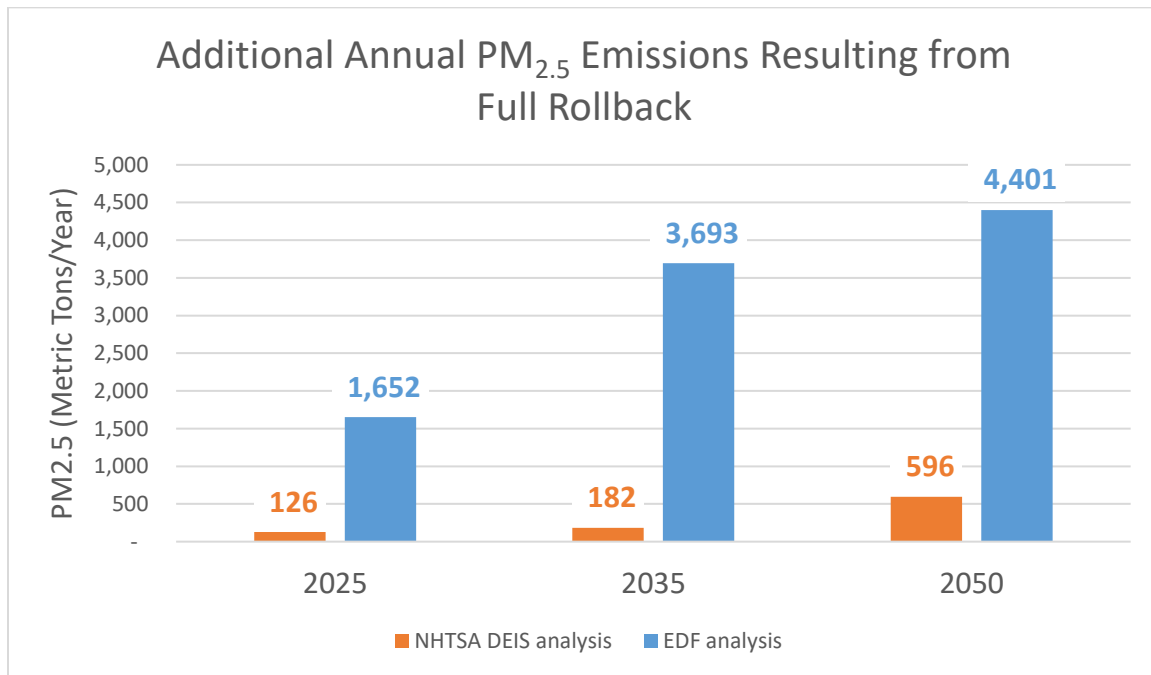


<sup>10</sup> NHTSA’s SOx emissions increase projections are derived from DEIS Appendix D, Tables D-1, D-2, and D-3.

**Particulate Matter (PM<sub>2.5</sub>).** NHTSA also grossly underestimates the annual increases in emissions of particulate matter that would result from adopting the agency’s preferred alternative instead of keeping the existing Clean Car Standards in place. Figure D below demonstrates the emissions increases documented in the DEIS compared with the results of EDF’s own corrective analysis. PM<sub>2.5</sub> can increase the risk of heart disease, lung cancer, and asthma attacks; and particles are easily trapped in the lungs because of their small size.

The contrast between the DEIS and EDF’s analysis is particularly striking regarding PM<sub>2.5</sub> emissions. NHTSA concluded that particulate matter emissions would be 126 tons higher per year in 2025 if the Clean Car Standards are rolled back, but EDF concluded that emissions of this harmful pollutant would actually be more than 1,600 tons per year higher under a rollback—an increase *thirteen times* larger than what NHTSA stated in the DEIS. This disparity continues in 2035 and 2050.

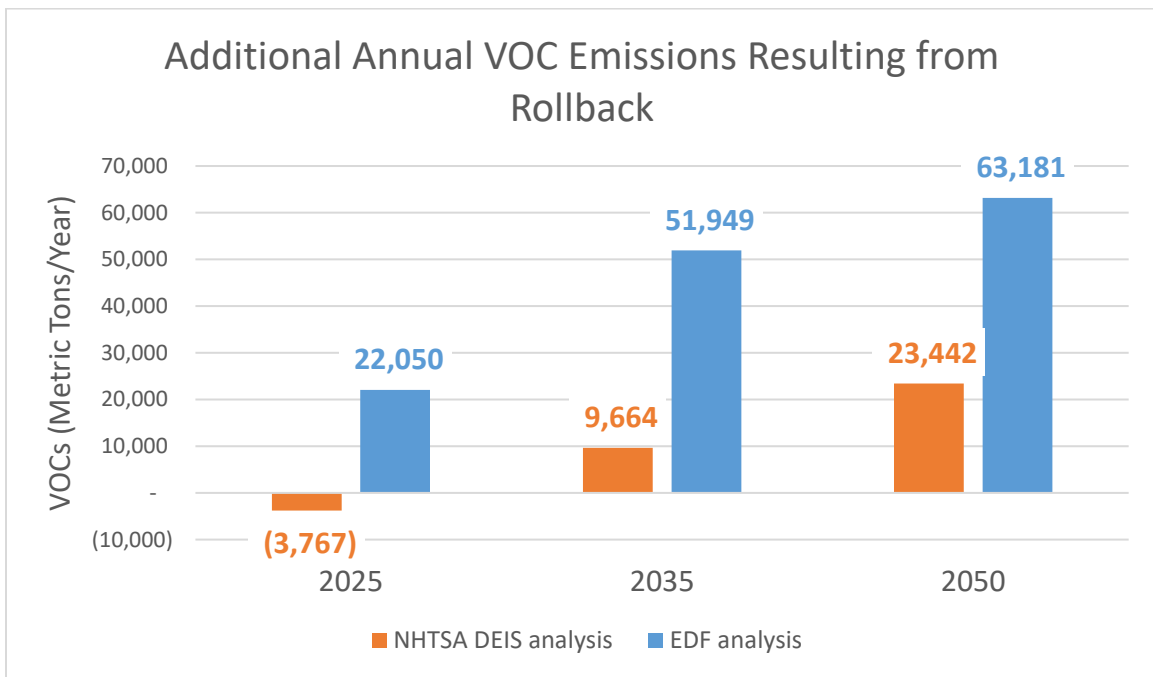
Figure D.<sup>11</sup>



<sup>11</sup> NHTSA’s PM<sub>2.5</sub> emissions increase projections are derived from DEIS Appendix D, Tables D-1, D-2, and D-3.

**Volatile Organic Compound (VOCs).** In the DEIS, NHTSA does not accurately present the changes in VOC emissions that would result from rolling back the Clean Car Standards. NHTSA incorrectly concludes that VOC emissions would be lower in 2025 with a rollback than they would be if the standards remained in effect; and NHTSA undercounts the extent to which VOC emissions would increase in 2035 and 2050. Our analysis shows the true, harmful effect of a total rollback of the Clean Car Standards: VOC emissions would increase significantly through 2050, as demonstrated below in Figure E. VOCs are another precursor that contribute to the formation of ozone, which poses a variety of risks to public health including chest pain, asthma attacks, and reduced lung function.

Figure E.<sup>12</sup>



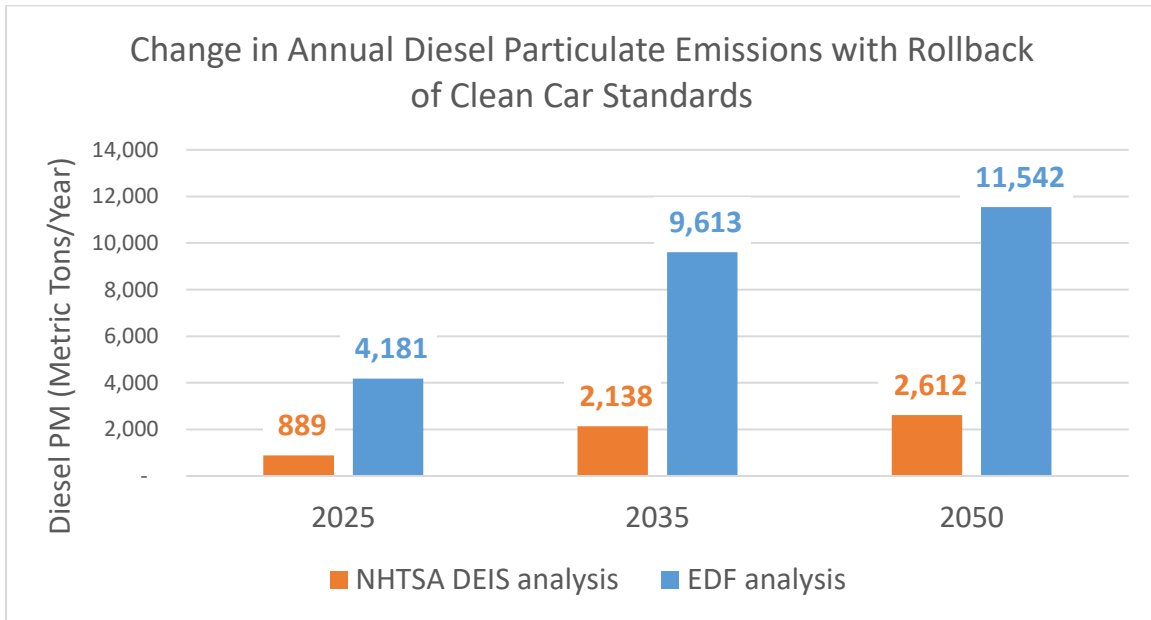
<sup>12</sup> NHTSA’s VOC emissions increase projections are derived from DEIS Appendix D, Tables D-1, D-2, and D-3.

### 3. *Toxics Emissions Will be Significantly Higher if NHTSA Rolls Back the Clean Car Standards*

As with greenhouse gases and criteria pollutants, NHTSA’s emissions analysis in the DEIS significantly miscalculates the increase in toxic chemical emissions that will result from a rollback of the standards to MY2020 levels through MY2026. The resulting DEIS presentation misleads the public and the agency, unlawfully failing to meet NEPA’s requirements.

Diesel particulate matter, or diesel PM, typically comprised of carbon particles (soot) and cancer-causing toxic chemicals, and is classified as a probable or likely human carcinogen by the U.S. Environmental Protection Agency, the National Institute for Occupational Safety and Health, the International Agency for Research on Cancer, Health Effects Institute, and the U.S. Department of Health and Human Services National Toxicology Program.<sup>13</sup> The World Health Organization and the California EPA classify diesel exhaust as a known human carcinogen.<sup>14</sup> As indicated in Figure F, NHTSA misstates the extent to which diesel PM emissions would increase with a rollback. Our analysis concluded that in 2025, 2035, and 2050, if the Clean Car Standards are rolled back, the increases in annual diesel PM emissions be at least four times *greater* than what NHTSA calculated.

Figure F.<sup>15</sup>



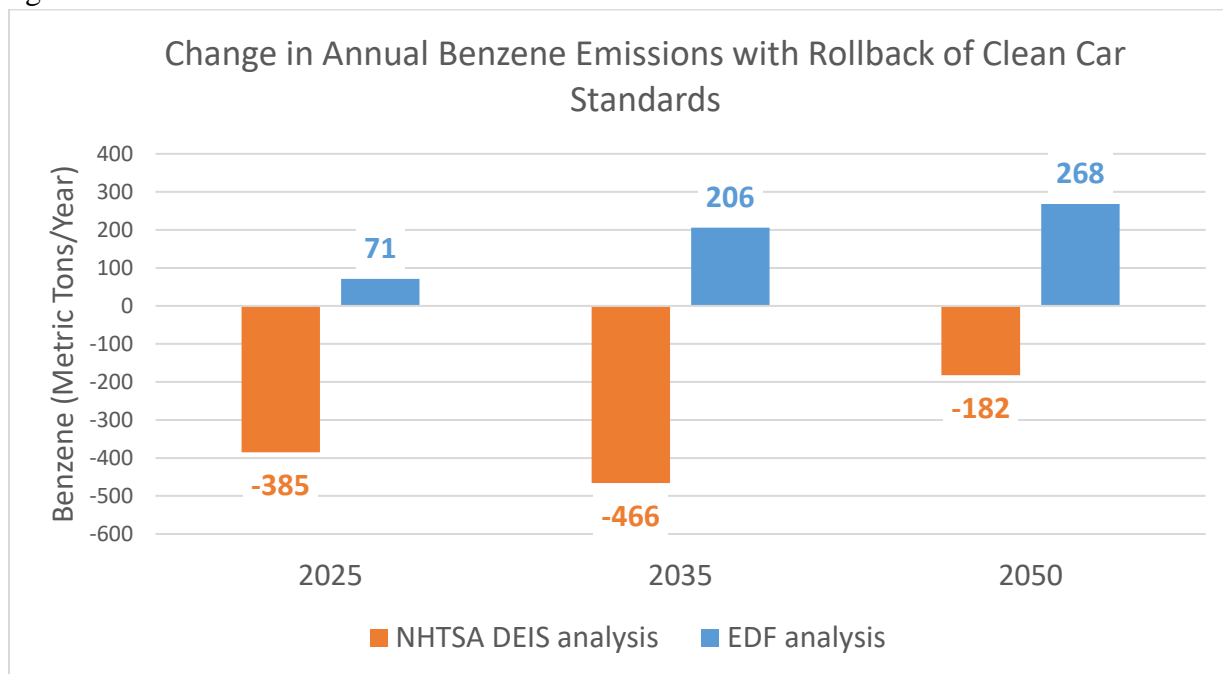
<sup>13</sup> U.S. Environmental Protection Agency. 2002. Health Assessment Document For Diesel Engine Exhaust. May 2002. National Center for Environmental Assessment - Office of Research and Development. Washington, DC. EPA/600/8-90/057F (citing sources).

<sup>14</sup> World Health Organization, Public health round-up, 90 Bulletin of the World Health Organization 477-556. (July 2012), <http://www.who.int/bulletin/volumes/90/7/12-010712/en>; International Agency for Research on Cancer, IARC: Diesel Engine Exhaust Carcinogenic (Jun. 12, 2012), [https://www.iarc.fr/en/media-centre/pr/2012/pdfs/pr213\\_E.pdf](https://www.iarc.fr/en/media-centre/pr/2012/pdfs/pr213_E.pdf); CARB, Overview: Diesel Exhaust and Health (last reviewed Apr. 12, 2016), <https://www.arb.ca.gov/research/diesel/diesel-health.htm>.

<sup>15</sup> NHTSA’s emission projections for diesel PM are derived from DEIS Appendix D, Tables D-4, D-5, and D-6.

Benzene, which is also a component of diesel PM, is a well-characterized human carcinogen, associated with increased risk of leukemia and lymphoma.<sup>16</sup> NHTSA concluded, according to its erroneous Volpe model, that emissions of this toxic chemical would be significantly *lower* if the Clean Car Standards were weakened. But this conclusion is not only counterintuitive; it is incorrect and misleading. EDF’s analysis shows the extent to which benzene emissions will increase with a full rollback of the Clean Car Standards.

Figure G.<sup>17</sup>



EDF’s analysis shows that there will be severe consequences for air quality and public health for decades to come if NHTSA rolls back the Clean Car Standards to MY2020 levels. Moreover, it demonstrates that the information considered and disclosed in NHTSA’s DEIS is incorrect. Given the severe deficiencies with the emissions analysis in the DEIS, the agency cannot have properly considered these harmful consequences in crafting its proposed standards, nor can the public properly review and comment on the proposal. Given these violations of NHTSA’s duty under NEPA, the agency must develop new alternatives, new analysis, and issue a new DEIS.

<sup>16</sup> Snyder R. Leukemia and Benzene, *Int. J. Environ. Res. Public Health* 2012, 9, 2875-2893; doi:10.3390/ijerph908287; Smith MT, Jones RM, Smith AH. 2007. *Benzene exposure and risk of non-Hodgkin lymphoma*. *Cancer Epidem. Biomark. Prev.* 16:385-391.

<sup>17</sup> NHTSA’s benzene emissions increase projections are derived from DEIS Appendix D, Tables D-4, D-5, and D-6.



## B. NHTSA's Climate Change Impacts Analysis Uses a Flawed "Social Cost of Carbon" Metric

The Social Cost of Carbon ("SCC") is a rigorous, well-established metric for monetizing the impacts from climate pollution. The SCC is an estimate of the total economic harm associated with emitting one additional ton of carbon dioxide pollution into the atmosphere. This carbon pollution, and the extent of its reduction, are both direct consequences of the standards ultimately at issue in this proceeding. Although the DEIS ostensibly relies on the SCC in its analysis of impacts, it does not discuss its SCC calculations and instead references the Preliminary Regulatory Impact Analysis ("PRIA").<sup>18</sup> The SCC analysis reflected in that document is itself flawed.

Rigorous technical work on developing well-founded means to estimate the social cost of carbon has a long history. For over two decades, economists have been evaluating the potential impact of climate change on economic growth, monetizing its overall cost and estimating a value of the social cost associated with the emission of one metric ton of carbon dioxide. These estimates are typically based on the results of integrated assessment models, which pair a scientific model of the predicted physical impacts of climate change with a socioeconomic model that evaluates the economic impact of these effects. The models predict likely impacts of climate change at different points in the future, estimate their value and discount the values back to the present.

The U.S. Supreme Court has called the disclosure of impacts the "key requirement of NEPA," and held that agencies must "consider and disclose the actual environmental effects" of a proposed project in a way that "brings those effects to bear on [the agency's] decisions."<sup>19</sup> Courts have repeatedly concluded that an EIS must disclose relevant climate effects.<sup>20</sup> Though NEPA does not require a formal cost-benefit analysis,<sup>21</sup> agencies' approaches to assessing costs and benefits must be balanced and reasonable. Courts have warned agencies that "[e]ven though NEPA does not require a cost-benefit analysis," an agency cannot selectively monetize benefits in support of its decision while refusing to monetize the costs of its action—particularly where, as here, there is a readily available, peer-reviewed metric for doing so.<sup>22</sup>

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<sup>18</sup> DEIS at 1-20, 5-22; *see also* NHTSA & EPA, Preliminary Regulatory Impact Analysis: The Safer Affordable Fuel-Efficient (SAFE) Vehicles Rule for Model Year 2021 – 2026 Passenger Cars and Light Trucks, Part 8.11.2 at 1062 (July 2018) ("PRIA").

<sup>19</sup> *Baltimore Gas & Elec. Co. v. Natural Res. Def. Council*, 462 U.S. 87, 96 (1983).

<sup>20</sup> As the Ninth Circuit has held: "[T]he fact that climate change is largely a global phenomenon that includes actions that are outside of [the agency's] control . . . does not release the agency from the duty of assessing the effects of its actions on global warming within the context of other actions that also affect global warming." *Ctr. for Biological Diversity v. Nat'l Highway Traffic Safety Admin.*, 538 F.3d 1172, 1217 (9th Cir. 2008); *see also Border Power Plant Working Grp. v. U.S. Dep't of Energy*, 260 F. Supp. 2d 997, 1028-29 (S.D. Cal. 2003) (failure to disclose project's indirect carbon dioxide emissions violates NEPA).

<sup>21</sup> 40 C.F.R. § 1502.23 ("[T]he weighing of the merits and drawbacks of the various alternatives need not be displayed in a monetary cost-benefit analysis.").

<sup>22</sup> *High Country Conservation Advocates v. Forest Service*, 52 F. Supp. 3d 1174, 1191 (D. Colo. 2014); *accord. MEIC v. Office of Surface Mining*, 15-106-M-DWM, at 40-46 (D. Mt., August 14, 2017) (holding it was arbitrary

NHTSA purports to include the social cost of carbon in its DEIS and PRIA analysis, but this is deceptive. The agency’s version of a social cost of carbon analysis applies a flawed so-called “domestic estimate,” uses an improper discount rate, and does not include an adequate sensitivity analysis, among other issues. These concerns are reviewed in more detail in joint comments filed by the Institute for Policy Integrity, joined by EDF.<sup>23</sup>

### **III. The Draft EIS’ Omission of More Protective Alternatives Does Not Satisfy the Requirements of NEPA, Nor Does It Satisfy NHTSA’s Obligations Under EPCA**

NEPA requires that an agency assess all reasonable alternatives to the proposed action in its EIS, 42 U.S.C. § 4332(C)(iii); 40 C.F.R. § 1502.1, and this alternatives analysis is “the heart of the environmental impact statement.” 40 C.F.R. § 1502.14. The alternatives assessed in the NEPA analysis must encompass the full range of alternatives that the agency is required to consider. *Id.* § 1505.1(e).

EPCA requires that NHTSA set fuel economy standards at the “maximum feasible average fuel economy level” that manufacturers can achieve for gas- and diesel-powered vehicles—and in order to do that, the agency would have to consider the upper bound of what fuel economy level is feasible. 49 U.S.C. § 32902(a). The purpose of EPCA is to conserve energy through a comprehensive program to improve vehicle fuel economy. And although EPCA instructs the agency to consider four factors when setting standards—technological feasibility, economic practicability, the effect of other motor vehicle standards of the Government on fuel economy, and the need of the United States to conserve energy—no factor may overtake the fundamental goal of energy conservation. *See Ctr. for Biological Diversity v. NHTSA*, 583 F.3d 1172, 1194 (9th Cir. 2008).

A wealth of technical data and analysis contained in the 2012 rulemaking record, the Mid-Term Evaluation record, and more recent findings demonstrates that more protective standards than the current Clean Car Standards are achievable. Yet of the eight alternatives considered by NHTSA in the DEIS, *none* provide for improved fuel economy beyond the existing requirements that have been set through MY 2025. By only considering alternatives that would *weaken* the existing Model Year 2021-2025 standards, NHTSA shirks its duty under both NEPA and EPCA.<sup>24</sup> A

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for the agency to quantify benefits in an EIS while failing to use the social cost of carbon to quantify costs, as well as arbitrary to imply there would be no effects from greenhouse gas emissions).

<sup>23</sup> Comment of Institute for Policy Integrity et al., Re: Quantifying and Monetizing Greenhouse Gas Emissions in the Draft Environmental Impact Statement for the Safer Affordable Fuel-Efficient Vehicles Rule for Model Year 2022-2026 Passenger Cars and Light Trucks (Oct. 26, 2018), submitted to Docket No. NHTSA-2017-0069.

<sup>24</sup> A federal agency preparing an EIS must “specify the underlying purpose and need to which the agency is responding” in its proposed action and alternatives. 40 C.F.R. § 1502.13. When determining the purpose of its action, “an agency should always consider the views of Congress, expressed, to the extent that the agency can determine them, in the agency’s statutory authorization to act.” *Citizens Against Burlington, Inc. v. Busey*, 938 F.2d 190, 196 (D.C. Cir. 1991).

strengthening of the existing standards is both “reasonable” and “feasible.” NHTSA improperly failed to consider such alternatives.

### **A. The DEIS Relies on an Inadequate, Incomplete Technical Record**

NEPA requires that an agency’s environmental impact statement contain “high quality” information and “[a]ccurate scientific analysis” sufficient to “help public officials make decisions that are based on understanding environmental consequences.” 40 C.F.R. § 1500.1(b), (c). To fulfill this requirement, the agency has a duty to “insure the professional integrity, including scientific integrity, of the discussions and analyses in environmental impact statements.” 40 C.F.R. § 1502.24. NHTSA failed to meet this standard in the DEIS, in part due to its failure to properly consider the preexisting administrative record or new studies and data showing the eminent feasibility of ambitious standards—all of which are crucial to informing an accurate analysis of the maximum feasible fuel economy standards.

#### *i. NHTSA Disregarded the Existing Record*

NHTSA’s starting point for its DEIS and rule development should have been the extensive record that has been developed over the last six years, including its own feasibility analysis included in the MY2017-2025 final rule. This includes, but is not limited to, NHTSA’s final rule analysis of its “augural” fuel economy standards,<sup>25</sup> the Draft Technical Assessment Report (TAR)<sup>26</sup> jointly prepared by EPA, NHTSA, and CARB (issued July 2016), EPA’s Proposed Determination<sup>27</sup> (issued November 2016), EPA’s original Final Determination<sup>28</sup> (issued January 2017) and CARB’s Advanced Clean Cars Midterm Review<sup>29</sup> (issued January 18, 2017). The Agencies solicited and received hundreds of thousands of public comments on the TAR, the Proposed Determination, and CARB’s Midterm Review. NHTSA, EPA and CARB held hundreds of meetings, and received numerous independent studies and analyses confirming the feasibility and appropriateness of the MY 2022-2025 fuel economy and GHG standards. This body of work comprises the most extensive record ever developed to support EPA’s light-duty

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<sup>25</sup> EPA & NHTSA, 2017 and Later Model Year Light-Duty Vehicle Greenhouse Gas Emissions and Corporate Average Fuel Economy Standards; Final Rule, 77 Fed. Reg. 62624 (Oct. 15, 2012) (“2012 Final Rule”); EPA & NHTSA, Joint Technical Support Document: Final Rulemaking for 2017-2025 Light-Duty Vehicle Greenhouse Gas Emission Standards and Corporate Average Fuel Economy Standards (Aug. 2012) (EPA-420-R-12- 901) (“2012 Joint TSD”).

<sup>26</sup> EPA, CARB, & NHTSA, Draft Technical Assessment Report: Midterm Evaluation of Light-Duty Vehicle Greenhouse Gas Emission Standards and Corporate Average Fuel Economy Standards for Model Years 2022-2025 (July 2016) (“Draft TAR”), <https://nepis.epa.gov/Exe/ZyPDF.cgi/P100OXEO.PDF?Dockey=P100OXEO.PDF>.

<sup>27</sup> EPA, Proposed Determination on the Appropriateness of the Model Year 2022-2025 Light-Duty Vehicle Greenhouse Gas Emission Standards under the Midterm Evaluation (Nov. 2016) EPA-420-R-16-420 (“EPA Proposed Determination”).

<sup>28</sup> EPA, Final Determination on the Appropriateness of the Model Year 2022-2025 Light-Duty Vehicle Greenhouse Gas Emissions Standards under the Midterm Evaluation, (Jan. 2017), <https://www.epa.gov/regulations-emissions-vehicles-and-engines/midterm-evaluation-light-duty-vehiclegreenhouse-gas-ghg#final-determination> (“2017 Final Determination”).

<sup>29</sup> CARB, California’s Advanced Clean Cars Midterm Review (Jan. 18, 2017), [https://www.arb.ca.gov/msprog/acc/mtr/acc\\_mtr\\_finalreport\\_full.pdf](https://www.arb.ca.gov/msprog/acc/mtr/acc_mtr_finalreport_full.pdf).

greenhouse gas emission and NHTSA’s CAFE standard setting efforts. NHTSA should have fully considered this existing record in its DEIS.

The Draft TAR, which was prepared jointly by NHTSA, EPA, and CARB, examined a wide range of factors, including technology advancements, the penetration of more fuel-efficient technologies in the marketplace, consumer acceptance of these technologies, trends in fuel prices and the vehicle fleet, employment impacts, and others. Even though EPA and NHTSA performed independent analyses in the Draft TAR, both agencies reached the same conclusions:<sup>30</sup>

- “A wider range of technologies exist for manufacturers to use to meet the MY2022- 2025 standards, and at costs that are similar or lower, than those projected in the 2012 rule”;
- “Advanced gasoline vehicle technologies will continue to be the predominant technologies, with modest levels of strong hybridization and very low levels of full electrification (plug-in vehicles) needed to meet the standards.”

Based on NHTSA and EPA’s analyses, there is no question that the auto industry is bringing new technologies to the market at a quicker pace and at lower cost than the agencies projected in the 2012 rulemaking for MY2017-2025: “manufacturers are adopting fuel economy technologies at unprecedented rates. Car makers and suppliers have developed far more innovative technologies to improve fuel economy and reduce GHG emissions than anticipated just a few years ago.”<sup>31</sup> This occurred while the industry has experienced an unprecedented period of growth – 2016 marked the seventh year in a row that car sales in the US set an all-time sales record.<sup>32</sup>

Both analyses indicate that the costs for complying with the existing MY2022-2025 standards are lower than the agencies’ estimates in the 2012 rulemaking. EPA’s primary analysis shows MY2025 compliance costs (incremental to MY2021) significantly lower than those projected in the final rule (\$252 lower for cars and \$197 lower for trucks).<sup>33</sup> NHTSA’s analysis shows similar downward trends in compliance costs.<sup>34</sup>

The agencies also concluded in the TAR that the cost, effectiveness, and feasibility of the individual technologies needed to comply with the future standards are “generally consistent” with those projected in the 2012 final rulemaking. The agencies did, however, find that several new technologies and developments in the TAR were neither foreseen nor included in the analysis supporting the 2012 rulemaking for MY2017-2025. Examples of these technologies include the application of direct injection Atkinson Cycle engines to non-hybrids, greater penetration of continuously variable transmissions (CVT), and greater use of diesel engines. The

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<sup>30</sup> Draft TAR, at ES-2.

<sup>31</sup> EPA webpage, Midterm Evaluation of Light-Duty Vehicle Greenhouse Gas Emissions Standards for Model Years 2022-2025, <https://www.epa.gov/regulations-emissions-vehicles-and-engines/midterm-evaluation-light-duty-vehicle-greenhouse-gas> (last accessed Oct. 26, 2018).

<sup>32</sup> Ahiza Garcia, “Car sales set another U.S. record,” CNN (Jan. 4, 2017), <http://money.cnn.com/2017/01/04/news/companies/car-sales-2016/index.html>.

<sup>33</sup> Draft TAR at ES-9; 2012 Final Rule at 62,665.

<sup>34</sup> *Id.*

agencies concluded that these additional technologies contribute to lower cost compliance pathways.<sup>35</sup>

Not only are manufacturers adding innovative fuel economy technologies at unprecedented rates, but these improvements have come while other metrics of vehicle performance have continued to improve, including acceleration times and durability.<sup>36</sup> At the end of 2016, there were already over 100 car, SUV, and pickup versions on the market that already meet 2020 or later standards.<sup>37</sup> The 2016 analysis found that new technologies were already being utilized that allowed a number of individual vehicle models to meet standards all the way out to 2025—an extraordinary nine model years in advance.<sup>38</sup> In EPA’s 2016 Fuel Economy Trends Report, it estimated that “17% of projected MY2016 vehicle production already meets or exceeds the MY2020 CO<sub>2</sub> emissions targets.”<sup>39</sup>

On January 12, 2017, former EPA Administrator Gina McCarthy signed her determination to maintain the current GHG emissions standards for MY2022-2025 vehicles. This Final Determination found that automakers are well positioned to meet the standards at lower costs than previously estimated. And the Administrator chose to “retain the current standards to provide regulatory certainty for the auto industry despite a technical record that suggests the standards could be made more stringent.”<sup>40</sup> EPA’s Final Determination provided further robust demonstration that the existing standards are achievable and indeed, that more stringent MY2022-2025 standards are feasible and should be considered.

Over the last year and a half, EPA moved in a different direction, as Administrator Scott Pruitt announced the agency’s intent to reconsider the 2017 Final Determination<sup>41</sup> and took public comment. In April 2018, Administrator Pruitt withdrew the original determination and issued a Revised Final Determination, concluding that the existing standards are “not appropriate” and must be revised.<sup>42</sup> This determination cannot contribute to NHTSA’s DEIS analysis, because EPA did not develop a technical record to support its decision, and did not provide an adequate justification for the reversal from its prior positions. EDF and a group of allied organizations have petitioned for review of the unsupported and unlawful Revised Final Determination in the

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<sup>35</sup> See EPA Proposed Determination at ES-3.

<sup>36</sup> EPA Proposed Determination at A-48, A-71.

<sup>37</sup> 2017 Final Determination at 23.

<sup>38</sup> EPA, Light-Duty Automotive Technology, Carbon Dioxide Emissions, and Fuel Economy Trends Report 1975-2016 (Nov. 2016), <https://www.epa.gov/fuel-economy-trends/download-co2-and-fuel-economy-trends-report-1975-2016> (“EPA Fuel Economy Trends Report 2016”).

<sup>39</sup> EPA Fuel Economy Trends Report 2016, at ES-10.

<sup>40</sup> EPA webpage snapshot, Midterm Evaluation of Light-Duty Vehicle Greenhouse Gas (GHG) Emissions Standards for Model Year 2022-2025, [https://19january2017snapshot.epa.gov/regulations-emissions-vehicles-and-engines/midterm-evaluation-light-duty-vehicle-greenhouse-gas-ghg\\_.html](https://19january2017snapshot.epa.gov/regulations-emissions-vehicles-and-engines/midterm-evaluation-light-duty-vehicle-greenhouse-gas-ghg_.html) (last accessed Oct. 26, 2018).

<sup>41</sup> EPA, *Notice of Intention To Reconsider the Final Determination of the Mid-Term Evaluation of Greenhouse Gas Emissions Standards for Model Year 2022–2025 Light Duty Vehicles*, 82 Fed. Reg. 14,671 (Mar. 22, 2017).

<sup>42</sup> EPA, *Revised Final Determination: Mid-Term Evaluation of Greenhouse Gas Emissions Standards for Model Year 2022-2025 Light-Duty Vehicles*, 83 Fed. Reg. 16,077 (Apr. 13, 2018).

U.S. Circuit Court of Appeals for the D.C. Circuit, and that action is ongoing.<sup>43</sup> In light of the procedural and substantive deficiencies with EPA's effort to revise the Final Determination, this determination does not provide NHTSA with any meaningful record information or analysis to consider in its DEIS analysis.

We maintain that the extensive record summarized above conflicts with the DEIS's preferred alternative to relax the augural standards established in the 2012 final rule. The existing record fundamentally defines the starting point for NHTSA's 2012 draft EIS and standard-setting effort and underscores that any weakening of the CAFE standards relative to the augural standards would be arbitrary and capricious and unsupported by the existing record and that, if anything, the standards should be strengthened. The DEIS is flawed because it fails to take into account the strength of this record in evaluating and selecting its alternative scenarios.

*ii. NHTSA Failed to Consider New Data*

In addition to the extensive record already before NHTSA, there have been numerous studies and new data made available subsequent to the EPA's 2017 Final Determination that further demonstrate that even more protective standards than those reflected in the augural standards are feasible and highly-cost effective. The reports listed below are directly relevant to NHTSA's CAFE deliberations. The agency should have carefully evaluated and considered this new information in the DEIS, as part of any analysis of proposed fuel economy standards or alternatives that are considered. Below are several examples of new information that should have been included in NHTSA's analysis. EDF has expanded on this discussion in our comment on the NPRM.

1. Lutsey, Nic et.al., "Efficiency Technology and Cost Assessment for the U.S. 2025-2030 Light-Duty Vehicles," International Council on Clean Transportation (March 2017), available at <http://theicct.org/US-2030-technology-cost-assessment>

One of the objectives of this report authored by the International Council on Clean Transportation (ICCT) was to update the midterm regulatory analysis for new MY2025 light-duty vehicles. ICCT's analysis considered the latest research literature, simulation modeling and industry developments on technology efficiency and costs. One of the study's key findings was that "previous costs of compliance have been greatly overestimated" in both the TAR and EPA's final determination. The study concludes that "state-of-the-art engineering studies and emerging supplier technology developments indicate that costs for lightweighting, direct injection, and cooled exhaust gas recirculation will be reduced by hundreds of dollars, and electric vehicles will drop by thousands of dollars per vehicle by 2025." Specifically, ICCT estimated the per vehicle compliance technology cost relative to the 2021 standards at \$551 compared to EPA's Final Determination estimate of \$875 and NHTSA's TAR

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<sup>43</sup> See Petition for Review, *Ctr. for Biological Diversity et al. v. EPA*, No. 18-1139 (D.C. Cir. filed May 15, 2018), (consolidated with *California et al. v. EPA*, No. 18-1114 (D.C. Cir. filed May 1, 2018)), available at [https://www.edf.org/sites/default/files/content/2018.05.18\\_EDF\\_and\\_allies\\_Petition.pdf](https://www.edf.org/sites/default/files/content/2018.05.18_EDF_and_allies_Petition.pdf).

estimate of \$1245. This report adds to the already substantial record that demonstrates more stringent standards deserve serious consideration and should be analyzed as alternatives in NHTSA's EIS.

2. T. Cackette and R. Rykowski, "Technical Assessment of CO2 Emission Reductions for Passenger Vehicles in the Post-2025 Timeframe," (February 2017), *available at* [https://www.edf.org/sites/default/files/content/final\\_public\\_white\\_paper\\_post\\_2026\\_co2\\_reductions2.27\\_clean.pdf](https://www.edf.org/sites/default/files/content/final_public_white_paper_post_2026_co2_reductions2.27_clean.pdf)

Although the main thrust of this report was to look at what CO2 and fuel economy levels are achievable in the 2030 timeframe, the authors also examined how much more CO2 reduction could be achieved when relying only on currently available conventional technologies. The authors used the latest public version of EPA's OMEGA model (Version 1.4.56 and Pre-Processors made available by EPA in November 2016) and found that conventional technologies such as mild hybrids, Atkinson and Miller cycle engines "are projected to be underutilized in meeting the 2025 standard." This report reinforces the conclusion that more stringent CO2 and fuel economy standards are achievable at reasonable cost in the 2025 timeframe.

3. CARB, "California's Advanced Clean Cars Midterm Review Report" (January 18, 2017) *available at* <https://www.arb.ca.gov/msprog/acc/acc-mtr.htm>

This report presents CARB's technical analysis for the midterm review of the MY2022-2025 standards. Based on its technical review, CARB concluded that "Compliance with the current national GHG standards for model years 2022-2025 will result in equivalent or greater GHG benefits (at the same or lower cost to manufacturers) than originally projected for California and accordingly, consistent with the U.S. EPA Final Determination, changes to the stringency of the national or California GHG standards are not necessary or warranted." The conclusion California drew from its midterm review is consistent with every major analysis of the cost-effective feasibility of the MY2022-2025 standards, including the 2012 final rule, the joint TAR, EPA's January final determination, and numerous independent studies. This assessment and the previous reports must be carefully considered by NHTSA in the EIS, and during the rulemaking process.

## **B. NHTSA Fails to Consider and Objectively Evaluate an Appropriate Range of Alternatives**

EPCA mandates that NHTSA achieve the "maximum feasible" standards. A range of analysis and evidence demonstrates that it is possible to improve fuel economy beyond the existing standards; given its clear statutory directive to maximize fuel savings, NHTSA should have considered a range of alternatives that would be more protective than the existing standards. NHTSA's failure to consider such options in the DEIS is unlawful.



EPA’s January 2017 Final Determination provided a robust demonstration that the existing standards are achievable and indeed, that more stringent MY2022-2025 standards are feasible. The Technical Assessment Report (TAR) for EPA’s Mid-Term Evaluation of light-duty vehicle standards confirms “[a] wider range of technologies exist for manufacturers to use to meet the MY2022-2025 standards, and at costs that are similar or lower, than those projected in the 2012 rule.”<sup>44</sup>

New technologies continue to enter the market at an accelerating pace, and there is strong evidence that costs will be lower than those projected in the TAR. For example, a study by the International Council on Clean Transportation (ICCT) found that improvements in current technologies, together with emerging technologies, means 8% - 10% greater efficiency improvements are available compared to the 2012 assessment by EPA and NHTSA.<sup>45</sup> Similarly, ICCT found that, based on new engineering studies and supplier technology developments, key technology costs will be reduced by hundreds of dollars. ICCT’s update of the assessment with this new information shows that the costs to meet the 2025 standards will be 34%-40% less than EPA and NHTSA estimated in the TAR, providing a compelling reason to increase the standards through 2025.<sup>46</sup> These reductions in technology costs far outweigh the effects of lower gas prices. NHTSA should incorporate these updates to technology costs as well as other updated evidence as part of their analysis.

Even more recent information strongly supports the achievability of more ambitious standards. These materials are discussed in detail in EDF’s NPRM Comment at Part IV.

#### **IV. NHTSA Did Not Provide Adequate Time for Public Comment on the DEIS**

By failing to provide sufficient time for members of the public to analyze and comment on the complex technical issues and extensive material reflected in the DEIS and related documents, NHTSA has denied the public an important opportunity to provide input on the environmental assessment of a significant, harmful proposal.

NHTSA released its Draft Environmental Impact Statement on August 2, 2018, and EPA published a NEPA Notice of Availability on August 10, stating that the public comment period would close on September 24, 2018.<sup>47</sup> EDF and other non-governmental organizations requested that NHTSA align the DEIS comment deadline with the NPRM comment deadline, and that the agency extend the comment period to allow for a 120-day comment period on the proposed rule and DEIS.<sup>48</sup> Numerous other stakeholders also requested a comparable comment extension,

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<sup>44</sup> Draft TAR at ES-2.

<sup>45</sup> Nic Lutsey et al., *Efficiency technology and cost assessment for U.S. 2025–2030 light-duty vehicles*, International Council on Clean Transportation (Mar. 2017), <http://www.theicct.org/US-2030-technology-cost-assessment>.

<sup>46</sup> *Id.*

<sup>47</sup> EPA, *Environmental Impact Statements; Notice of Availability*, 83 Fed. Reg. 39,570 (Aug. 10, 2017).

<sup>48</sup> Letter from Center for Biological Diversity et al., to Deputy Administrator King, NHTSA, *Re: Request for Extension of Comment Period* (Aug. 30, 2018), <https://www.regulations.gov/document?D=NHTSA-2018-0067-3278>. A number of other entities requested the same comment deadline alignment and extension, including: the; the



including 18 states,<sup>49</sup> 32 U.S. Senators,<sup>50</sup> the trade group representing major automakers,<sup>51</sup> the City of Los Angeles,<sup>52</sup> the National Coalition for Advanced Transportation,<sup>53</sup> and the American Lung Association.<sup>54</sup>

Just days before the DEIS comments were ostensibly due, the agencies responded by denying the extension requests. NHTSA did issue a correction, however, adding three days to the comment period and aligning the DEIS comment deadline with the NPRM deadline, so that all comments are due October 26, 2018.<sup>55</sup>

This 63-day comment period is not sufficient for members of the public to review and draft informed comments on a 1,300-page DEIS with appendices, accompanied by a 1,600-page Preliminary Regulatory Impact Analysis (“PRIA”)—not to mention the Notice of Proposed Rulemaking (“NPRM”) itself, which is more than 500 pages long and was not published in the Federal Register until August 24, 2018.<sup>56</sup> Moreover, these documents reflect a foundation of complex technical analyses and modeling that were only released (in part) on the day of the proposal, despite EDF and others’ pointed requests for such information in advance, to help facilitate our ability to provide informed comments.<sup>57</sup> The agencies’ justification for the

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Northeast States for Coordinated Air Use Management (NESCAUM); the National Coalition for Advanced Transportation; and the City of Los Angeles. *See*

<https://www.regulations.gov/docketBrowser?rpp=25&so=DESC&sb=commentDueDate&po=0&s=extend&dct=PS&D=NHTSA-2018-0067>.

<sup>49</sup> Letter from the States of California, Connecticut, Delaware, Iowa, Illinois, Maine, Maryland, Massachusetts, Minnesota, New Jersey, New York, North Carolina, Oregon, Pennsylvania, Rhode Island, Vermont, Washington, and the District of Columbia, *Re: Request for Extension of Comment Period and Additional Public Hearings* (Aug. 27, 2018), <https://www.regulations.gov/document?D=NHTSA-2018-0067-2567>.

<sup>50</sup> Press Release: 32 Senators Urge EPA to Extend Comment Period for Proposed Rollback of Fuel Economy Standards (Sept. 10, 2018), <https://www.feinstein.senate.gov/public/index.cfm/press-releases?ID=AE3ABA60-FDD9-4505-8409-008A26FFBA18>.

<sup>51</sup> Letter from Chris Nevers, Auto Alliance, *Re: Request for Extension of Comment Periods in [the SAFE] Proposed Rule for Model Years 2021-2026 (Dockets EPA-HQ-OAR-2018-0283, NHTSA-2018-0067/NHTSA-2017-0069) and [DEIS] (Docket NHTSA-2018-0067-1425)*, (Sept. 6, 2018), <https://www.regulations.gov/document?D=NHTSA-2017-0069-0397>.

<sup>52</sup> Letter from Mike Feuer, City Attorney, City of Los Angeles, *Re: Request for Extension of Comment Period and Additional Public Hearings* (Sept. 7, 2018), <https://www.regulations.gov/document?D=NHTSA-2018-0067-4159>.

<sup>53</sup> Letter from Latham & Watkins, on behalf of National Coalition for Advanced Transportation, *Re: Request for Extension of Public Comment Period for the Proposed Safer Affordable Fuel-Efficient (SAFE) Vehicles Rule and DEIS* (Aug. 29, 2018), <https://www.regulations.gov/document?D=NHTSA-2018-0067-2872>.

<sup>54</sup> Letter from Harold Wimmer, President & CEO, American Lung Association, *Re: Comment period extension request for proposed rulemaking— Docket No. NHTSA-2018-0067; EPA-HQ-OAR-2018-0283* (Sept. 9, 2019), <https://www.regulations.gov/document?D=NHTSA-2018-0067-3615>.

<sup>55</sup> EPA & NHTSA, *The Safer Affordable Fuel-Efficient (SAFE) Vehicles Rule for Model Years 2021-2026 Passenger Cars and Light Trucks; Extension of Comment Period* (Sept. 21, 2018), <https://www.federalregister.gov/documents/2018/09/26/2018-20962/the-safer-affordable-fuel-efficient-vehicles-rule-for-model-years-2021-2026-passenger-cars-and-light>.

<sup>56</sup> NHTSA & EPA, NPRM: *The Safer Affordable Fuel-Efficient (SAFE) Vehicles Rule for Model Years 2021–2026 Passenger Cars and Light Trucks*, 83 Fed. Reg. 42,986 (Aug. 24, 2018).

<sup>57</sup> EDF and allies submitted requests to EPA and NHTSA as early as March 2018, asking that the agencies release the most current versions of their modeling tools and inputs: the OMEGA and Volpe models, respectively. *See* Letter to William Wehrum, EPA Assistant Administrator, Office of Air & Radiation, from EDF, NRDC, Safe Climate Campaign, and Union of Concerned Scientists (Mar. 20, 2018),

unlawfully circumscribed comment period—the need to set standards swiftly, to provide certainty for automakers—impermissibly ignores the interests of the many other stakeholders with vital interests at stake, and furthermore cannot be reconciled with auto industry associations’ *own requests* for a substantially longer comment period.<sup>58</sup>

A successful NEPA process is contingent on harnessing effective public involvement. NEPA’s implementing regulations provide that, “Federal agencies shall to the fullest extent possible . . . encourage and facilitate public involvement in decisions which affect the quality of the human environment” and, further, “[m]ake diligent efforts to involve the public in preparing and implementing their NEPA procedures.” 40 C.F.R. §§ 1500.2(d), 1506.6(a). NHTSA’s imposition of an unreasonably short comment period for this DEIS unlawfully undermines public participation in the NEPA process.

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<https://www.regulations.gov/document?D=NHTSA-2018-0067-5685>; Letter to Heidi King, NHTSA Deputy Administrator, from EDF, NRDC, Safe Climate Campaign, and Union of Concerned Scientists (Mar. 20, 2018), <https://www.regulations.gov/document?D=NHTSA-2018-0067-5685>; Letter to William Wehrum, EPA Assistant Administrator, Office of Air & Radiation, from EDF, NRDC, Safe Climate Campaign, and Union of Concerned Scientists (Sept. 20, 2018), <https://www.regulations.gov/document?D=EPA-HQ-OAR-2018-0283-1057>, <https://www.regulations.gov/document?D=NHTSA-2018-0067-5648>.

<sup>58</sup> Letter from Chris Nevers, Auto Alliance, *Re: Request for Extension of Comment Periods in [the SAFE] Proposed Rule for Model Years 2021-2026 (Dockets EPA-HQ-OAR-2018-0283, NHTSA-2018-0067/NHTSA-2017-0069) and [DEIS] (Docket NHTSA-2018-0067-1425)*, (Sept. 6, 2018), <https://www.regulations.gov/document?D=NHTSA-2017-0069-0397>; Letter from Latham & Watkins, on behalf of National Coalition for Advanced Transportation, *Re: Request for Extension of Public Comment Period for the Proposed Safer Affordable Fuel-Efficient (SAFE) Vehicles Rule and DEIS* (Aug. 29, 2018), <https://www.regulations.gov/document?D=NHTSA-2018-0067-2872>.