

**ORAL ARGUMENT NOT YET SCHEDULED**

**IN THE UNITED STATES COURT OF APPEALS  
FOR THE DISTRICT OF COLUMBIA CIRCUIT**

STATE OF CALIFORNIA, <i>et al.</i> ,	)	
	)	
<i>Petitioners,</i>	)	
v.	)	
	)	
U.S. ENVIRONMENTAL	)	
PROTECTION AGENCY,	)	No. 18-1114
	)	(consol. with Nos. 18-1118,
<i>Respondent,</i>	)	18-1139 & 18-1162)
	)	
ALLIANCE OF AUTOMOBILE	)	
MANUFACTURERS, <i>et al.</i> ,	)	
	)	
<i>Movant-Respondent-Intervenors.</i>	)	

**ADDENDUM TO  
BRIEF OF PUBLIC INTEREST ORGANIZATION PETITIONERS**

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I.

Declarations of Center for Biological Diversity

I.

Declarations of Center for Biological Diversity

1. Sylvia Arredondo, Center for Biological Diversity member

**DECLARATION OF SYLVIA ARREDONDO**

I, Sylvia Arredondo, state and declare as follows:

1. I am over 18 years of age and competent to give this declaration. I have personal knowledge of the following facts, and if called as a witness could and would testify competently to them. As to those matters which reflect an opinion, they reflect my personal opinion and judgment on the matter.

2. I live on West F Street in Wilmington, California, and have lived there since 2015. I am a Civic Engagement Coordinator for Communities for a Better Environment, an environmental justice organization that seeks to prevent pollution and build healthy communities and environments. I have been a member of the Center for Biological Diversity (the "Center") since 2015, and I rely upon the Center to represent my interests in protecting our air quality and our environment through gathering and dissemination of information about air pollution, advocacy to remediate that pollution, and enforcement of our environmental laws in the courts. I work on air pollution issues through my employer, Communities for a Better Environment.

3. I live about a mile from Phillips 66 Wilmington, a large oil refinery. I am aware that this refinery refines large amounts of oil and emits large quantities of pollutants, including particulate matter (PM 2.5) and nitrogen oxides that are precursors to ozone. Sometimes I can smell the pollution from the refinery when I drive on roads close to the refinery and when I take a walk in the vicinity, which I often do. I also bike in the area now and then and have the same unpleasant and worrying experience. I can also smell the pollution from the refinery at my doorsteps when the wind blows in the right direction. Sometimes I can't smell the pollution anymore because I have become used to it, even though visitors point it out to me.

4. I also live about a mile from both the Port of Los Angeles and the 110 freeway. The 110 freeway carries very heavy car and truck traffic where I live, including traffic to and from the port and the refinery. I can sometimes smell vehicle exhaust when I walk on roads close to the freeway, as I often do, and I am aware of and can see the soot and grime that comes from the refinery and from the vehicle traffic. I have fruit trees in my yard, and I can see a layer of black dust

1 on their leaves. When I haven't used my car for a while, it is covered with a heavy layer of black  
2 dust as well.

3 5. I grew up in Wilmington and lived with my parents about a mile from a different  
4 refinery and directly across the street from oil wells, drilling installations and train switching  
5 stations. As a child I was diagnosed with mild asthma and once developed bronchitis. I lived in  
6 Wilmington until I was in my 20s and then moved away to the Bay Area for college. I began feeling  
7 better there and my health improved, but became sick again after I moved back to the harbor area in  
8 2012 and began living in Wilmington and close to the Phillips 66 refinery, the 110 freeway and the  
9 port in 2015.

10 6. I am extremely concerned and care greatly about the bad air quality where I live, both  
11 for myself personally and for the community where I live and on whose behalf I advocate. The air is  
12 polluted around my home, within a large radius of the Phillips 66 refinery, in the vicinity of the Port  
13 of Los Angeles, and in the area close to the 110 freeway.

14 7. I fall ill and must take medication as a result of the air pollution from the refinery and  
15 the heavy traffic on the 110 freeway and throughout the Port of Los Angeles area. This past year, I  
16 suffered from sinus infections that were worse than any I had experienced previously. In one  
17 instance, I was home sick and missed work for about a week, and I might have lost my job if I were  
18 working for an organization with a mission other than caring for communities and people affected by  
19 air pollution. When I get sinus infections, I become extremely sensitive to light and noise, and feel  
20 painful pressure in my nasal cavities, above my eyelids, in my temples and in my ears. When my  
21 nasal cavities are inflamed, it feels as if I have a painful ear infection even though the problem is the  
22 nasal cavity inflammation. My throat becomes sore, and the discomfort and pain keep me from  
23 working and home in bed. I was fully incapacitated in this way twice last year and once the year  
24 before. My sinus infections are becoming worse and more frequent, and my health worsens when  
25 temperatures rise, as they have in recent years, the hottest years I've ever experienced in the Los  
26 Angeles area. I know that the greenhouse gases produced by refineries and by vehicles are  
27 responsible for the ever-rising temperatures that make my symptoms worse.

28

1           8.       I am now on medication, administering a nasal decongestant weekly or daily,  
2 depending on the temperature. I also take allergy tablets and prescribed eye drops as my eyes get dry  
3 and itchy. I try to use these preventatively, hoping to keep more sickness away, but I still have  
4 become incapacitated. I suffer all these effects even though I have changed my diet to make it as  
5 healthy as possible and even though I have increased my fluid intake. I also use an inhaler whenever  
6 I exercise and when I go out for a hike or go biking. I get short of breath and sometimes feel like I  
7 can't breathe at all, and feel that my lung capacity is extremely limited. It feels like I have asthma  
8 again, even though that has not been diagnosed. I know it is the pollution from the oil refinery and  
9 from vehicles that makes me so sick. Because of my job, I am also aware of many people in  
10 Wilmington that live close to the refinery, the Port of Los Angeles and the freeway who suffer from  
11 pollution-related illnesses, such as asthma, infections like mine, other lung diseases and even heart  
12 attacks. PM2.5 and ozone are known causes for all of these diseases. In addition, refineries such as  
13 the Phillips 66 Wilmington refinery emit benzene, which is a carcinogen. The Wilmington area is a  
14 known cancer cluster, particularly for leukemia, a cancer directly associated with benzene emissions.  
15 I know many Wilmington community members suffering from leukemia, including children already  
16 diagnosed with the disease; in 2015, a friend of mine died of leukemia. This dreadful consequence in  
17 my own community of benzene refinery emissions makes me anxious, and I fear for my own health  
18 and risk of contracting cancer as well.

19           9.       Because of my personal health issues from pollution and my job duties, I am aware of  
20 regulations that reduce pollution affecting my health and that of the communities I serve. As such, I  
21 know that in 2012, the Environmental Protection Agency ("EPA") and the National Highway Traffic  
22 Safety Administration ("NHTSA") issued regulations that set increasingly stringent standards which  
23 reduce pollution, such as PM2.5, ozone precursors like nitrogen oxides, and greenhouse gases, from  
24 cars and light trucks built during the years 2017-2025 (the "Vehicle Rule"). Because of the Vehicle  
25 Rule, I was assured that less oil would be refined in America's refineries, including at the Phillips 66  
26 refinery where I live, because less fuel will be required by America's fleet of cars. Lower vehicle  
27 fuel consumption meant less of the PM2.5, nitrogen oxides, benzene and other refinery pollution  
28 where I live and less pollution to make me and others sick. The Vehicle Rule would also have

1 reduced PM2.5 and nitrogen oxides from the vehicles that travel on the 110 freeway, as increasingly  
2 stringent fuel efficiency standards would make sure that vehicles emit fewer of these pollutants that  
3 make me sick. And the Vehicle Rule would also have reduced the greenhouse gases from both  
4 refining and from vehicle traffic that contribute to the worrisome temperature increases I have  
5 personally observed in the last five years, and that make my health problems worse than when the  
6 temperature is lower.

7 10. In early 2017, EPA issued a final determination that the Vehicle Rule standards  
8 remained appropriate and would remain in place through 2025. EPA actually found that the  
9 standards could be achieved at less cost than it had assumed in 2012 and, if anything, could be  
10 strengthened. I learned, however, that in April of this year, EPA issued a different decision that  
11 reversed and withdrew that 2017 final determination (the “Withdrawal Decision”), finding that the  
12 vehicle standards were no longer appropriate, were too stringent, and would be rolled back. Now that  
13 the Withdrawal Decision is in place, the Vehicle Rule and its pollution reduction and fuel efficiency  
14 requirements will be significantly weakened. The Phillips 66 Wilmington refinery and the vehicles  
15 on the 110 freeway will emit more of the air pollution I must breathe in and that make me sick, and I  
16 and the members of the community I serve will suffer more of the severe health consequences I have  
17 described.

18 11. EPA’s Withdrawal Decision causes direct harm to my health. Because of the  
19 increased pollution stemming from weakened standards, my health will continue to suffer and may  
20 get worse and I will very likely miss more days of work. I am anxious about the prospect of more  
21 traumatic health experiences such as severe sinus infections, unnerving light and noise sensitivity,  
22 pressure in my head, pain in my ears, shortness of breath and inability to work. I experience fear and  
23 anxiety about how much my health and that of my community will continue to deteriorate. But if  
24 EPA’s Withdrawal Decision is reversed in court, the Vehicle Rule will continue to reduce more of  
25 the pollution that makes me sick, redressing the harm I experience.

26 12. EPA’s Withdrawal Rule includes no information about the specific facts that made  
27 EPA decide to roll back the Vehicle Rule. It talks vaguely about the burden the Vehicle Rule  
28 supposedly places on the auto industry, but says next to nothing about the amount of extra pollution

1 that will result from rolling it back, the consequences to my health and the health of others, and the  
2 additional burdens placed on communities like mine that are already suffering disproportionately  
3 from the degradation of the air we must breathe. My job requires me to reach out to that community  
4 and provide it with information about air quality, how much pollution is coming from which air  
5 pollution sources, what that will do to the community's health and wellbeing, and how to advocate to  
6 stop these effects. Now, however, a rule that has protected us from pollution in increasing amounts  
7 every year will be frozen or made less effective, and yet EPA provided no analysis of the  
8 consequences, either by analyzing the record EPA assembled just over a year ago when it found the  
9 Vehicle Rule to be appropriate, or by determining why that record is now incorrect, or by describing  
10 the amount of additional pollution I and the members of my community must contend with and the  
11 consequences in health and well-being we will have to suffer.

12 13. This lack of information deprives me of my procedural rights to be informed about  
13 the reasons for and the effects that come from the Withdrawal Rule, and I cannot pass on that  
14 information to the members of my community. I need this information as part of my job to enable  
15 its members to advocate more effectively on behalf of stronger pollution control measures. As it is, I  
16 cannot fully understand and explain to others on what basis and facts the Vehicle Rule has been  
17 deemed not appropriate and will be rolled back. For the same reason, the Center, on which I also rely  
18 to advocate for air pollution reduction, is hampered in its ability to protect me and others by sharing  
19 that information. But if the Withdrawal Rule is invalidated in court and EPA must perform the  
20 proper analysis and provide the necessary facts for any finding that the Vehicle Rule is no longer  
21 appropriate and must be rolled back, I will come into possession of this information and can perform  
22 the duties of my job in effectively advocating for the right of disproportionately affected  
23 communities to breathe air that does not sicken them. The violation of my procedural and  
24 informational rights will have been remedied.

25 I declare under penalty of perjury that the foregoing is true and correct and was executed on  
26 August 20, 2018 at Wilmington, California.

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Sylvia Arredondo

I.

Declarations of Center for Biological Diversity

2. Janet DietzKamei, Center for Biological Diversity member

**DECLARATION OF JANET DIETZKAMEI**

I, Janet DietzKamei, state and declare as follows:

1. I am over 18 years of age and competent to give this declaration. I have personal knowledge of the following facts, and if called as a witness could and would testify competently to them. As to those matters which reflect an opinion, they reflect my personal opinion and judgment on the matter.

2. I live in Fresno, California, and have lived there since 2003. I am retired from a career as a Federal employee, having worked for the Air Force, the U.S. Department of the Treasury, the Veterans' Administration and the United States Department of Agriculture Forest Service for 25 years.

3. I am deeply concerned and care greatly about the quality of the air in Fresno and the surrounding areas. The poor air quality in my home town, my community and California's air-polluted Central Valley makes me severely ill, and I am keenly interested in doing all I can to improve the air I must breathe. I have been a member of the Center for Biological Diversity (the "Center") since 2017, and I rely upon the Center to represent my interests in protecting our air quality and our environment through the gathering and dissemination of information about air pollution, advocacy to remediate that pollution, and enforcement of our environmental laws. I also have been a member of the Central Valley Air Quality Coalition ("CVAQ") since June, 2016 and have been active with CVAQ since May, 2015. Since December 2015, I have also been active with the Fresno Environmental Reporting Network ("FERN"). CVAQ and FERN are organizations that monitor and report on the pollution in our air and advocate on behalf of myself and other citizens to reduce that pollution.

1. I am aware that in 2012, the Environmental Protection Agency ("EPA") and the National Highway Transportation and Safety Administration ("NHTSA") issued fuel efficiency and greenhouse gas standards for all cars and light trucks manufactured during model years 2017 to 2025 (the "Vehicle Rule") and that those standards increased these vehicles' fuel efficiency and greenhouse gas reductions every year through 2025, on a rising curve that contains steeper increases in the later years. I know that in January 2017, as required by regulations promulgated in 2012 as

1 part of the Vehicle Rule, EPA issued a final determination finding that the Vehicle Rule continued to  
2 be “appropriate” and would remain in effect through 2025. EPA issued this final determination after  
3 notice and comment and based on an extremely thorough analysis and a complete technical review,  
4 and found that the Vehicle Rule could be readily achieved, at less cost than anticipated in 2012, and,  
5 if anything, could be made more stringent. In April of this year, however, EPA reversed course and  
6 issued a decision withdrawing the January 2017 final determination (the “Withdrawal Rule”), now  
7 finding that the Vehicle Rule was “not appropriate,” was too stringent, and needed to be rolled back.  
8 Now that the 2017 final determination has been withdrawn by the Withdrawal Rule, the Vehicle  
9 Rule will be made less stringent. Lower stringency means that vehicles will combust more gasoline  
10 per mile traveled, thereby increasing the amount of dangerous pollutants they emit, including ozone-  
11 forming nitrogen oxides and particulate matter. The vehicles will also emit more greenhouse gases  
12 as the fuel they combust increases.

13         2. I am extremely concerned about and personally injured by the Withdrawal Rule.  
14 Because the Vehicle Rule will be made less stringent than it was, I fear that the increased pollution  
15 from the vehicle fleet will restrict my daily life activities even more since I cannot help but breathe  
16 the pollution. The Withdrawal Rule directly harms my health and has concrete, direct and  
17 frightening daily effects on my personal quality of life.

18         3. Since about 2009, or some six years after moving to Fresno, I have suffered from  
19 severe asthma. I had allergies before moving to Fresno in 2003, but had never had asthma. Around  
20 2009, I was diagnosed with asthma after having a severe reaction to an unknown trigger pollutant  
21 when I was in Virginia on vacation. Within 5 days of the onset of this reaction, I was in the  
22 Emergency Room (“ER”) with severe bronchitis, exceedingly sick. The consulting doctor was  
23 leaning toward admitting me to hospital. I was prescribed inhalers and other asthma relieving  
24 medications with the understanding that if I did not improve, I would return to the ER. Until the ER  
25 visit in Virginia, I had not known that I had asthma. After I was diagnosed, I realized that I had been  
26 suffering from asthma-related sicknesses since 2006.

27         4. Air quality in Fresno and the San Joaquin Valley is among the worst in the nation,  
28 and the many vehicles on the road in Fresno and in the Valley contribute enormously to the problem.

1 My house is located about 1,400 feet from the busy 180 freeway as the crow flies. I must monitor  
2 both the particulate matter and the ozone in my area on a daily and sometimes hourly basis, and  
3 when the air quality for either of these pollutants turns from good to moderate, I am immediately  
4 affected: when ozone is less than “good”, I cannot leave the house, and when particulates are less  
5 than “good,” I cannot leave the house without wearing a mask, and even then I still take the risk of  
6 suffering a severe and debilitating asthma attack. I also cannot leave my house any time there is  
7 smoke in the air. During the months of November through February, my asthma symptoms are  
8 exacerbated by smoky air. To prevent pollutants picked up while outside from coming into our  
9 home, my husband and I take off our outside clothing to put on clean clothing only worn inside of  
10 the house. I have towels on my sofa and chairs which can be washed after visitors sit on our  
11 furniture. No one can wear shoes inside of the house. We have a nine pound dog which lives inside  
12 of the house. When he returns from a walk, or goes out for potty breaks, we wash his feet and wipe  
13 him with a damp towel.

14 5. Asthma has made me exceedingly sick. When I suffer an attack, it is difficult just to  
15 breathe. A particularly severe attack occurred in the summer of 2012 when I simply went outside to  
16 take my dog for a walk. Even though I wore a mask, PM2.5 particulates and ozone were in the  
17 moderate level, and I began having trouble breathing as I could not inhale any air. Feeling faint and  
18 lightheaded, I panicked and turned around to go back home. I nearly lost consciousness right there  
19 on the road. I believe that only the adrenaline produced by my panic allowed me to make it back  
20 home, where I administered asthma medication and then passed out. The mask only protected me  
21 from the PM2.5 particulates, not the ozone, a lesson I learned that day. The entire experience was  
22 horrific. Because I never want to experience such an attack again, I now do not leave my home if  
23 either the particulate matter or the ozone is not within the “good” range as indicated by real-time  
24 monitoring websites. I access those sites with my computer or on the phone, and often again on my  
25 phone after leaving my house to make sure the air quality has not changed. I receive alerts on my  
26 phone indicating air quality has degraded to air I can not breathe. I depend upon these alerts. I now  
27 have my own monitor for PM2.5. I always consult it before I go outside. It gives me “real-time”  
28 readings of PM2.5 air quality. This past winter, I did not become air pollution sick due to the

1 readings I used from my personal monitor positioned in my back yard. I have it hanging outside at  
2 the same level where I am breathing air.

3         6.         When I begin having an attack, I feel a heaviness in my chest and cannot get air.  
4 Often I also start coughing. I feel like a fish out of water, gasping. If I am outside and begin to feel  
5 this chest pressure, shortness of breath, and/or coughing, I go into a building, a house, a car, or  
6 anywhere else that is enclosed so that I am better sheltered from the polluted air. Other effects of  
7 particulate matter and ozone air pollution on my health sometimes include sneezing and sniffing,  
8 feeling tired, achy, suffering from headaches, and feeling as if I am about to come down with a cold  
9 or flu. I also have a chronic cough when the particulate matter count increases. I love to ride my  
10 bike and have been an avid outdoor person for my entire life, but now must spend most of my time  
11 inside my house. Because my activity level is so severely restricted, I now also suffer from  
12 unhealthy weight gain. To protect myself from pollutants, I always check air quality before going to  
13 the gym to do some water aerobics. Sometimes there is an unexpected trigger, so when I do drive to  
14 the gym, I sometimes cannot walk from the parking lot to the gym because I begin to feel an asthma  
15 attack coming on, and I must drive back home.

16         7.         Many of my friends and acquaintances and their children who live in Fresno or  
17 elsewhere in the Central Valley suffer from asthma or other severe health complications because of  
18 the air pollution caused by motor vehicles. I am concerned for them as well and fear for their well-  
19 being. During periods when air pollution is above moderate, many asthmatics end up in Central  
20 Valley Emergency Rooms and hospitals. I do all I can possibly do to avoid becoming so ill.

21         8.         Now that the Withdrawal Rule is in place, the Vehicle Rule's fuel efficiency and  
22 greenhouse gas standards will be weakened, and PM2.5, ozone-forming nitrogen oxides and  
23 greenhouse gases will all increase. As a result, the air I must breathe will often become or continue  
24 to be too polluted, and I will become sick if I go outside or I will be compelled to stay shut into my  
25 house. The Withdrawal Rule causes direct and severe harm to me personally. My health will  
26 continue to suffer and get even worse, and my quality of life cannot improve. I suffer emotional  
27 distress knowing that the Vehicle Rule will be weakened. But on the other hand, if the Withdrawal  
28 Rule is invalidated, the Vehicle Rule will again become effective, particulate matter and ozone

1 pollution will continue to be reduced, days when the air quality remains good will increase, my  
2 health will improve and I will be able to leave my house more often.

3 9. EPA issued the Withdrawal rule without providing information vital to me, including  
4 an analysis showing the facts and any reasoned conclusions for abandoning the 2017 final  
5 determination, the necessary technical analysis, and the effects that weakening the Vehicle Rule will  
6 have on emissions and the enormous attendant costs. EPA did not analyze the extensive record of the  
7 2017 final appropriateness determination at all, and did not consider what the increased pollution  
8 resulting from a weakened Vehicle Rule will do to me and others. This lack of information deprives  
9 me of my procedural rights to be informed about the specific facts and reasons that caused the  
10 agency to act and what the consequences are, hindering my ability to inform others and seek to stop  
11 the negative consequences for me, my friends and neighbors. I am active in learning about and  
12 disseminating information about Fresno's poor air quality and its causes. When the air quality  
13 permits it, I speak about the effects of air pollution on my health at local, district and state-level air  
14 quality board meetings and I travel to Sacramento to speak to lawmakers on the subject. I also  
15 participate in air quality improvement workshops and training on subjects such as electric vehicle  
16 programs. I am currently attending workshops, participating in, and following Fresno City Plans to  
17 develop strategies to reduce city vehicle usage, including promoting and improving city  
18 transportation such as bus service. The Withdrawal Decision's lack of information has deprived me  
19 of my ability to learn and understand what EPA has done, how that affects other air pollution control  
20 efforts, and to communicate effectively with others about this action so it might be stopped, or to  
21 rely on the Center to do so. As such, the lack of information has harmed my procedural rights as a  
22 citizen and a member of the Center.

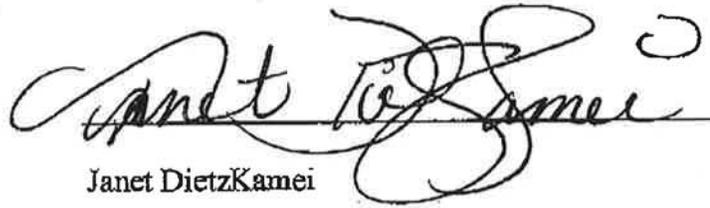
23 10. However, if the Withdrawal Rule is overturned, EPA will have to provide all the  
24 necessary analysis, technical assessments, cost comparisons, pollution analysis and other  
25 information required if it were again trying to overturn the 2017 final appropriateness determination,  
26 and the violation of these procedural and informational rights will be effectively resolved.

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I declare under penalty of perjury that the foregoing is true and correct and was executed on August 21, 2018 at Fresno, California.



Janet Dietz Kamei

I.

Declarations of Center for Biological Diversity

3. Kassia R. Siegel, Director of Center for Biological Diversity's Climate Law Institute



1 otherwise “protected” areas like the Everglades and the Northwest Hawaiian Islands, climate  
2 change threatens to render many other biodiversity conservation efforts futile. To prevent  
3 extinctions from occurring at levels unprecedented in the last 65 million years, emissions of  
4 carbon dioxide and other greenhouse gases must be reduced deeply and rapidly. Given the lag time  
5 in the climate system and the likelihood that positive feedback loops will accelerate global  
6 warming, leading scientists have warned that we have only a few decades, at most, to significantly  
7 reduce greenhouse gas emissions if we are to avoid catastrophic effects. Deep and immediate  
8 greenhouse gas reductions are required if we are to save many species which the Center is  
9 currently working to protect, including but not limited to the polar bear, Pacific walrus, bearded  
10 seal, ringed seal, ribbon seal, Kittlitz’s murrelet, American pika, Emperor penguin, and many  
11 species of corals. Leading scientists have also stated that levels of carbon dioxide, the most  
12 important greenhouse gas, must be reduced to no more than 350 parts per million (ppm) and likely  
13 less than that, “to preserve a planet similar to that on which civilization developed and to which  
14 life on Earth is adapted” (J. Hansen et al., *Target Atmospheric CO<sub>2</sub>: Where Should Humanity*  
15 *Aim?*, 2 *Open Atmospheric Sci. J.* 217, 218 (2008)). In May of this year, greenhouse gases  
16 exceeded 411 ppm for the first time in recorded history. *CO<sub>2</sub> Levels Break Another Record,*  
17 *Exceeding 411 Parts Per Million*, YaleEnvironment 360 (June 7, 2018), available at  
18 <https://e360.yale.edu/digest/co2-levels-break-another-record-exceeding-411-parts-per-million>.

19 6. One of the Climate Law Institute’s top priorities is the full and immediate use of  
20 the Clean Air Act to rein in greenhouse gases and other pollutants. The Clean Air Act is our  
21 strongest and best existing tool for doing so, and we have long worked through advocacy and  
22 litigation to enforce the Clean Air Act’s mandates to accomplish this goal. For example, the  
23 Center was a Plaintiff in *Massachusetts vs. EPA*, which resulted in the landmark Supreme Court  
24 decision finding that greenhouse gases are pollutants under the Clean Air Act, ultimately leading  
25 to EPA’s first rulemaking to reduce greenhouse gas emissions from passenger cars and light trucks  
26 under section 202. That rulemaking is comprised of the *Endangerment and Cause or Contribute*  
27 *Findings for Greenhouse Gases Under Section 202(a) of the Clean Air Act*, 74 Fed. Reg. 66,496  
28 (Dec. 15, 2009) (“Endangerment Finding”), and the *Light-Duty Vehicle Greenhouse Gas Emission*

1 *Standards and Corporate Average Fuel Economy Standards*, 75 Fed. Reg. 25,324, 25,397 (May 7,  
2 2010), updated twice since then, the last time by EPA and the National Highway Traffic Safety  
3 Administration through 2025, *2017 and Later Model year Light-Duty Vehicle Greenhouse Gas*  
4 *Emissions and Corporate Average Fuel Economy Standards, Final Rule*, 77 Fed. Reg. 62624 (Oct.  
5 15, 2012) (the “Vehicle Rule”). The Center submitted comments to each of those light duty  
6 vehicle rules, as well as to the first medium duty/heavy duty vehicle rule and its successor, the  
7 *Greenhouse Gas Emissions and Fuel Efficiency Standards for Medium- and Heavy-Duty Engines*  
8 *and Vehicles – Phase 2*, 81 Fed. Reg. 73478 (October 25, 2016).

9 7. The Center has been an active commenter and participant in other vehicle-related  
10 greenhouse gas and fuel efficiency rulemakings and associated litigation. For example, as noted  
11 below, the Center commented on a proposed rule proposing the repeal of emission regulations for  
12 glider trucks, *Repeal of Emission Requirements for Glider Vehicles, Glider Engines, and Glider*  
13 *Kits*, 82 Fed. Reg. 53,442, and it is an intervenor in *Truck Trailer Manufacturers Association, Inc.*  
14 *v. EPA*, No. 16-1430 (D.C. Cir., filed Oct. 12, 2017), a case involving emission limits for tractor  
15 trailers, and a petitioner in *NRDC et al. v. NHTSA*, No. 17-2780 (2nd Cir., filed Sept. 7, 2017), in  
16 which the Second Circuit reversed NHTSA’s indefinite suspension of inflation adjustments of  
17 civil penalties applicable to non-compliance with NHTSA’s corporate average fuel efficiency  
18 standards for light duty vehicles.

19 8. The Center has also been an active commenter in other Clean Air Act greenhouse  
20 gas rulemakings and associated litigation, including rulemakings that enforce the Clean Air Act’s  
21 PSD permitting program for greenhouse gases (e.g., *Prevention of Significant Deterioration and*  
22 *Title V Greenhouse Gas Tailoring Rule*, 75 Fed. Reg. 31,514 (2010); *Coalition for Responsible*  
23 *Regulation v. EPA* (D.C. Cir. 2012) 684 F.3d 102; *Util. Air Reg. Group v. EPA*, 573 U.S. \_\_\_, 134  
24 S. Ct. 2427, 2449 (2014)); the setting of greenhouse gas standards for aircraft (*Center for*  
25 *Biological Diversity v. EPA*, 794 F. Supp. 2d 151 (D.D.C. 2011); *Center for Biological Diversity*  
26 *v. EPA*, No. 1:16-CV-00681; *Finding that Greenhouse Gas Emissions From Aircraft Cause or*  
27 *Contribute to Air Pollution That My Reasonably Be Anticipated To Endanger Public Health and*  
28 *Welfare*, 81 Fed. Reg. 54422 (Aug. 15, 2016); the setting of greenhouse gas standards for the

1 power sector (*West Virginia v. EPA*, No. 15-1363 (D.C. Cir. filed October 23, 2015); *North*  
2 *Dakota v. EPA*, No. 15-1381 (D.C. Cir. Oct. 23, 2015); and many administrative and other  
3 proceedings seeking to enforce the Act's provisions for greenhouse gases (e.g., *Center for*  
4 *Biological Diversity v. EPA*, 722 F.3d 401 (D.C. Cir 2013).

5 9. In addition to our work on greenhouse pollution, the Center has also worked  
6 through the Clean Air Act to address other pollutants that adversely impact biodiversity and  
7 human health. For example, we filed suit against EPA for failing to review and revise the air  
8 quality criteria for oxides of nitrogen and sulfur oxides and the NAAQS for nitrogen dioxide and  
9 sulfur dioxide, resulting in new regulations (e.g., *Primary National Ambient Air Quality Standards*  
10 *for Nitrogen Dioxide; Final Rule*, 75 Fed. Reg. 6474 (February 9, 2010); *Primary National*  
11 *Ambient Air Quality Standard for Sulfur Dioxide; Final Rule*, 75 Fed. Reg. 35520 (June 22, 2010).  
12 These examples of the Center's comprehensive work on air pollution are illustrative only.

13 10. In January 2017, pursuant to special regulations governing the mid-term evaluation  
14 of the Vehicle Rule promulgated in 2012 (the "Mid-Term Evaluation Regulations"), EPA  
15 conducted a thorough analysis of an extensive technical and scientific record, including updated  
16 costs and benefits assessments and safety studies, and concluded that the Vehicle Rule remained  
17 "appropriate" and, if anything, could be strengthened (*Final Determination on the*  
18 *Appropriateness of the Model Year 2022-2025 Light-Duty Vehicle Greenhouse Gas Emissions*  
19 *Standards under the Midterm Evaluation* (Jan. 2017), available at  
20 <https://nepis.epa.gov/Exe/ZyPDF.cgi?Dockey=P100QQ91.pdf> (the "2017 Final Determination").  
21 Just 15 months later, on April 2, 2018, EPA withdrew its own 2017 Final Determination and now  
22 concluded that the Vehicle Rule was inappropriate, too stringent, and must be rolled back (the  
23 "Withdrawal Decision"). Weakening the Vehicle Rule will result in additional greenhouse gas  
24 pollutants and other pollutants such as particulate matter (PM2.5), nitrous oxides and ozone.

25 11. The additional pollutants resulting from weakening the Vehicle Rule endanger  
26 human health and welfare and cause serious adverse health effects to the public, including  
27 members of the Center. These pollutants particularly affect persons living next to busy highways  
28 and freeways, as well as near oil refineries that will refine the additional oil necessary to operate

1 less fuel efficient vehicles. Short-term exposure to emissions of nitrogen dioxide “can aggravate  
2 respiratory diseases, particularly asthma, leading to respiratory symptoms (such as coughing,  
3 wheezing, or difficulty breathing), hospital admissions and visits to emergency rooms”; longer-  
4 term exposure “may contribute to the development of asthma and potentially increase  
5 susceptibility to respiratory infections.”<sup>1</sup> Emissions of nitrogen oxides also contribute to the  
6 formation of tropospheric ozone. Ozone can reduce lung function, harm lung tissue, and trigger a  
7 variety of respiratory health problems in humans, and can damage “sensitive vegetation and  
8 ecosystems, including forests, parks, wildlife refuges and wilderness areas.”<sup>2</sup> Exposure to  
9 particulate matter can affect both the lungs and heart and cause premature death in people with  
10 heart or lung disease, nonfatal heart attacks, aggravated asthma, decreased lung function, and  
11 increased respiratory symptoms, such as irritation of the airways, coughing or difficulty  
12 breathing.<sup>3</sup> Members of the Center suffer severely from this pollution.

13         12. Because EPA’s Withdrawal Decision will result in less stringent fuel efficiency and  
14 greenhouse gas standards for the nation’s fleet of passenger vehicles and light trucks, emissions of  
15 particulate matter, nitrous oxides, ozone and greenhouse gases will increase, and the pollution will  
16 directly affect the health and well-being of our members. Conversely, if the Withdrawal Rule is  
17 reversed, additional dangerous pollution will be prevented, improving air quality, increasing our  
18 members’ health and well-being, and providing redress of harm they will otherwise suffer.

19         13. The Center’s members rely on the organization to support efforts to decrease air  
20 pollution harmful to their health and well-being, increase the fuel efficiency from the nation’s  
21 vehicle fleet and enforce the Vehicle Rule, other provisions of the Clean Air Act, and other laws.

22         14. The Center’s members also rely on the organization to protect their procedural and  
23 informational rights. As shown above, the Center, on behalf of its members, frequently comments  
24 on agency rulemakings, including many of the regulations affecting motor vehicles, and the Center  
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26 <sup>1</sup> EPA, Basic Information about NO<sub>2</sub>, available at <https://www.epa.gov/no2-pollution/basic-information-about-no2#Effects>.

27 <sup>2</sup> EPA, Ozone Basics, available at <https://www.epa.gov/ozone-pollution/ozone-basics#effects>.

28 <sup>3</sup> EPA, Health and Environmental Effects of Particulate Matter (PM), available at <https://www.epa.gov/pm-pollution/health-and-environmental-effects-particulate-matter-pm>.

1 analyzes and disseminates the information it obtains, advocates on behalf of more stringent and  
2 effective standards, and seeks to enforce applicable laws and regulations to protect its members'  
3 health and well-being from the negative effects of vehicle pollution. The Mid-Term Regulations  
4 required EPA, before making a finding whether the Vehicle Rule should be changed, to conduct a  
5 thorough technical analysis, based on peer-reviewed studies, and to make that analysis available  
6 for public comment. EPA's Withdrawal Rule, however, is not accompanied by any technical  
7 record, and does not address the extensive record, analysis, and technical and scientific findings of  
8 the 2017 Final Determination. It provides no analysis about why that Final Determination record  
9 purportedly no longer pertains. It does not include information about the specific facts that made  
10 EPA decide to roll back the Vehicle Rule, nor follow the procedures and informational  
11 requirements of the Mid-Term Regulations governing the Vehicle Rule's midterm evaluation. It  
12 talks vaguely about the burden the Vehicle Rule supposedly places on the auto industry, but says  
13 next to nothing about the amount of extra pollution that will result from rolling it back, the  
14 consequences to the health and well-being of the Center's members, or the additional burdens  
15 placed on communities living near freeways and refineries that are already suffering  
16 disproportionately from the degradation of the air we must breathe. The Withdrawal Rule's failure  
17 to follow the Mid-Term Regulations governing the Vehicle Rule's midterm evaluation and its lack  
18 of basic information concerning EPA's decision deprives the Center and its members of their  
19 informational and procedural rights, the opportunity to analyze and disseminate precise  
20 information about the Withdrawal Decision's effects, and to seek to change the outcome. These  
21 deficiencies directly injure the Center's and its members' procedural and informational rights.

22           15. Conversely, a reversal of the Withdrawal Decision would require EPA to engage  
23 with the 2017 Final Determination's voluminous technical and scientific record and provide the  
24 specific facts, information, technical assessment and detailed analysis necessary for any decision  
25 to reverse it. It would allow the Center, on behalf of its members, and those members themselves  
26 to analyze and disseminate this information and to advocate for a different outcome, redressing the  
27 violations of the procedural and informational rights of the Center and its members.  
28

1 I declare under penalty of perjury under the laws of the United States of America that the  
2 foregoing is true and correct. Executed on August 21, 2018, at Joshua Tree, California.

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5 Kassia R. Siegel  
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II.

Declarations of Conservation Law Foundation

II.

Declarations of Conservation Law Foundation

1. Heather Greenwood, Conservation Law Foundation staff and member

**DECLARATION OF HEATHER L. GREENWOOD  
FOR CONSERVATION LAW FOUNDATION**

I, Heather L. Greenwood, hereby declare and state:

1. This declaration is based on my personal knowledge, information, and belief. I am over the age of eighteen years and suffer from no legal incapacity.

2. I live at 38 Autumn Street, Cranston, RI 02910. I have lived in Rhode Island since August, 2016.

3. Since August, 2017, I have worked for Conservation Law Foundation (CLF) as Office Manager in the Providence, Rhode Island office.

4. I have been an environmentalist for as long as I can remember. From my fifth-grade class authoring a book about endangered species to working as a naturalist in Vermont State Parks to getting my master's degree in resource management and conservation; my passion has always been to preserve and protect the natural environment. CLF is an environmental law organization who fights climate change, big oil, and pushes for policy that will protect the environment I care so deeply about. This overlapping interest is what attracted me to the position with CLF. CLF has given me an opportunity to be able to voice environmental issues that I care about, such as clean air, clean water, and species protection, while being surrounded by people who are very knowledgeable about and care about these same issues.

5. As an employee and member of CLF, I rely on CLF to advocate on behalf of me and the health of my community and region.

6. At one and a half years old, I was diagnosed with asthma. I spent most of my early childhood and elementary years in and out of hospitals and doctor offices. Asthma

limited my ability to engage in normal childhood activities such as playing tag, participating in gym class, and sleepovers with friends, and caused me to have frequent absences throughout my young education. Although my last asthma-related hospitalization was when I was in elementary school, I have been on daily medication for asthma my entire life. My asthma is exercise-induced, environmentally-induced (allergens, perfumes, air quality) and stress-induced.

7. As an adult, my asthma is managed through daily use of a steroid inhaler, nasal sprays, and oral medications. In case of emergencies, I always carry a “rescue inhaler,” meant to quickly stop asthma attacks. Because allergies can play a big role in my asthma management, I have been getting allergy shots for most of the last ten years. I have severe allergies to several types of grasses, several types of trees, dust, dogs, cats, and many other environmental allergens, which tend to be exacerbated by air pollution. At this point in my adult life, my asthma is generally well-managed by medication, with a few exceptions.

8. On days when I look out my window and see a haze on the horizon, I know that it is going to be a tough day for breathing. In the summer, with the heat and humidity, it can be much worse. For instance, I used to live in Pittsburgh, Pennsylvania and had to walk one block to the T-station to get to work. The street I walked on was in downtown Pittsburgh and close to heavy traffic. Those days when it was hot, humid, and hazy meant that I would struggle to walk this block without using my rescue inhaler.

9. I try not to let my asthma control my life. Unfortunately, this is unrealistic and managing these challenges is just part of my daily routine. For example, I generally take a walk around Providence on my lunch break. Those days when the horizon is hazy, the temperatures are soaring, and the humidity is so high the air feels thick, I have to stay inside

because it is not safe for me to spend extended amounts of time outside in this triple threat on my asthma. At home, on these same days, I have to close windows and use air conditioning to ensure that the air quality within the house is safe for me (unlike the air quality outside).

10. Having asthma adds an extra layer of concern and decision-making to my daily activities, even when it does not preclude me from doing something. I need to ask myself, is it dangerous for me to be outside? Should I not be out here?

11. I am a runner. I keep a schedule for my runs, including which days and distances I need to tackle. When there is flexibility in my schedule, I try to avoid running on days that I can tell are going to be tough days for breathing (like those triple threat days in paragraph 9 above). During the week, my runs are shorter, so I try to push through any potential discomfort or risk. If I do wind up running on a low air quality day, I get up really early to try to finish my run before it gets too hot and make sure to use my rescue inhaler before I even start the run to try to prevent an asthma attack. On these days, I have to acknowledge that I am going to try, but may not be able, to complete all or even a small portion of my run. While running, I have to work a little extra to be able to breathe well, and I have to take it one minute at a time. It is kind of like going out for a run on a sprained ankle – you take a preventative Advil so that it does not swell up, and then see how it feels after the first half mile. With asthma, I use my rescue inhaler as a preventative measure before I begin my run and then constantly check in and ask myself, “am I hurting myself more than I am helping myself?” It is always a little bit of a gamble.

12. Car emissions can exacerbate my asthma, both as a result of additional smells in the environment and poor air quality. When I am driving behind a vehicle with visible emissions from their tailpipe(s) or a strong “my exhaust is kind of broken” sort of smell, I

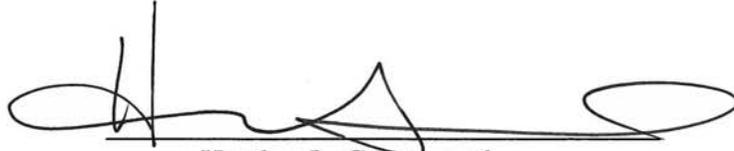
instantly close the windows and switch the air control within the car so it is not cycling air from the outside. When I fail to take these actions, I feel my lungs tighten, and have a difficult time breathing. Sometimes I may begin to wheeze.

13. I am concerned about the health risks I face from breathing more air pollution caused by emissions from cars and trucks. I have experienced air pollution exacerbating my asthma. I worry that increased emissions from cars and trucks will mean an increase in low air quality days on which I need to change my regular day-to-day activities by rescheduling a run for another day, closing windows and using air conditioning, or even staying inside at lunch time and after work. I understand that greenhouse gas emissions from vehicles contribute to climate change. Climate change has been linked to a variety of factors that negatively influence my asthma and impair my health – like increased temperatures, longer pollen seasons, and worsening air pollution. These factors scare me and have me concerned about my quality of life as greenhouse gas emissions increase.

14. Because of these risks to my health, efforts by the federal government to reduce the stringency of fuel efficiency regulations and vehicle emissions standards concern and harm me.

15. I am unable to control my exposure to at least some amount of airborne allergens in order to live a healthy life, engaging in normal recreational, personal and professional activities. Increased air pollution from vehicles raises the likelihood that my asthma will negatively impact me on more days, resulting in health impacts (and costs), significant physical discomfort, and a reduction in my ability to participate in regular physical and recreational activities.

SIGNED UNDER THE PENALTIES OF PERJURY THIS 28<sup>th</sup> DAY OF AUGUST, 2018.

A handwritten signature in black ink, consisting of a series of loops and a vertical line, positioned above a horizontal line.

Heather L. Greenwood

II.

Declarations of Conservation Law Foundation

2. Daniel Hildreth, Conservation Law Foundation member and member of Maine State Board of Directors

**DECLARATION OF DANIEL W. HILDRETH  
FOR CONSERVATION LAW FOUNDATION**

I, Daniel W. Hildreth, hereby declare and state:

1. This declaration is based on my personal knowledge, information, and belief. I am over the age of eighteen years and suffer from no legal incapacity.

2. I live at 55 Thornhurst Rd, Falmouth, Maine 04105. I have been living at this address since approximately 1995. I rented the property initially and purchased it in 2003.

3. I first started contributing to Conservation Law Foundation (CLF) in 1994. I joined the Maine State Board of CLF in January, 2018. I continue to support CLF because of their promotion of policies to implement a transition to a clean energy economy and away from reliance on fossil fuels. This is important to me because I believe that climate change poses a catastrophic threat to our economy and to our society.

4. The property where I live is on a cove in Casco Bay. I own approximately 460 feet of coastal waterfront land. At high tide, the high-water mark comes, in my approximation, to about 50 feet from the nearest corner of my house, and reaches an area of steep banking. The banking is about 25 to 30 feet high, and is composed of ledge at the base, but most of the rest of the banking is made of clay, and is vegetated, except where the erosion is worst. At low tide, there are roughly 300 yards of mudflat between the seawater and the base of the banking. My house sits above, on clay soil atop ledge, about 50 feet from the edge of the banking.

5. In storms, the water comes higher up the banking than it does at other times. In some storms, the higher water levels have caused erosion at the base. The water has begun to undercut the banking, and there are a few places where the edge is sagging as a result.

6. I am aware that climate change is causing both sea level rise and an increase in the intensity of storms, and it is very present in my mind that my house is under threat from these

impacts of climate change. Because of climate change, I expect that it will become impossible to live there at some point in the future.

7. My understanding is that climate change is driving sea level rise because of the melting of glaciers and ice caps. The warming atmosphere is also driving sea level rise because as ocean water temperatures warm, the ocean expands. The rate of glacial melt seems to be increasing. It is my understanding that the problems associated with climate change will only continue to build. I have looked at maps of certain areas of coastal Maine depicting projections of sea level rise and I know that it will have an increasing impact on my community and my home. This in turn will raise storm surge levels, and could exacerbate the erosion of the banking that is on my property. Based on my own observations since 1995 when I moved to my property, the storm surges appear to be higher than they used to be. Additionally, the best means I have of judging the tide levels is a rock in the middle of the cove. The top is always above water at high tide, but in my perception, the highest tides are covering more of it than they used to.

8. I also understand that climate change has been linked to increases in storm intensity. I have read that there are two dynamics at play – the atmosphere is warmer, and there is more moisture in it. Climate change results in systemic impacts on the formation of storms and makes them more intense. As a coastal homeowner, this is particularly concerning for both economic and safety reasons. My personal experiences with storms on my property over the last 20+ years gives me the impression that the storms have increased in intensity.

9. There is a tree on the ocean-side of the house that I am concerned about during storms. Our house has previously experienced storms with sustained winds of 60 mph. I have been cutting the tree back dramatically because I am worried that increasing wind gusts due to

more extreme storms could cause the tree to snap mid-trunk. The tree could cause damage to my house if it were to break in a storm.

10. I understand that the Environmental Protection Agency's vehicle emissions standards and the Department of Transportation's fuel efficiency rules are critical to reducing carbon emissions from the transportation sector and to addressing climate change.

11. My enjoyment of and investment in my home is dependent upon stable sea levels and weather. Any efforts by the federal government to lessen the stringency of rules controlling greenhouse gas emissions from vehicles increase the risk of sea level rise and storm intensity, which adversely impact my economic and social well-being.

SIGNED UNDER THE PENALTIES OF PERJURY THIS 28th DAY OF AUGUST, 2018.

/s/ Daniel W. Hildreth

Daniel W. Hildreth

II.

Declarations of Conservation Law Foundation

3. Sean Mahoney, Executive Vice President & Director of the Maine Advocacy Center, Conservation Law Foundation

**DECLARATION OF SEAN MAHONEY  
FOR CONSERVATION LAW FOUNDATION**

I, Sean Mahoney, hereby declare and state:

1. This declaration is based on my personal knowledge, information, and belief. I am over the age of eighteen years and suffer from no legal incapacity.
2. I am the Executive Vice President of Conservation Law Foundation (CLF), a membership-supported nonprofit corporation organized and existing under the laws of the Commonwealth of Massachusetts. I have held this position since 2013. I also continue to serve as the Director of CLF's Maine Advocacy Center, a position I have held since 2007.
3. In my capacity as Executive Vice President, I am familiar with CLF's mission: to protect New England's environment for the benefit of all people. CLF uses the law, science and the market to create solutions that preserve our natural resources, build healthy communities, and sustain a vibrant economy.
4. Given my role as Executive Vice President, I also understand the nature and scope of CLF's organizational structure. Founded in 1966, CLF has its principal office at 62 Summer Street, Boston, MA. CLF also has offices in Maine, New Hampshire, Rhode Island and Vermont, and its members reside throughout New England and other states. CLF has more than 5,000 members.
5. CLF works on behalf of its members toward comprehensive long-term solutions to environmental challenges. Our members rely upon CLF to advocate for and safeguard the health, quality of life, and economic prosperity of our communities for generations to come, with a priority of meeting the challenge of climate change. CLF engages in federal and state

regulatory and legislative advocacy as well as policy development and litigation to work toward a healthy climate and resilient communities across New England.

6. One of CLF's areas of focus is reducing emissions from the transportation sector. CLF recognizes that in order for the New England states to achieve their greenhouse gas emissions reductions targets and limit the impacts of climate change, emissions from mobile units must be addressed at both the state and federal level. Across the country, the transportation sector is the greatest source of greenhouse gas emissions. In New England, the transportation sector contributes an even higher percentage of overall greenhouse gas emissions due to the relatively cleaner mix of electric generation units in the region.

7. CLF's federal work aimed at reducing emissions from the transportation sector includes, for instance: writing to former Environmental Protection Agency (EPA) Administrator Scott Pruitt opposing the roll back of environmental safeguards under the Clean Air Act that reduce pollution from motor vehicles and engines; commenting to urge the Department of Transportation's (DOT) National Highway Traffic Safety Administration (NHTSA) to conduct a comprehensive analysis of environmental consequences of revisions to fuel standards; and writing to DOT to oppose weakening of rules regarding fuel efficiency and fuel consumption.

8. At the state level, CLF's advocacy aimed at reducing emissions from the transportation sector includes, for instance: promoting zero emission vehicle legislative policies, including by submitting oral and written comments; serving on the Massachusetts Zero Emission Vehicle Commission to recommend policies increasing access to electric vehicle infrastructure; intervening in utility rate cases and other utility proceedings before state public utilities commissions to advocate for investments and rate structures promoting beneficial electrification of the transportation sector; developing regional transportation policy white papers; and submitting comments on state transportation plans. CLF regularly submits

comments on rulemakings and challenges regulations by petition for reconsideration to the agency or by seeking judicial review in court.

9. Based on my work with CLF, I understand that in 2012, EPA, in a joint rulemaking with NHTSA, promulgated emissions and fuel efficiency standards for model years 2017-2025, with annual increases in stringency. These standards represented a significant effort by the federal government to reduce emissions from light-duty vehicles, which are a primary source of emissions from the transportation sector. The rule also required EPA to engage in a mid-term evaluation to determine whether the standards remain appropriate part way through the term (by April 1, 2018).

10. I am aware that EPA conducted the mid-term evaluation required by rule and issued a Final Determination on the Appropriateness of the Model Year 2022-2025 Light-Duty Vehicle Greenhouse Gas Emissions Standards under the Midterm Evaluation in January 2017 (“Final Determination”). I understand that, based on a voluminous record, EPA concluded in the Final Determination that the standards in place for model years 2022-2025 were appropriate, and that it was practical and feasible for automakers to meet those standards. I understand that EPA projected that over vehicle lifetimes, the model year 2022-2025 standards would reduce greenhouse gas emissions by 540 million metric tons, and that the benefits of the standards, including significant health benefits, would far outweigh the costs of compliance.

11. I am also aware that EPA subsequently reconsidered the Final Determination in a decision published on April 13, 2018 (“Revised Determination”). The Revised Determination withdrew the Final Determination and deemed the model year 2022-2025 standards inappropriate, based upon what EPA termed “additional data” that was not specified nor made available to the public. I understand that under the 2012 rule, EPA’s Revised Determination that

the standards were inappropriate created an obligation that EPA “shall” undertake a rulemaking to revise the standards.

12. Based on my work at CLF, I understand that the challenged Revised Determination will degrade air quality in the areas lived in, worked in, and otherwise used by CLF’s members. CLF has many members who live in Boston, Providence, Worcester and other heavily trafficked areas in New England. CLF’s members have no choice but to breath the air that is available to them; they are unable to completely control their exposure to airborne allergens and pollutants. Weakened fuel efficiency and vehicle emissions standards will lead to increased pollutants in the air that CLF’s members breath, particularly those that live or work near heavily traveled highways and in condensed, high-population areas that are disproportionately harmed by air pollution. CLF’s members who already suffer from respiratory ailments exacerbated by low air quality will suffer the most severe health consequences.

13. I am also aware that the challenged Revised Determination will result in increased greenhouse gas emissions that contribute to climate change. Climate change has been linked to increases in allergens that severely impact our members already suffering from respiratory ailments. Further, CLF has many members, being a New England based organization, who live along the coast. Climate change is linked to both rising sea levels as well as increases in storm intensity. Our members’ enjoyment of and investment in their homes and coastal property is threatened by the amplified storm surges that are a result of climate change. Climate change directly threatens the value of our members’ coastal property and homes. Climate change also results in harm to the areas, resources, and wildlife enjoyed and visited by Plaintiffs’ members, ultimately reducing their likelihood of enjoying these in the future.

14. CLF's members rely on CLF to advocate at the federal level for increased fuel efficiency and vehicle emissions standards, and to ensure EPA's compliance with the Clean Air Act, thereby reducing emissions of harmful greenhouse gasses and other pollutants.

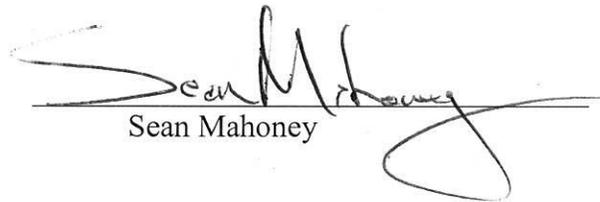
15. CLF's members also rely on the organization to protect their procedural and informational rights. As shown above, CLF frequently comments on agency rulemakings on behalf of its members, and also regularly litigates challenges to agency rules. To engage in these efforts, CLF reviews administrative records upon which agency rulemakings are premised as well as agencies' analyses and explanations for their results. CLF scrutinizes the agency's underlying documentation and rationales to fully understand agency rulemakings and other decisions, which informs and enables CLF's advocacy. CLF uses this information to advocate on behalf of more stringent and effective standards, and to enforce applicable laws and regulations to protect our members' health and well-being. Further, CLF disseminates information that we obtain to educate our members and to spread awareness. To fulfill our members' expectations and to ensure that agencies are engaging in appropriate, lawful regulation, thereby satisfying our mission, CLF must have access to information and analysis underlying agency decision making.

16. I understand that the Revised Determination is only 11 pages long and cites to unspecified data as the basis for its conclusions. I am also aware that the regulations pertaining to the mid-term evaluation create a heightened obligation for the agency to make publicly available a detailed analysis setting forth the basis for its determination. The rules create a legal right to information and CLF has a concrete interest, distinct from that of the general public, in obtaining the data, documentation, and analysis relied upon in the Revised Determination.

17. The agencies' failure to provide the information required by rule impairs CLF's ability to fully engage and hinders our ability to effectively advocate on behalf of our members.

The agencies' failure to provide the requisite information also hamper's our ability to communicate with and educate our members and to fulfill our role to provide them with critical information about their government's decision-making processes. Further, the deprivation of this information frustrates CLF's ability to effectively develop and implement our state level advocacy.

SIGNED UNDER THE PENALTIES OF PERJURY THIS 28th DAY OF AUGUST, 2018.



Sean Mahoney

III.

Declarations of Environmental Defense Fund

III.

Declarations of Environmental Defense Fund

1. James Ausman, Environmental Defense Fund member

## DECLARATION OF JAMES AUSMAN

I, James Ausman, declare as follows:

1. I am currently a member of Environmental Defense Fund (EDF). I reside in San Francisco, California with my wife and two daughters, who are 9 and 12 years old. I have resided in California for more than 46 years and have worked as a system architect at Yahoo! and a program manager at Google. I received my bachelor's degree in Biophysics from the University of California, Berkeley and my area of expertise is in engineering project management.

2. I understand that California has long experienced extraordinary air pollution challenges. Growing up as a child with asthma in Riverside, California I frequently experienced acute asthma symptoms such as shortness of breath and tightening in my chest. As an adult living with asthma I chose to move to San Francisco with my family in 1993 because of its superior air quality.

3. I am familiar with, and deeply concerned about, the impacts of climate change due to greenhouse gas emissions. I am aware of the latest scientific evidence, which concludes that warming of the climate is unequivocal, that it is extremely likely that human influences have been the dominant cause of this warming since the mid-20th century, and that continued emissions of greenhouse gases will cause further warming.

4. This evidence demonstrates that climate change is posing a significant threat to the wellbeing of humans, wildlife, and the natural environment. For instance, I am aware of scientific evidence suggesting that certain types of extreme weather events—including heat waves, heavy downpours, and, in some areas, floods and droughts—have become more frequent and/or intense. Studies also confirm that warming is causing sea levels to rise, oceans to become more acidic, and snowpack to decline.

5. I see many of these impacts occurring in California, where my family and I live and recreate. For instance, Californians are experiencing drought and increased incidence of wildfires, reduced snowfall in the mountains, and an increase in both the occurrence and severity of extreme weather events like droughts and heat waves.

6. The evidence also shows that these and other changes threaten human health. For example, among other things, climate change leading to increased risk of drought can contribute to water supply shortages and exacerbate wildfires. Wildfires can cause personal injury, damage infrastructure, and contribute to worsening air pollution problems. I am aware that the 2017 California wildfire season was the most destructive in the state's history<sup>1</sup> with 9,133 fires burning 1,248,606 acres across the

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<sup>1</sup> Dale Kasler, Wine country wildfire costs now top \$9 billion, costliest in California history, The Sacramento Bee, (Dec. 6, 2017), <https://www.sacbee.com/news/state/california/fires/article188377854.html>

state.<sup>2</sup> Climate change also leads to increased ground-level ozone formation, and exposure to ozone can lead to and exacerbate a variety of respiratory and cardiovascular problems, including asthma.

7. Those who suffer from respiratory illness are disproportionately impacted by poor air quality exacerbated by climate change. I have suffered from asthma since childhood. Over the years I have experienced acute asthma symptoms including shortness of breath requiring me to visit the Emergency Room and reduce outdoor physical activity, wheezing, many cases of bronchitis and pneumonia, and shortened vacations.

8. I have used several medications and inhalers throughout the years to treat my asthma. I currently treat my asthma with a steroidal inhaler and allergy medication administered in a series of shots. I have a rescue inhaler containing albuterol and Prednisone for emergencies.

9. These treatments are expensive and time consuming. Insurance does not cover the full cost of my asthma treatments and multiple treatments have cost me thousands of dollars. I also spend hours traveling to and from the doctor's office in addition to time spent meeting with physicians and receiving treatment.

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<sup>2</sup> California Department of Forestry and Fire Protection, 2017 Incident Information, [http://cdfdata.fire.ca.gov/incidents/incidents\\_stats?year=2017](http://cdfdata.fire.ca.gov/incidents/incidents_stats?year=2017) (last modified Jan. 24, 2018).

10. My family and I enjoy spending time and frequently engage in camping, hiking, bicycling and fishing.

11. Following exposure to degraded air quality—including smoke from climate change-exacerbated wildfires, and high ozone levels—I have experienced acute asthma symptoms including shortness of breath and tightness in my chest. Because exposure to air pollution can exacerbate my asthma symptoms, I am forced to limit my time engaging in outdoor activities when air quality is poor. For example, when ozone levels are high I refrain from riding my bike and limit the time I spend outside. Additionally, the acute asthma symptoms I experience during exposure to air pollution have caused me to cut short family vacations and to miss work.

12. In August of 2017, during a family trip to Mexico City following time spent outdoors, I began to have trouble breathing and started to feel disoriented. Over time my symptoms worsened even as I remained indoors. I began to experience shortness of breath, and was unable to lay down due to difficulty breathing when prone. I continued to experience these symptoms until a doctor could travel to and treat me by administering a steroidal (dexamethasone) shot.

13. More recently, I experienced acute asthma symptoms as a result of exposure to wildfire smoke while on vacation with my family in Yosemite National Park in early August of this year. The Ferguson Fire that started in Sierra National Forest located south of Yosemite had been burning in a northwest direction during

the weeks leading up to our vacation.<sup>3</sup> Within a day of arriving at the Evergreen Lodge located near Hetch Hetchy Valley in the northwestern portion of the Park, I began to experience shortness of breath and to feel lethargic. During my second night at the Park, I could not sleep and had trouble breathing. My wife and I feared that I would again have to receive medical treatment to alleviate my symptoms and so we returned home, ending our vacation two days early. Shortly after we left, Yosemite Valley residents were evacuated, and the National Park Service closed the park to the public.<sup>4</sup>

14. California wildfire smoke has caused me to experience acute asthma symptoms in the past. In the fall of 2017, as several wildfires burned in Sonoma and Santa Rosa California,<sup>5</sup> smoke blew into San Francisco<sup>6</sup> and I started to experience wheezing and shortness of breath on exertion. During this time, the EPA designated

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<sup>3</sup> The National Wildfire Coordinating Group, Incident Information System, Ferguson Fire, <https://inciweb.nwcg.gov/incident/5927/> (“The Ferguson Fire started on Friday night, July 13 at 9:36 PM in the South Fork Merced River drainage on Sierra National Forest...”)

<sup>4</sup> The National Wildfire Coordinating Group, Incident Information System, Ferguson Fire, <https://inciweb.nwcg.gov/incident/5927/> (“On August 3 the residents of Yosemite Valley were evacuated and the Park Service closed it to the public due to multiple hazards from firefighters working in the area.”).

<sup>5</sup> Peter Fimrite, Jill Tucker, Kurtis Alexander and Demian Bulwa, Wine Country wildfires leave a trail of death, devastation across the North Bay, San Francisco Chronicle (Oct. 10, 2017), <https://www.sfchronicle.com/news/article/2-big-wildfires-prompt-evacuations-in-Napa-County-12262945.php&cmpid=twitter-premium>

<sup>6</sup> Brock Keeling, Smoke and ash covering San Francisco: How bad is it and how long will it last?, Curbed San Francisco, (updated Oct. 10, 2017), <https://sf.curbed.com/2017/10/9/16447874/smoke-ash-fire-air-quality-napa>

San Francisco's air quality as "very unhealthy"<sup>7</sup> indicating that everyone, not just those with sensitivities, may experience negative health impacts.<sup>8</sup> I again started to experience asthma symptoms. In an attempt to limit my exposure, I bought face masks from a hardware store to wear until the smoke subsided and air quality improved. The symptoms I experienced as a result of this exposure caused me to miss about two days of work.

15. I understand that the transportation sector is the leading cause of carbon dioxide (CO<sub>2</sub>) emissions in the United States. Significantly, the majority of greenhouse gas emissions from the transportation sector are from passenger cars and light-duty trucks.<sup>9</sup>

16. I am aware that in announcing its *Mid-Term Evaluation of Greenhouse Gas Emissions Standards for Model Year 2022–2025 Light-Duty Vehicles*, 83 Fed. Reg. 16077 (Apr. 13, 2018) (Revised Final Determination), EPA reversed its previous position that the model year 2022-2025 greenhouse gas emission standards

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<sup>7</sup> Brock Keeling, Smoke and ash covering San Francisco: How bad is it and how long will it last?, Curbed San Francisco, (updated Oct. 10, 2017), <https://sf.curbed.com/2017/10/9/16447874/smoke-ash-fire-air-quality-napa>

<sup>8</sup> Environmental Protection Agency, AirNow, Current Air Quality Index, <https://airnow.gov/index.cfm?action=airnow.main>

<sup>9</sup> EPA, *Sources of Greenhouse Gas Emissions-Transportation*, <https://www.epa.gov/ghgemissions/sources-greenhouse-gas-emissions#transportation> (last updated April 11, 2018).

for light-duty vehicles were appropriate<sup>10</sup> and committed to “roll back” or weaken the existing standards.<sup>11</sup>

17. The greenhouse gas emission standards established for light-duty vehicles mark the single most significant federal regulatory effort to reduce climate harming pollutants in the United States. Maintaining the existing standards is necessary to mitigate the effects of climate change.

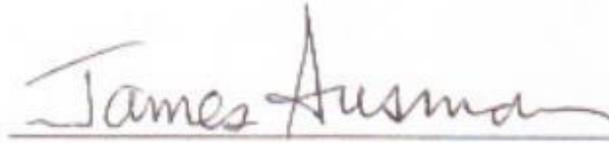
18. I am deeply concerned that EPA’s weakening of these standards will increase climate-harming and ozone-forming pollution, intensifying and extending California’s wildfire season and likewise worsening ground-level ozone pollution. These pollutants present an imminent and concrete injury to my health and well-being and that of my family. More intense wildfires likewise threaten the survival, health, and natural beauty of the ecosystems where I live and recreate.

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<sup>10</sup> See e.g., Mid-Term Evaluation of Greenhouse Gas Emissions Standards for Model Year 2022–2025 Light-Duty Vehicles, 83 Fed. Reg. 16077 (Apr. 13, 2018).

<sup>11</sup> Scott Pruitt (@EPAScottPruitt), Twitter (Apr. 3, 2018), *available at* <https://twitter.com/EPAScottPruitt/status/981239876971565056> (“Today, we announced @EPA plans to roll back Obama Admin fuel standards. These standards were inappropriate & needed to be revised. The focus should be on providing consumer choice and the strongest environmental protections.”).

I declare under penalty of perjury that the foregoing is true and correct.

A handwritten signature in black ink that reads "James Ausman". The signature is written in a cursive style and is positioned above a solid horizontal line.

James Ausman

Executed on August 27, 2018

III.

Declarations of Environmental Defense Fund

2. Arthur Cooley, Environmental Defense Fund member

## DECLARATION OF ARTHUR P. COOLEY

I, Arthur P. Cooley, declare as follows:

1. I am a member of Environmental Defense Fund (“EDF”) and have been a board member since I and several other scientists founded EDF on Long Island, New York, in 1967. I reside in La Jolla, California, having moved here from New York in 2003. I respectfully submit this declaration in support of EDF’s petition for review of EPA’s Revised Final Determination regarding the appropriateness of the model year (MY) 2022-2025 greenhouse gas emission standards for light-duty vehicles.

2. I have a graduate degree in biology from Cornell University, and am a retired high school biology teacher. I am also a former adjunct Associate Professor in the Marine Sciences Research Center at Stony Brook University in Stony Brook, New York, a part of the New York State University System. In that role, I taught marine biology to secondary school teachers for seven summers. I served for 20 years as a Naturalist and Expedition Leader for Lindblad Expeditions, an organization that offers small-ship expedition cruises that give passengers the opportunity to encounter some of the world’s most pristine places with the experts who know them best. As a naturalist and expedition leader, I have taught guests about the natural world and have coordinated our guests’ outdoor activities.

Through this process I have traveled to all seven continents and learned a great deal about the birds, whales, geology, and other natural phenomena in these areas.

3. I am familiar with and concerned about emissions of greenhouse gases, which are causing climate change. I am aware of the latest scientific evidence, which concludes that warming of the climate is unequivocal, that it is extremely likely that human influences have been the dominant cause of this warming since the mid-20th century; and that continued emissions of greenhouse gases will cause additional warming.

4. I understand that climate change poses a significant threat to human health and the environment. I am aware of science suggesting that certain types of extreme weather events—including heat waves, heavy downpours, and, in some areas, floods and droughts—have become more frequent or more intense due to climate change. Data also shows that warming is causing sea levels to rise; oceans to become more acidic; and snowpack to decline.

5. These changes threaten human health. For example, among other things, climate change can contribute to deteriorating air quality by exacerbating ozone pollution and increasing the risk of wildfires. And rising sea levels can threaten public safety through increased risk of coastal flooding and storm surge.

6. I understand that immediate action to reduce greenhouse gas emissions is necessary to mitigate the impacts of climate change. Incremental actions

addressing significant emissions sources can lessen harms associated with a changing climate and can reduce the risk that the climate system reaches certain “tipping points”—reflecting abrupt or irreversible changes in climatic conditions. Meaningful actions in the United States can also help to encourage other countries to take similar action.

7. I live in La Jolla, a neighborhood in San Diego, California, one block from the ocean. The ability to live so close to the ocean and the beach was a significant reason why my wife and I chose this residence and it features prominently as a factor in the economic value of our property. I routinely visit the ocean where I walk along the beach, and intend to continue to do so. I also visit, examine, and immensely enjoy the biology and ecology of the ocean shore. I have a significant recreational, aesthetic, and personal connection to this particular area of the ocean and beach that I regularly visit, and intend to continue to do so. I will not be able to continue to enjoy our property and my current recreational routine if the sea level continues to rise and the current beach changes or disappears. Indeed, there is documented sea level rise in San Diego Harbor and other low-lying beaches close to my house, and the beach on which I take frequent walks is now completely inundated in high surf and high tide conditions. If greenhouse gas emissions continue unabated and the sea level continues to rise, the sandy beach will disappear, and I will be unable to enjoy this activity.

8. As a biologist who studies nature, I spend extensive time outside, along the coast and the beach, to carry out my work. As a naturalist for Lindblad Expeditions, my duties included teaching guests about many different types of wildlife including, birds, whales, and dolphins, and also educating guests about the geology of the areas we visited. As an Expedition Leader, I coordinated all the activities of the guests, which included landings, zodiac cruises, lectures, arrivals, and departures, much of which involves enjoyment, observation, or use of natural areas. I also spend additional time outside because of my deep appreciation for and interest in nature. I am very concerned about the adverse impact of global warming on the wildlife, resources, and ecosystems that I study and routinely visit. If global warming causes adverse impacts to these natural systems, as is occurring now and will likely continue to occur, I expect to be personally harmed by being unable to observe these systems free of such impacts.

9. Global warming is adversely impacting the natural systems that I value, including the oceans. For example, ocean acidification threatens to upset the ocean's delicate balance of marine life by harming those organisms that rely upon calcium carbonate to build their shells. This will negatively impact both far-away coral reefs as well as sensitive organisms in the tidal pools that I regularly visit with my children and with friends. These impacts will worsen unless greenhouse gas emissions are reduced.

10. I am aware that the greenhouse gas emission and fuel economy requirements established for light-duty vehicles mark the single most significant federal regulatory effort to reduce climate harming pollutants in the United States. I am further aware that in its *Mid-Term Evaluation of Greenhouse Gas Emissions Standards for Model Year 2022–2025 Light-Duty Vehicles*, 83 Fed. Reg. 16077 (Apr. 13, 2018) (Revised Final Determination), EPA reversed a previous determination that the MY 2022-2025 greenhouse gas emission standards were appropriate.<sup>1</sup> In issuing the Revised Final Determination, former Administrator Pruitt set off a weakening of existing regulations, announcing that the decision was a “roll back” of the Obama-era standards.<sup>2</sup>

11. I understand that the transportation sector is the leading source of CO<sub>2</sub> emissions in the United States. I am therefore concerned that in weakening the greenhouse gas emission standards for light-duty vehicles, EPA is shirking its responsibility to regulate CO<sub>2</sub> and other climate harming pollutants. This in turn will increase the negative impacts of global warming that are already affecting the

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<sup>1</sup> *Mid-Term Evaluation of Greenhouse Gas Emissions Standards for Model Year 2022-2025 Light-Duty Vehicles*, 83 Fed. Reg. 16,077 (Apr. 13, 2018).

<sup>2</sup> Scott Pruitt (@EPAScottPruitt), Twitter (Apr. 3, 2018), *available at* <https://www.epa.gov/newsroom/former-administrator-scott-pruitt-social-media-files> (“Today, we announced @EPA plans to roll back Obama Admin fuel standards. These standards were inappropriate & needed to be revised. The focus should be on providing consumer choice and the strongest environmental protections.”).

natural resources and biological diversity that I treasure and impeding my ability to enjoy the ocean shore near my home.

I declare under penalty of perjury that the foregoing is true and correct.



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Arthur P. Cooley

Executed on August 25, 2018

III.

Declarations of Environmental Defense Fund

3. Denise Fort, Environmental Defense Fund member

## DECLARATION OF DENISE FORT

I, Denise Fort, declare as follows:

1. I am currently a member of Environmental Defense Fund (EDF), and I have been a supporter for many years, beginning with a position as an intern while still in law school. I reside in Santa Fe County, New Mexico. I have resided in New Mexico for more than 25 years and am a tenured faculty member at the University of New Mexico School of Law, with the title of Research Professor and Emerita Professor of Law. My area of expertise is environmental and natural resources law.

2. As a law school professor specializing in the environmental field, I closely follow regulatory developments concerning the Clean Air Act, climate change, and greenhouse gas emissions, including through communications that I receive as an EDF member. With this expertise, I have taught classes on environmental law, climate change, and natural resources law.

3. Because of my concerns about air pollution and climate change, I am also engaged in advocating for environmental protection and renewable energy. I do this work with EDF as well as other environmental organizations. I give speeches at various venues and publish opinion pieces in the media regarding the need for well-funded, functional, and effective state and federal environmental agencies. I am also participating in discussions regarding the need to strengthen New Mexico's renewable portfolio standard and bring more renewable energy into the State's energy

mix. Additionally, I have asked my county and city elected officials to pursue capital funding for solar installations on public buildings.

4. I understand that the transportation sector is the leading source of CO<sub>2</sub> emissions in the United States. Significantly, the majority of greenhouse gas emissions from the transportation sector are from passenger cars and light-duty trucks.<sup>1</sup> I am aware that between 2013 and 2016, vehicle miles traveled on New Mexico's roads and highways increased by 11%.<sup>2</sup> I am also aware that CO<sub>2</sub> emissions from New Mexico's transportation sector increased from 13.7 million metric tons in 2013<sup>3</sup> to 14.4 million metric tons in 2015.<sup>4</sup>

5. As an environmental law professor, I am aware that in its *Mid-Term Evaluation of Greenhouse Gas Emissions Standards for Model Year 2022–2025 Light-Duty Vehicles*, 83 Fed. Reg. 16077 (Apr. 13, 2018) (Revised Final

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<sup>1</sup> EPA, *Sources of Greenhouse Gas Emissions-Transportation*, available at <https://www.epa.gov/ghgemissions/sources-greenhouse-gas-emissions#transportation> (last updated April 11, 2018).

<sup>2</sup> TRIP, *New Mexico Transportation by the Numbers-Meeting the State's need for Safe and Efficient Mobility*, 1 (Jan. 2018), available at [http://www.tripnet.org/docs/NM\\_Transportation\\_by\\_the\\_Numbers\\_TRIP\\_Report\\_January\\_2018.pdf](http://www.tripnet.org/docs/NM_Transportation_by_the_Numbers_TRIP_Report_January_2018.pdf).

<sup>3</sup> U.S. Energy Information Administration, *Transportation Emissions by State (1980-2013)*, [www.eia.gov/environment/emissions/state/excel/transportation\\_CO2\\_by\\_state\\_2013.xlsx](http://www.eia.gov/environment/emissions/state/excel/transportation_CO2_by_state_2013.xlsx) (last accessed Aug. 21, 2018).

<sup>4</sup> U.S. Energy Information Administration, *State Carbon Dioxide Emissions Data, 2015 State analysis, Table 3 – 2015 State energy-related carbon dioxide emissions by sector* (Jan 22, 2018), <https://www.eia.gov/environment/emissions/state/analysis/>

Determination), EPA concluded that the MY 2022-2025 greenhouse gas emission standards were not appropriate, reversing its previous position.<sup>5</sup> Upon releasing the Revised Final Determination, former Administrator Pruitt announced that the decision was a “roll back” of the Obama-era greenhouse gas and fuel economy regulations, promising to weaken the existing standards.<sup>6</sup>

6. The greenhouse gas emission and fuel economy requirements established for light-duty vehicles mark the single most significant federal regulatory effort to reduce climate harming pollutants in the United States. Because of my work as an environmental advocate, I am familiar with, and deeply concerned about, the impacts of climate change due to greenhouse gas emissions. I am aware of the latest scientific evidence, which concludes that warming of the climate is unequivocal, that it is extremely likely that human influences have been the dominant cause of this warming since the mid-20th century, and that continued emissions of greenhouse gases will cause further warming.

7. This evidence demonstrates that climate change is posing a significant threat to the wellbeing of humans, wildlife, and the natural environment. For

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<sup>5</sup> See e.g., Mid-Term Evaluation of Greenhouse Gas Emissions Standards for Model Year 2022–2025 Light-Duty Vehicles, 83 Fed. Reg. 16077 (Apr. 13, 2018).

<sup>6</sup> Scott Pruitt (@EPAScottPruitt), Twitter (Apr. 3, 2018), *available at* <https://www.epa.gov/newsroom/former-administrator-scott-pruitt-social-media-files> (“Today, we announced @EPA plans to roll back Obama Admin fuel standards. These standards were inappropriate & needed to be revised. The focus should be on providing consumer choice and the strongest environmental protections.”).

instance, I am aware of scientific evidence suggesting that certain types of extreme weather events—including heat waves, heavy downpours, and, in some areas, floods and droughts—have become more frequent and/or intense. Studies also confirm that warming is causing sea levels to rise, oceans to become more acidic, and snowpack to decline.

8. The evidence also shows that these and other changes threaten human health. For example, more intense heatwaves lead to more heat-related disease and deaths. An increased risk of drought can contribute to water supply shortages and exacerbate wildfires, which can cause personal injury, damage infrastructure, and contribute to worsening air pollution problems. Extreme precipitation events can lead to flooding that can cause injuries and increase the risk of contracting waterborne diseases. And rising sea levels can threaten public safety through an increased risk of coastal flooding and storm surges. These are just some of the numerous public health and safety harms associated with climate change.

9. I see many of these impacts occurring in New Mexico, where my family and I live. For instance, New Mexicans are experiencing elevated temperatures, reduced snowfall in the mountains, and an increase in both the occurrence and severity of extreme weather events like droughts and heat waves. Summertime temperatures for the southwest region due to climate change are higher than the rest of country, making New Mexicans like myself particularly vulnerable to heat-related diseases and deaths. New Mexico is also currently experiencing an extreme monsoon

season and I am concerned that this pattern of extreme drought and extreme precipitation will continue to damage property and put human lives at risk.

10. Personally, I have in the past and intend to continue enjoying the outdoors on my own property. I am aware that climate change has caused an increased risk of forest fires—New Mexico has already experienced an increase in the frequency and severity of wildfires in recent years. My home in Santa Fe is in a pinon-juniper forest, which is affected by a bark beetle that spreads during conditions that are more prevalent in warmer climates. The bark beetle kills pinons. The resulting dead trees make ready fuel for increasingly intense and frequent wildfires. I have removed lower branches from trees in my yard and removed dead vegetation close to the house. The potential destruction of the landscape around my home and possibly my home itself from forest fires has an obvious negative effect on my life and on my property value.

11. I enjoy hiking, skiing, engaging in river sports, and bird watching in many areas across New Mexico. I have visited the Bisti Badlands and traveled around the Four Corners area of New Mexico. Often accompanied by my daughter and friends, I hike at all elevations in the nearby Santa Fe and Carson National Forests, as well as in natural areas surrounding Albuquerque, in Bernalillo County. We kayak on the Rio Grande and the Chama rivers. We engage in birdwatching during these outings, and regularly do so in our own backyard. On these excursions, I derive great pleasure from viewing trees, other natural vegetation, and wildlife.

12. A warming climate, in which there is less snow, will reduce our recreational opportunities. Reduced snowfall caused by global warming will limit my ability to ski in the winter, and changes in snowpack will reduce runoff during the summer, which will lower water levels, limiting my ability to recreate in the river.

13. I am also concerned about the health risks posed by greenhouse gas emissions from light-duty vehicles. I understand that these emissions exacerbate climate change, which in turn can increase ground-level ozone formation. I further understand that exposure to ozone can lead to and exacerbate a variety of respiratory and cardiovascular problems. I am troubled by the fact that I am exposed to this dangerous air pollution where I live and recreate.

14. Maintaining the MY 2022-2025 standards is necessary to mitigate the effects of climate change and reduce harmful air pollution in New Mexico. I am concerned that EPA's weakening of the standards presents an imminent and concrete injury to my health and well-being and that of my family, as well as to the survival, health, and natural beauty of the ecosystems where I live and recreate.

I declare under penalty of perjury that the foregoing is true and correct.



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Denise Fort

Executed on August 25, 2018

III.

Declarations of Environmental Defense Fund

4. Jason Mathers, Director of On-Road Vehicles, Environmental Defense Fund

## DECLARATION OF JASON MATHERS

I, Jason Mathers, declare as follows:

1. I am the Director of On-road Vehicles at the Environmental Defense Fund (EDF). I have worked at EDF for twelve years in several capacities aimed at advancing clean vehicle solutions. I received my Bachelor of Science degree in Environmental Science from the University of Massachusetts, Amherst and my graduate degree in Economics from Suffolk University. I have authored several publications including the Green Freight Handbook,<sup>1</sup> utilized by companies and stakeholders to improve freight performance.

2. My responsibilities are to develop and pursue solutions specific to cars and trucks that are protective of public health and climate. My role involves shaping EDF's efforts to create, strengthen and defend well-designed public policies that reduce the environmental impact of the transportation sector, like the federal greenhouse gas emission and corporate average fuel economy standards for light-duty vehicles (Clean Car Standards). My work also requires significant engagement with EDF's membership and the general public, as well as managing

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<sup>1</sup> Jason Mathers, et al., The Green Freight Handbook: A Practical Guide for Developing a Sustainable Freight Transportation Strategy for Business (EDF, 2014), available at <http://business.edf.org/files/2014/07/EDF-Green-Freight-Handbook.pdf>.

EDF's partnerships with auto industry stakeholders. I routinely publish blogs, present at conferences, and speak with press detailing the innovative solutions employed by industry to meet and even surpass current emissions standards.<sup>2</sup> This public outreach is vital in building understanding and support for transformative solutions among key stakeholders, including industry.

### **EDF Advocates to Protect Human Health and the Environment**

3. EDF is a membership organization incorporated under the laws of the State of New York. It is recognized as a not-for-profit corporation under section 501(c)(3) of the United States Internal Revenue Code. We rely on science, economics and law to protect and restore the quality of our air, water and other natural resources. EDF advocates on behalf of its members by employing legal, analytical, and communications strategies. To advocate for strong environmental policy, we often draft comments in proposed rulemakings, participate in litigation, craft white papers, and engage with our members and the public by publishing blogs, press statements, and action alerts.

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<sup>2</sup> Jason Mathers; *Leadership: The auto industry's missing ingredient*, Environmental Defense Fund (EDF) Climate 411 (Jan. 16, 2018), available at <http://blogs.edf.org/climate411/2018/01/16/leadership-the-auto-industrys-missing-ingredient/>; Mathers, *The accelerating market for zero emission trucks*, EDF Climate 411 (Dec. 1, 2017), available at <http://blogs.edf.org/climate411/2017/12/01/the-accelerating-market-for-zero-emission-trucks/>; Mathers, *Electric Vehicles enter the here and now*, EDF Climate 411 (Jul. 25, 2017), available at <http://blogs.edf.org/climate411/2017/07/25/electric-vehicles-enter-the-here-and-now/>.

4. EDF has long pursued initiatives aimed at protecting human health and the environment,<sup>3</sup> including longstanding work aimed at reducing health and climate-harming emissions from the transportation sector. Our partnership with FedEx helped to demonstrate that a new generation of trucks could deliver packages with lower emissions and reduced costs. Our Green Freight initiative works to reduce emissions in the freight industry by partnering with companies to improve practices and maximize efficiency.<sup>4</sup> We also actively support common-sense standards, like the phase 2 heavy-duty standards setting greenhouse gas and fuel efficiency requirements for heavy-duty trucks<sup>5</sup> and similarly advocate for maintaining and further strengthening greenhouse gas and fuel economy standards for light-duty vehicles.

### **Greenhouse Gas Emission Standards for Light-Duty Vehicles**

5. The greenhouse gas emission and fuel economy standards, established in 2012 for model year (MY) 2017-2025 light-duty vehicles, set more protective standards, building from the first set of standards promulgated in 2010 for MY

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<sup>3</sup> EDF, *Our Story: How EDF got started*, available at <https://www.edf.org/about/our-history>.

<sup>4</sup> EDF, *Green Freight*, available at <http://business.edf.org/projects/featured/green-freight>.

<sup>5</sup> EDF, et al., Comment on the Environmental Protection Agency's Proposed Rule, Repeal of Emission Requirements for Glider Vehicles, Glider Engines, and Glider Kits (Jan. 5, 2018), Docket ID: EPA-HQ-OAR-2014-0827.

2012-2016. These standards constitute a joint rulemaking effort initiated by the Environmental Protection Agency (EPA), National Highway Traffic Safety Administration (NHTSA), and the California Air Resources Board (CARB) to establish one National Program. These standards mark the single most significant federal regulatory effort to reduce climate harming pollutants. As a compromise between regulatory agencies and the auto industry, EPA promulgated a regulation requiring the agency to assess the MY 2022-2025 standards through a Mid-Term Evaluation Process (MTE) and make an appropriateness determination no later than April of 2018.<sup>6</sup>

6. In its *Mid-Term Evaluation of Greenhouse Gas Emissions Standards for Model Year 2022–2025 Light-Duty Vehicles*, 83 Fed. Reg. 16077 (Apr. 13, 2018) (Revised Final Determination), EPA concluded that the MY 2022-2025 standards were not appropriate and should be revised.<sup>7</sup> The Revised Final Determination issued by former Administrator Pruitt reversed the 2017 Final Determination issued pursuant to the MTE regulatory process outlined in 40 CFR 86.1818-12(h). In reaching this conclusion, former Administrator Pruitt failed to produce the required detailed analysis of the factors clearly identified in the MTE regulations. Instead, EPA relied primarily on automaker comments to support its findings.<sup>8</sup>

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<sup>6</sup> 40 CFR 86.1818-12(h).

<sup>7</sup> *Mid-Term Evaluation of Greenhouse Gas Emissions Standards for Model Year 2022-2025 Light-Duty Vehicles*, 83 Fed. Reg. 16,077 (Apr. 13, 2018).

<sup>8</sup> 83 Fed. Reg. 16,080-16,081 (EPA relied on data submitted by Global Automakers, and the Alliance for Automobile Manufacturers in determining “it would not be practicable to meet the MY 2022-2025 emission standards without significant electrification...”); 83 Fed. Reg. 16,084 (EPA relied on comments

**EDF has an Organizational Interest in Obtaining Information EDF is Entitled to under the MTE Regulations**

7. It is my understanding that the MTE regulations create a targeted disclosure requirement. Under 40 CFR 86.1818-12(h), EPA is required to conduct a technical analysis and make that analysis publically available for review and scrutiny.<sup>9</sup> Importantly, in making a final determination regarding the appropriateness of the standards, former Administrator Pruitt was required to “set forth *in detail* the bases for the determination”<sup>10</sup> including an assessment of several factors relating to availability of technology, cost to producers and consumers, feasibility, energy security, impacts on auto industry and auto safety, impacts on the Corporate Average Fuel Economy (CAFE) standards, and impacts on other relevant factors.<sup>11</sup> I further understand that the EPA Administrator’s assessment of

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submitted by Global Automakers and the Alliance regarding cost of fuel efficient vehicles to conclude that the Original FD “did not give appropriate consideration to the effect on low-income consumers.”).

<sup>9</sup> 40 CFR 86.1818-12(h).

<sup>10</sup> 40 CFR 86.1818-12(h)(4) (emphasis added).

<sup>11</sup> 40 CFR 86.1818-12(h)(1) (“In making the determination required by this paragraph (h), the Administrator shall consider the information available on the factors relevant to setting greenhouse gas emission standards under section 202(a) of the Clean Air Act for model years 2022 through 2025, including but not limited to:

- (i) The availability and effectiveness of technology, and the appropriate lead time for introduction of technology;
- (ii) The cost on the producers or purchasers of new motor vehicles or new motor vehicle engines;
- (iii) The feasibility and practicability of the standards;
- (iv) The impact of the standards on reduction of emissions, oil conservation, energy security, and fuel savings by consumers;
- (v) The impact of the standards on the automobile industry;

each of these factors and ultimately his final determination, must be based on a robust technical record including public comments, other relevant materials *and* the Draft Technical Assessment Report (TAR).<sup>12</sup> In purporting to address each of these factors, former Administrator Pruitt did not engage with the data and analysis in the existing Draft TAR, or any other new EPA analyses supportive of a determination that the standards are not appropriate, and instead restated concerns raised in automaker comments.<sup>13</sup>

8. I am aware that as part of the process supporting the EPA's 2017 determination that the current standards are appropriate, EPA made publicly available a 1200 page Draft TAR, a 270 page Proposed Determination,<sup>14</sup> a Technical Support Document containing 700 pages of EPA analysis in support of the Proposed Determination,<sup>15</sup> and a 170-page response to stakeholder comments.<sup>16</sup>

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(vi) The impacts of the standards on automobile safety;  
(vii) The impact of the greenhouse gas emission standards on the Corporate Average Fuel Economy standards and a national harmonized program; and  
(viii) The impact of the standards on other relevant factors.”).

<sup>12</sup> 40 CFR 86.1818-12(h)(2).

<sup>13</sup> 83 Fed. Reg. 16,077 (Apr. 13, 2018) (EPA cites to automaker comments on the Draft TAR, but does not engage with its own data and analysis provided in the Draft TAR.)

<sup>14</sup> EPA, Proposed Determination on the Appropriateness of the Model Year 2022-2025 Light-Duty Greenhouse Gas Emissions Standards under the Midterm Evaluation, EPA-420-R-16-020 (Nov. 2016), *available at* <https://nepis.epa.gov/Exe/ZyPDF.cgi?Dockey=P100Q3DO.pdf>

<sup>15</sup> EPA, Proposed Determination on the Appropriateness of the Model Year 2022-2025 Light-Duty Greenhouse Gas Emissions Standards under the Midterm Evaluation, Technical Support Document, EPA-420-R-16-021 (Nov. 2016), *available at* <https://nepis.epa.gov/Exe/ZyPDF.cgi?Dockey=P100Q3L4.pdf>

<sup>16</sup> EPA, Final Determination on the Appropriateness of the Model Year 2022-2025 Light-Duty Vehicle Greenhouse Gas Emissions Standards under the Midterm

I am also aware that as part of the Revised Final Determination process supporting the EPA's determination that the standards are not appropriate, EPA issued a Request for Comment on the agency's proposed reconsideration of the 2017 final determination,<sup>17</sup> a notice of intention to reconsider the standards<sup>18</sup> in March of 2017 and a Revised Final Determination that the standards are not appropriate and require revision in April of 2018.<sup>19</sup> I am further aware that as part of the Revised Final Determination process, EPA failed to timely publish a new or revised TAR, a Proposed Determination, a response to comments, a technical support document, or any other detailed analyses to support the Revised Final Determination. I understand that the only "new" EPA report disclosed in the Revised Final Determination as forming the bases for EPA's determination that the standards were not appropriate was a Manufacturer Compliance Report showing all manufacturers to be in compliance with the standards through MY 2016.<sup>20</sup> Relying

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Evaluation, Response to Comments, EPA-420-R-17-002 (Jan. 2017), *available at* <https://nepis.epa.gov/Exe/ZyPDF.cgi?Dockey=P100QQ9Y.pdf>

<sup>17</sup> Request for Comment on Reconsideration of the Final Determination of the Mid-Term Evaluation of Greenhouse Gas Emissions Standards for Model Year 2022-2025 Light-Duty Vehicles; Request for Comment on Model Year 2021 Greenhouse Gas Emissions Standards, 82 Fed. Reg. 39551 (Aug. 21, 2017).

<sup>18</sup> 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>19</sup> Midterm Evaluation of Greenhouse Gas Emissions Standards for Model Year 2022-2025 Light-Duty Vehicles, 83 Fed. Reg. 16,077 (Apr. 13, 2018).

<sup>20</sup> 83 Fed. Reg. 16,079, n. 14; *see e.g.* EPA, Greenhouse Gas Emission Standards for Light-Duty Vehicles—Manufacturer Performance Report for the 2016 Model Year, Office of Transportation and Air Quality, EPA-420-R-18-002 (Jan. 2018), *available at* <https://www.epa.gov/regulations-emissions-vehicles-and-engines/greenhouse-gas-ghg-emission-standards-light-dutyvehicles> ("No

on automaker comments and producing a single compliance report unresponsive of the conclusions reached in the Revised Final Determination clearly does not offer sufficient detail to meet the disclosure requirements outlined in the MTE regulations and prevents the public and interested stakeholders from understanding the detailed bases for the former Administrator's reversal in position.

9. EDF has a strong organizational interest in obtaining information required to be disclosed throughout the MTE to enable our meaningful participation in the rulemaking process. EDF actively engaged in the initial 2012 rulemaking establishing the MY 2017-2025 standards. We filed comments in response to the 2010 Notice of Intent,<sup>21</sup> and again in response to the 2012 Notice of Proposed Rulemaking.<sup>22</sup> EDF also provided testimony for the January 24, 2012 public hearing on the proposed standards.<sup>23</sup> EDF's testimony highlighted the substantial CO<sub>2</sub> emissions reductions projected under the program and the

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manufacturer is yet out of compliance with the GHG program in any of these first five model years.”).

<sup>21</sup> EDF, Comment on 2017 and Later Model Year Light Duty Vehicle GHG Emissions and CAFE Standards; Notice of Intent, 6 (Oct. 31, 2010), Docket ID: EPA-HQ-OAR-2010-0799-0531.

<sup>22</sup> EDF, Comment 2017 and Later Model Year Light-Duty Vehicle Greenhouse Gas Emissions and Corporate Average Fuel Economy Standards; Proposed Rule, 2-3; 10 (Feb. 13, 2012), Docket ID: EPA-HQ-OAR-2010-0799-9519

<sup>23</sup> *Proposed Greenhouse Gas Emissions Standards and Fuel Economy Standards for Model Year 2017-2025 Light-duty Vehicles: Public Hearing before EPA/NHTSA Panel*, (Jan. 24, 2012), Docket ID: EPA-HQ-OAR-2010-0799-7955.

importance of these reductions in mitigating climate harming impacts.<sup>24</sup>

Throughout the rulemaking process, EDF published several blogs that relied on EPA data and analyses in quantifying fuel cost savings, oil consumption, and CO<sub>2</sub> reductions.<sup>25</sup> EDF also created issue briefing documents to inform our members, press and other stakeholders about the ability of automakers to meet NHTSA's augural MY 2022-2025 CAFE standards.

10. EDF has also been actively engaged throughout the MTE process. After EPA, NHTSA, and CARB jointly issued the Draft TAR analyzing the achievability of the standards through 2025, we issued a press release alerting the public that EPA had initiated the MTE process and that a public comment period

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<sup>24</sup> *Proposed Greenhouse Gas Emissions Standards and Fuel Economy Standards for Model Year 2017-2025 Light-duty Vehicles: Public Hearing before EPA/NHTSA Panel*, (Jan. 24, 2012) (testimony from Erica Morehouse), Docket ID: EPA-HQ-OAR-2010-0799-7955.

<sup>25</sup> Peter Zalzal, *Broad Support for Cleaner Cars – Except from Some in Congress*, EDF Climate 411 (Oct. 17, 2011), available at <http://blogs.edf.org/climate411/2011/10/17/broad-support-for-cleaner-cars-except-from-some-in-congress/>; Vickie Patton, *EDF Applauds New Fuel Efficiency and Emissions Standards for Cars and Trucks*, EDF Climate 411 (Nov. 17, 2011), available at <http://blogs.edf.org/climate411/2011/11/17/edf-applauds-new-fuel-efficiency-and-emissions-standards-for-cars-and-trucks/>; Mandy Warner, *Finally, A Good Record High! Car Fuel Efficiency in 2012*, EDF Climate 411 (Jul. 30, 2012), available at <http://blogs.edf.org/climate411/2012/07/30/finally-a-good-record-high-car-fuel-efficiency-in-2012/>; Jackie Roberts, *Growing Jobs, One Auto Supplier at a Time*, EDF Climate 411 (Sept. 7, 2012), available at <http://blogs.edf.org/climate411/2012/09/07/growing-jobs-one-auto-supplier-at-a-time/>

would follow this release of the Draft TAR.<sup>26</sup> EDF also submitted comments on the Draft TAR, supporting EPA's technical findings that the MY 2022-2025 standards were both achievable and affordable.<sup>27</sup> In commenting on the Draft TAR, EDF interpreted the MTE regulations as requiring that the Draft TAR "serve as the primary basis for EPA's appropriateness determination."<sup>28</sup> Following release of the Proposed Determination finalizing the MY 2022-2025 standards, EDF again conducted outreach by publishing a blog citing EPA data and analysis regarding the feasibility of the standards.<sup>29</sup>

11. When EPA issued its Notice of Intention to reconsider the 2017 Final Determination, EDF filed a request urging EPA and NHTSA to withdraw the notice because the robust technical record did not support a decision to reopen the MTE process or weaken the standards.<sup>30</sup> EDF also commented on the

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<sup>26</sup> Press Release, EDF, Mid-Term Review Begins for America's Clean Cars (July 18, 2016), available at <https://www.edf.org/media/mid-term-review-begins-americas-clean-cars>

<sup>27</sup> EDF et al., Comment on 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, 4-16 (Sept. 26, 2016), Docket ID: EPA-HQ-OAR-2015-0827-4086.

<sup>28</sup> EDF et al., Comment on 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, 5 (Sept. 26, 2016), Docket ID: EPA-HQ-OAR-2015-0827-4086.

<sup>29</sup> Nicholas Bianco, *5 Things You Should Know About America's Clean Car Standards*, EDF Climate 411 (Dec. 19, 2016), available at [http://blogs.edf.org/climate411/2016/12/19/5-things-you-should-know-about-americas-clean-car-standards/?\\_ga=2.233715866.563423076.1528729357-1461891325.1527709443](http://blogs.edf.org/climate411/2016/12/19/5-things-you-should-know-about-americas-clean-car-standards/?_ga=2.233715866.563423076.1528729357-1461891325.1527709443).

<sup>30</sup> EDF, et al., Request to Withdraw Notice of Intention to Reconsider the Final Determination of the Mid-Term Evaluation of Greenhouse Gas Emissions

Reconsideration of the 2017 Final Determination, again emphasizing that the record supported the appropriateness of the standards.<sup>31</sup> In these comments EDF asserted that if EPA were relying on technical determinations that had not previously been published, it was compelled to publish that information prior to issuing its final determination.<sup>32</sup>

12. After former Administrator Pruitt issued the Revised Final Determination, announcing a plan to “roll back” the standards<sup>33</sup> we joined a coalition of environmental and consumer advocates in writing a letter to automaker executives expressing our opposition to the course EPA was taking to weaken of these vital regulations.<sup>34</sup> In response to former Administrator Pruitt’s promise to

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Standards for Model Year 2022-2025 Light Duty Vehicles, 2; 12 (Jun. 6, 2017), Docket ID: PA-HQ-OAR-2015-0827-6300.

<sup>31</sup> EDF, et al., Comment on Reconsideration of the Final Determination of the Mid-Term Evaluation of Greenhouse Gas Emissions Standards for Model Year 2022-2025 Light-Duty Vehicles; Comment on Model Year 2021 Greenhouse Gas Emissions Standards, 16 (Oct. 5, 2017), Docket ID: EPA-HQ-OAR-2015-0827-9203.

<sup>32</sup> EDF, et al., Comment on Reconsideration of the Final Determination of the Mid-Term Evaluation of Greenhouse Gas Emissions Standards for Model Year 2022-2025 Light-Duty Vehicles; Comment on Model Year 2021 Greenhouse Gas Emissions Standards, 16 (Oct. 5, 2017), Docket ID: EPA-HQ-OAR-2015-0827-9203.

<sup>33</sup> Scott Pruitt (@EPAScottPruitt), Twitter (Apr. 3, 2018), available at <https://twitter.com/EPAScottPruitt/status/981239876971565056> (“Today, we announced @EPA plans to roll back Obama Admin fuel standards. These standards were inappropriate & needed to be revised. The focus should be on providing consumer choice and the strongest environmental protections.”).

<sup>34</sup> Letter from EDF et al., to Automakers (May 2018), *available at* <https://www.edf.org/sites/default/files/content/GG%20CEO%20letter%20to%20autos.pdf>.

weaken the standards,<sup>35</sup> EDF authored several blogs detailing the resulting loss in CO<sub>2</sub> emissions reductions, consumer savings, and American automaker jobs.<sup>36</sup> We also issued an action alert to members outlining the consequences of weakening the standards and prompting members to communicate their disapproval of the action to former Administrator Pruitt directly.<sup>37</sup>

13. EDF has been involved in the regulatory process for the Clean Car Standards for the better part of this decade, filing our first comments in 2010. We clearly have a strong organizational interest in obtaining this information so as to meaningfully participate in this and subsequent rulemakings.

14. EDF also has a strong organizational interest in obtaining the information required to be disclosed as part of the Revised Final Determination so we can effectively advocate for standards that protect human health and the

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<sup>35</sup> Scott Pruitt (@EPAScottPruitt), Twitter (Apr. 3, 2018), available at <https://twitter.com/EPAScottPruitt/status/981239876971565056> (“Today, we announced @EPA plans to roll back Obama Admin fuel standards. These standards were inappropriate & needed to be revised. The focus should be on providing consumer choice and the strongest environmental protections.”).

<sup>36</sup> Alice Henderson, *EPA Administrator Scott Pruitt’s Dirty Cars Action – By the Numbers*, EDF Climate 411 (Apr. 3, 2018), available at <http://blogs.edf.org/climate411/2018/04/03/epa-administrator-scott-pruitts-dirty-cars-action-by-the-numbers/>; Martha Roberts, Erin Murphy, *An outpouring of support for clean car standards, in the face of Pruitt’s attempted rollback*, EDF Climate 411 (Apr. 6, 2018), <http://blogs.edf.org/climate411/2018/04/06/an-outpouring-of-support-for-clean-car-standards-in-the-face-of-pruitts-attempted-rollback/>; Alice Henderson, *Five things you need to know about the U.S. Clean Car Standards*, EDF Climate 411 (Apr. 30, 2018), available at <http://blogs.edf.org/climate411/2018/04/30/five-things-you-need-to-know-about-the-u-s-clean-car-standards/>.

<sup>37</sup> Action Alert, EDF, *They’re Taking Aim at Our Biggest Climate Success Story* (April 2, 2018), available at <https://www.edf.org/news-headlines?page=12>.

environment. The transportation sector is now the leading source of climate-altering pollution in the United States.<sup>38</sup> Our analysis indicates that weakening the standards would result in a loss of more than 2 billion tons of CO<sub>2</sub> emissions reductions.<sup>39</sup> We are already seeing the impacts of climate altering pollution throughout the United States. Moreover, weakening the standards will increase exposure to harmful air pollution that exacerbates heart and respiratory illnesses.<sup>40</sup> EDF has an interest in obtaining information documenting the purported technical bases underpinning the Revised Final Determination, as that action would increase the harmful impacts of climate change and put human lives at risk.

15. As a member organization, EDF also has an interest in informing our members about EPA's reasoning regarding potential changes to the MY 2021-2025 standards. EDF members likewise have a strong interest in protecting human health and the environment, and so these members have an interest in understanding why EPA is changing course and dramatically weakening standards that have already proven instrumental in reducing impacts associated with climate and health-harming air pollution. Without this technical data and analysis, EDF

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<sup>38</sup> U.S. Energy Information Administration, DOE/EIA-0035(2018/05), Monthly Energy Review (May 2018), *available at* <https://www.eia.gov/totalenergy/data/monthly/pdf/mer.pdf>.

<sup>39</sup> EDF, Impacts of Weakening the Existing EPA Phase 2 GHG Standards, (Apr. 2018), *available at* <http://blogs.edf.org/climate411/files/2018/04/MTE-Relaxation-Impacts-Final.pdf>.

<sup>40</sup> Allergy & Asthma, et al., Comments on the EPA's Reconsideration of Final Determination of Mid-Term Evaluation of Greenhouse Gas Emissions Standards for Model Year 2022-2025 Light-duty Vehicles; Model Year 2021 Greenhouse Gas Emissions Standards (Oct. 5, 2017), Docket ID: EPA-HQ-OAR-2015-0827-9171.

cannot draft blogs, issue press releases, or release action alerts that inform our membership and enable effective outreach to policy makers about changes in EPA's technical approach that would benefit our members' interests in reducing pollution and protecting the environment. Understanding in detail why EPA is reversing its position on the appropriateness of the standards will likewise enable EDF and our members to meaningfully evaluate that reasoning and engage with policymakers – including agency officials, members of Congress, and state officials – regarding our concerns related to changes in EPA's policies that affect our lives.

### **Analysis of Technical Data is Central to EDF's Work**

16. In advocating for policies protective of public health and the environment, EDF frequently relies on the technical analyses released by federal agencies to participate in regulatory rulemakings, increase our understanding of the effectiveness of potential emissions reduction strategies in highly technical and dynamic industries, inform our communications strategy, and analyze policy decisions. Such technical analysis is central to EDF's work.

17. In preparing comments and developing white papers, EDF analyzes and evaluates technical findings rigorously, undertaking deep assessment of the data that goes beyond a generalized and widely-shared public interest in the information. To effectively participate in complex environmental regulatory rulemakings, we develop detailed comments analyzing the legal and technical evidence supporting a proposed regulation. For example, EDF, along with a coalition of environmental groups, recently filed comments on EPA's proposal to

withdraw “Control Technique Guidelines for the Oil and Gas Industry” in which EDF synthesized EPA data on exposure to ozone<sup>41</sup> and benzene<sup>42</sup> to demonstrate the harmful human health impacts of EPA’s proposed action.

18. In composing white papers, EDF engages with technical data to analyze the impacts of a proposed regulatory action. In a recent EDF white paper, EDF attorneys and policy analysts synthesized EPA air pollution data and technical analysis to quantify the potential impacts of former Administrator Pruitt’s reversal of the “once in always in” policy for major sources of air pollution.<sup>43</sup> In analyzing this and other technical data, EDF demonstrated that a reversal of this policy would have devastating human health impacts on Houston’s most vulnerable populations.<sup>44</sup>

19. EDF also frequently relies on technical data in engaging with the public and membership about proposed regulatory actions impacting human health

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<sup>41</sup> EDF, et al., Comments on the Proposed Withdrawal of the Control Techniques Guidelines for the Oil and Natural Gas Industry (Apr. 23, 2018), at 3, n.4, Docket ID: EPA-HQ-OAR-2015-0216-0630.

<sup>42</sup> EDF, et al., Comments on the Proposed Withdrawal of the Control Techniques Guidelines for the Oil and Natural Gas Industry (Apr. 23, 2018), at 5, n.23, Docket ID: EPA-HQ-OAR-2015-0216-0630.

<sup>43</sup> Thomas Carbonell, Rama Zakaria, Surbhi Sarang, Pruitt’s New Air Toxics Loophole –An Assessment of Potential Air Pollution Impact sin the Houston-Galveston Region, EDF, at 9 (Apr. 10, 2018), *available at* <https://www.edf.org/sites/default/files/documents/OIAI-Houston%20case%20study%20FINAL.pdf>

<sup>44</sup> Thomas Carbonell, Rama Zakaria & Surbhi Sarang, Pruitt’s New Air Toxics Loophole –An Assessment of Potential Air Pollution Impact sin the Houston-Galveston Region, EDF, at 9 (Apr.10, 2018), *available at* <https://www.edf.org/sites/default/files/documents/OIAI-Houston%20case%20study%20FINAL.pdf>

and the environment.<sup>45</sup> In a recent blog focusing on Hurricane Harvey and the impact of climate change on hurricane intensity, EDF relied on reports by the National Oceanic Atmospheric Administration and the National Weather Service to demonstrate the devastating impact intensifying hurricanes, like Harvey, can have on human life.<sup>46</sup>

20. Analysis of technical data is also central to EDF's transportation-related work. EDF relies on technical data in our discussions with stakeholders, including vehicle manufacturers, automotive parts suppliers and companies that operate large fleets. Agency data enables EDF and our representatives to discuss the technical feasibility of standards without having access to otherwise confidential business information. It also enables EDF and our representatives to understand specific points of disagreement, such as the efficacy or costs of specific

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<sup>45</sup> See e.g. Thomas Carbonell, *Administrator Pruitt opened the door to making Houston's air toxics problem worse*, EDF Climate 411 (Apr. 10, 2018), available at <http://blogs.edf.org/climate411/2018/04/10/administrator-pruitt-opened-the-door-to-making-houstons-air-toxics-problem-worse/>; David Lyon, *EPA Draft Says Oil & Gas Methane Emissions Are 27 Percent Higher than Earlier Estimates*, EDF Energy Exchange (Feb. 23, 2016), available at <http://blogs.edf.org/energyexchange/2016/02/23/epa-draft-says-oil-gas-methane-emissions-are-twenty-seven-percent-higher-than-earlier-estimates/>; Nichole Saunders, *Hydraulic Fracturing and the EPA Water Stud: Where Do We Go from Here?*, EDF Energy Exchange (Jul. 30, 2015), available at <http://blogs.edf.org/energyexchange/2015/07/30/hydraulic-fracturing-and-the-epa-water-study-where-do-we-go-from-here/>.

<sup>46</sup> Kate Zerrenner, *Hurricane Harvey: Climate change, staggering costs, and people at the heart of it all*, EDF Climate 411 (Feb. 21, 2018), available at <http://blogs.edf.org/climate411/2018/02/21/hurricane-harvey-climate-change-staggering-costs-and-people-at-the-heart-of-it-all/>

technologies. This level of detail is critical in developing jointly-held position statements that have been a critical component in our advocacy efforts.<sup>47</sup>

21. Throughout the MTE process, EDF has similarly relied on technical analyses to engage in the rulemaking process, develop white papers, and conduct outreach. In commenting on the Draft TAR, EDF synthesized the Draft TAR and other EPA data to offer recommendations to improve EPA's cost benefit analyses in affirming the MY 2022-25 standards.<sup>48</sup> Following release of the 2017 Final Determination, EDF supported efforts to develop a technical report on post-2025 passenger vehicle emissions reductions, which relied on EPA data in several MTE technical documents, including the Draft TAR, Proposed Determination, and 2017 Final Determination.<sup>49</sup> In response to the Revised Final Determination's promise to weaken the standards, EDF authored several blogs relying on EPA data projecting benefits of the program to quantify the resulting loss in CO<sub>2</sub> emissions

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<sup>47</sup> See e.g., Fred Krupp, *Clear rules can create better engines, clean air*, Indianapolis Star, (Oct. 28, 2010), available at <https://www.newspapers.com/newspage/126297968/> (on file with EDF); see also Jason Mathers, *EPA SmartWay and Clean Truck Standards save U.S. business millions*, EDF+ Business (Mar 2, 2017), available at <http://business.edf.org/blog/tag/pepsico>.

<sup>48</sup> EDF et al., Comment on 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, 5 (Sept. 26, 2016), Docket ID: EPA-HQ-OAR-2015-0827-4086.

<sup>49</sup> Tom Cackette & Rick Rykowski, Technical Assessment of CO<sub>2</sub> Emission Reductions for Passenger Vehicles in the Post-2025 Timeframe (Feb. 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).

reductions, consumer savings, and American automaker jobs.<sup>50</sup> The action alert we issued to members similarly relied on EPA data and statistics to quantify the threat of weakening the standards.<sup>51</sup>

**Without access to this information, EDF's ability to perform Detailed Analysis and to effectively pursue our Organizational Mission is Hindered**

22. In being deprived of our right to evaluate EPA data and analysis in support of the Revised Final Determination, EDF's analytical work is constrained. We recently supported efforts to develop a report on the benefits of implementing California's Advanced Clean Car Standards (State Standards) in Colorado.<sup>52</sup> This paper relied on EPA data and projections outlined in the Draft TAR because no new detailed analysis was produced by EPA in support of the Revised Final Determination. Without access to the analysis supporting the Revised Final

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<sup>50</sup> Alice Henderson, *EPA Administrator Scott Pruitt's Dirty Cars Action – By the Numbers*, EDF Climate 411 (Apr. 3, 2018), available at <http://blogs.edf.org/climate411/2018/04/03/epa-administrator-scott-pruitts-dirty-cars-action-by-the-numbers/>; Martha Roberts, Erin Murphy, *An outpouring of support for clean car standards, in the face of Pruitt's attempted rollback*, EDF Climate 411 (Apr. 6, 2018), <http://blogs.edf.org/climate411/2018/04/06/an-outpouring-of-support-for-clean-car-standards-in-the-face-of-pruitts-attempted-rollback/>; Alice Henderson, *Five things you need to know about the U.S. Clean Car Standards*, EDF Climate 411 (Apr. 30, 2018), available at <http://blogs.edf.org/climate411/2018/04/30/five-things-you-need-to-know-about-the-u-s-clean-car-standards/>.

<sup>51</sup> Action Alert, EDF, *They're Taking Aim at Our Biggest Climate Success Story* (April 2, 2018).

<sup>52</sup> Richard Rykowski, *The Benefits of Protective Advanced Clean Car Standards in Colorado* (May 2018), available at [https://www.edf.org/sites/default/files/content/The\\_Benefits\\_of\\_Protective\\_Clean\\_Car\\_Standards\\_CO.pdf](https://www.edf.org/sites/default/files/content/The_Benefits_of_Protective_Clean_Car_Standards_CO.pdf).

Determination, EDF could not critically evaluate whether we should suggest updating or revising any assumptions in the report related to the costs and benefits of a revised National Program in those states considering whether to adopt the State Standards.

23. EDF's current ability to conduct outreach, employ communications strategies, and engage in advocacy is also constrained by our inability to synthesize the technical data that purportedly supports the Revised Final Determination. EDF's communications efforts following the Revised Final Determination were substantively limited because our blogs, press releases, and action alerts could not identify any EPA data or analyses that supported EPA's reversal in position. If EDF does not have access to the data and information EPA is relying on, we cannot evaluate those sources or EPA's reliance on those sources effectively and communicate that information to our members. Without access to this detailed analysis, we are hindered in our ability to communicate with our membership.

24. EDF's ability to engage in effective and productive dialogue with industry members is harmed by the inability to analyze technical data in support of the Revised Final Determination. For example, in being deprived of this data, we cannot work as effectively with component suppliers to identify potential solutions where the agency discounted their efficacy or overstated their cost. This also undercuts our ability to undertake public accountability campaigns that demonstrate the ability of automakers to cost-effectively improve the environmental performance of the vehicle fleet.

25. EDF has made efforts to obtain supporting data ahead of the Notice of Proposed Rulemaking (NPRM) to roll back the standards<sup>53</sup> by engaging with NHTSA and EPA, but our requests for information have been routinely denied.

26. In response to the lacking data and analysis made available during the reconsideration of the 2017 Final Determination, EDF along with a coalition of non-governmental organizations sent letters to both NHTSA and EPA requesting the agencies make publically available all information regarding models and analyses informing their decision-making in revising the standards.<sup>54</sup> We have yet to receive any response from EPA, and NHTSA has yet to produce the information requested.<sup>55</sup> EDF has also sought to obtain this information—which EPA was

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<sup>53</sup> The Safer Affordable Fuel-Efficient (SAFE) Vehicles Rule for Model Years 2021–2026 Passenger Cars and Light Trucks, 83 Fed. Reg. 42986 (Aug. 24, 2018).

<sup>54</sup> See Letter from EDF et.al, to Heidi King, Deputy Administrator, NHTSA (Mar. 20, 2018) (on file with EDF) (EDF requested NHTSA make publically available all information regarding use of their Volpe models and other agency analysis in revising the MY 2021 and beyond standards); See Letter from EDF et.al, to William Wehrum, Assistant Administrator, EPA (Mar. 20, 2018) (on file with EDF) (EDF requested EPA make publically available all information regarding use of their Omega models and all other agency analysis in revising the MY 2021 and beyond standards).

<sup>55</sup> See e.g. Letter from Heidi King, Deputy Administrator, NHTSA, to EDF et.al (Apr. 2, 2018) (on file with EDF) (In response to EDF’s request NHTSA wrote that it “plans to release full documentation related to the Notice of Proposed Rulemaking analysis performed for the proposed rule when it is issued” denying EDF’s request that NHTSA promptly release this information to the public); see also Letter from EDF et al., to Heidi King, Deputy Administrator (May 7, 2018) (EDF responded expanding our request for information regarding “all” models, data, and analysis impacting NHTSA’s decision-making regarding the proposed fuel economy standards. We also requested that NHTSA extend the comment period to 120 days to provide the time necessary to review and synthesize this data and offer an effective response in our comments. We have yet to receive a response).

required to affirmatively disclose pursuant to its MTE regulations—from EPA through the Freedom of Information Act (FOIA).<sup>56</sup> EPA has yet to produce any documents related to these requests, and has failed to meet statutory production deadlines.

27. Without this information EDF is unable to respond as effectively to EPA's decision to revise the standards. The deprivation of this information hinders EDF's effort to submit detailed comments on the subsequent NPRM. Without the information or the time necessary to deconstruct and evaluate the models, data, and analyses supporting the Revised Final Determination, EDF is limited in our ability to draft robust comments within the limited comment period.

28. The MTE process outlines a binding commitment made by EPA to provide detailed information about specific aspects of the standards to facilitate public participation in any EPA decision to change standards that had been the product of constructive collaboration across a diverse range of stakeholders. The

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<sup>56</sup> See EDF, Freedom of Information Act Request for Records Related to the EPA's Mid-Term Evaluation of Greenhouse Gas Emissions Standards for Model Year 2022-2025 Light Duty Vehicles (Apr. 16, 2018), Tracking ID: EPA-HQ-2018-007517, *available at* <https://foiaonline.regulations.gov/foia/action/public/view/request?objectId=090004d2818c38fa> (On April 4, 2016, EDF submitted a FOIA request to EPA requesting copies of all records related to the development and release of the Revised Final Determination); *see also* EDF, Freedom of Information Act Request for Records Relating to EPA Analyses of Safety in the Context of Greenhouse Gas Emissions Standards for Light-Duty Vehicles (May 9, 2018), Tracking ID: EPA-HQ-2018-007517, *available at* <https://foiaonline.regulations.gov/foia/action/public/view/request?objectId=090004d2819121ad> (On May 9, 2018, EDF submitted a FOIA Request to EPA for records related to EPA's vehicle safety data and analysis conducted in setting greenhouse gas emission standards for light-duty vehicles.).

Revised Final Determination failed to provide the information EPA committed to providing in promulgating the MTE regulations. Although the MTE regulations are intended to increase the amount of information shared with the public to facilitate discourse and participation, EDF and our members are no better off in understanding the upcoming rulemaking than they would have been absent the MTE regulations. Without the information EDF is entitled to under the MTE regulations, we cannot effectively engage with our members and advocate on behalf of human health and the environment.

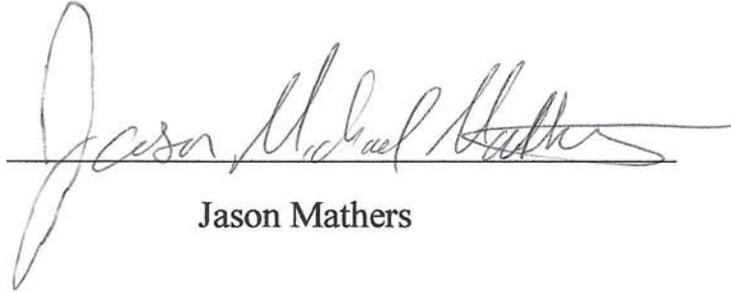
I declare that the foregoing is true and correct.

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A handwritten signature in black ink, appearing to read "Jason Michael Mathers", is written over a horizontal line. The signature is fluid and cursive, with a large initial "J" and a long, sweeping underline.

Jason Mathers

Dated: August 24, 2018

III.

Declarations of Environmental Defense Fund

5. Dr. Jeremy Michalek, Environmental Defense Fund member

## DECLARATION OF DR. JEREMY MICHALEK

I, Jeremy Michalek, declare as follows:

1. I am a Professor of Engineering and Public Policy and Professor of Mechanical Engineering at Carnegie Mellon University. I am the director of the Carnegie Mellon Design Decision Laboratory, which studies the preferences and economics that drive product design tradeoff decisions as well as the impact of those decisions on public and private stakeholders. I am also the Director of the Carnegie Mellon Vehicle Electrification Group, which studies technology, life cycle, consumer behavior, and public policy for electric and advanced vehicle technologies. I received my MS and PhD from the University of Michigan in Mechanical Engineering in 2002 and 2005, respectively.

2. I have published extensively in peer-reviewed scientific journals on automotive technology and policy and have given briefings on my light-duty vehicle policy research findings at the U.S. EPA, committees of the U.S. House of Representatives and U.S. Senate, nonpartisan groups like the Congressional Budget Office, and other federal and state government entities.

3. I am a member of the Environmental Defense Fund. My views are not necessarily representative of Carnegie Mellon University and are not provided on behalf of Carnegie Mellon University or any other organization.

### Expertise and Research Focus

4. As a professor of engineering and public policy, I engage in the study of federal policies relating to vehicles, and their implications for economics, energy, human health, and the environment. I also assess the implications of such policies for automobile manufacturers, consumers, and citizens affected by environmental impacts. Access to rigorous government data and analyses is necessary to adequately assess the technical feasibility of policy decisions that impact the auto industry. I am particularly focused on electric and advanced technology vehicles, so the regulation of greenhouse gas emissions from vehicles is highly relevant to my work.

5. In the context of light-duty vehicles, I have published research that assesses key technical and policy questions in light of the regulatory landscape. For example:

- a. M Jenn, A., I.L. Azevedo and J.J. Michalek (2018a) "U.S. alternative-fuel-vehicle policy interactions increase greenhouse gas emissions," in review, Transportation Research Part A: Policy and Practice.
- b. Ciez, R. and J.J. Michalek (2018) "Evaluating consumer risk perceptions of recycled batteries in the electric vehicle market," working paper.
- c. Helveston, J.P., I Azevedo, S. Seki, J. Min, E. Fairman, A. Boni, and J.J. Michalek (2018) "Choices at the pump: measuring consumer preferences for alternative vehicle fuels," working paper.
- d. Jenn, A., I.L. Azevedo and J.J. Michalek (2018b) "Understanding the effect of policy designs on the future light-duty vehicle fleet," working paper.

- e. Seki, S., I. Azevedo, W.M. Griffin and J.J. Michalek (2018) "Potential for cost effective ethanol fuels from natural gas: case study of Pennsylvania," working paper.
- f. Tong, F., I. Azevedo, J.J. Michalek and W.M. Griffin (2018) "Clean hydrogen supply? A review of hydrogen production pathways and use applications," working paper.
- g. Ward, J., J.J. Michalek, I. Azevedo, and C. Samaras (2018) "Effect of shared mobility services on vehicle ownership and travel patterns in the United States," working paper.
- h. Sakti, A., I.M.L. Azevedo, E.R.H. Fuchs, J.J. Michalek, K.G. Gallagher and J.F. Whitacre (2017) "Consistency and robustness of forecasting for emerging technologies: the case of Li-ion batteries for electric vehicles," *Energy Policy* v106 p415-426.
- i. Yuksel, T., S. Litster, V. Viswanathan, and J.J. Michalek (2016) "Plug-in hybrid electric vehicle LiFePO<sub>4</sub> battery life implications of thermal management, driving conditions, and regional climate" *Journal of Power Sources*, v338 n15 p49-64.
- j. Haaf, C.G., W.R. Morrow, I. Azevedo, E. Feit and J.J. Michalek (2016) "Forecasting light-duty vehicle demand using alternative-specific constants for endogeneity correction versus calibration," *Transportation Research Part B: Methodology*, v84 p182-210.
- k. Jenn, A., I.L. Azevedo and J.J. Michalek (2016) "Alternative fuel vehicle adoption increases fleet gasoline consumption and greenhouse gas emissions under United States corporate average fuel economy policy and greenhouse gas emissions standards," *Environmental Science & Technology*, v50 n5 p.2165-2174.
- l. Weis, A., P. Jaramillo and J.J. Michalek (2016) "Consequential life cycle air emissions externalities for plug-in electric vehicles in the PJM interconnection," *Environmental Research Letters*, v11 n2 024009.
- m. Yuksel, T., M. Tamayao, C. Hendrickson, I. Azevedo and J.J. Michalek (2016) "Effect of regional grid mix, driving patterns and climate on the comparative carbon footprint of electric and

- gasoline vehicles," *Environmental Research Letters*, v11 n4 044007.
- n. Helveston, J.P., Y. Liu, E. Feit, E. Fuchs, E. Klampfl, and J.J. Michalek (2015) "Will subsidies drive electric vehicle adoption? Measuring consumer preferences in the U.S. and China," *Transportation Research Part A: Policy and Practice* v73 p96-112.
  - o. Sakti, A., J.J. Michalek, E.R.H. Fuchs, and J.F. Whitacre (2015) "A techno-economic analysis and optimization of Li-ion batteries for light-duty passenger vehicle electrification," *Journal of Power Sources* v273 p966-980.
  - p. Tamayao, M., J.J. Michalek, C. Hendrickson and I. Azevedo (2015) "Regional variability and uncertainty of electric vehicle life cycle CO2 emissions across the United States," *Environmental Science & Technology*, v49 n14 p8844-8855.
  - q. Weis, A., J.J. Michalek, P. Jaramillo and R. Lueken (2015) "Emissions and cost implications of controlled electric vehicle charging in the US PJM interconnection," *Environmental Science & Technology*, v49 n9 p5813-5819.
  - r. Yuksel, T. and J.J. Michalek (2015) "Effects of regional temperature on electric vehicle efficiency, range, and emissions in the United States," *Environmental Science & Technology*, v49 n6 p3974-3980.
  - s. Haaf, C.G., J.J. Michalek, W.R. Morrow, and Y. Liu (2014) "Sensitivity of vehicle market share predictions to discrete choice model specification," *ASME Journal of Mechanical Design* v136 121402 p1-9.
  - t. Weis, A., P. Jaramillo and J.J. Michalek (2014) "Estimating the potential of controlled plug-in hybrid electric vehicle charging to reduce operational and capacity expansion costs for electric power systems with high wind penetration," *Applied Energy* v115 p190-204.
  - u. Karabasoglu, O. and J.J. Michalek (2013) "Influence of driving patterns on lifetime cost and life cycle emissions of hybrid and plug-in electric vehicle powertrains," *Energy Policy*, v60 p445-461.

- v. Peterson, S. and J.J. Michalek (2013) "Cost effectiveness of plug-in hybrid electric vehicle battery capacity and charging infrastructure investment for reducing US gasoline consumption," *Energy Policy*, v52 p429-438.
- w. Sakti, A., J.J. Michalek, S-E Chun and J.F. Whitacre (2013) "A validation study of lithium-ion cell constant C-rate discharge simulation with Battery Design Studio©," *International Journal of Energy Research*, v37 n12 p1562-1568.
- x. Traut, E., C. Cherg, C. Hendrickson, and J.J. Michalek (2013) "U.S. residential charging potential for electric vehicles," *Transportation Research Part D* v25 p139-145.
- y. Traut, E.J., C.T. Hendrickson, E. Klampfl, Y. Liu, and J.J. Michalek (2012) "Optimal design and allocation of electrified vehicles and dedicated charging infrastructure for minimum life cycle greenhouse gas emissions and cost," *Energy Policy*, v51 pp 524-534.
- z. Michalek, J.J., M. Chester, P. Jaramillo, C. Samaras, C.S. Shiau, and L. Lave (2011) "Valuation of plug-in vehicle life cycle air emissions and oil displacement benefits" *Proceedings of the National Academy of Sciences*, v108 n40 p16554-16558.
- aa. Shiau, C.-S., C. Samaras, R. Hauffe and J.J. Michalek (2009) "Impact of battery weight and charging patterns on the economic and environmental benefits of plug-in hybrid vehicles," *Energy Policy* v37 p2653-2663.
- bb. Shiau, C.-S., J.J. Michalek, and C.T. Hendrickson (2009) "A structural analysis of vehicle design responses to corporate average fuel economy policy," *Transportation Research Part A: Policy and Practice*, v43 p814-828.

6. I also participate in the policymaking process on the legislative side. I have been called on to brief members of Congress and other policymakers regarding light-duty vehicle technologies. For example:

- a. Commentary on Pennsylvania House Bill 1446 for Office of PA Representative Dan Frankel on providing transportation fueling infrastructure development (2018)

- b. Policy Briefing, U.S. House of Representatives on “When, where and which electric vehicles are green?” (2017)
- c. Policy Briefing, National Governors Association on “When, where and which electric vehicles are green?” (2017)
- d. Policy Briefing, U.S. Department of Transportation on “When, where and which electric vehicles are green?” (2017)
- e. Policy Briefing, Office of U.S. Senator Toomey on “When, where and which electric vehicles are green?” (2017)
- f. Policy Briefing, National Resources Defense Council on “Electric Vehicle Benefits and Costs in the United States” and “Electric Vehicle Adoption Potential in the United States” (2016)
- g. Policy Briefing, National Renewable Energy Laboratory on “Electric Vehicle Benefits and Costs in the United States” and “Electric Vehicle Adoption Potential in the United States” (2016)
- h. Policy Briefing, Environmental Protection Agency on “Electric Vehicle Benefits and Costs in the United States” and “Electric Vehicle Adoption Potential in the United States” (2016)
- i. Policy Briefing: California Energy Commission on “Electric Vehicle Benefits and Costs in the United States” and “Electric Vehicle Adoption Potential in the United States” (2015)
- j. Policy Briefing: California Air Resources Board on “Electric Vehicle Benefits and Costs in the United States” and “Electric Vehicle Adoption Potential in the United States” (2015)
- k. Policy Briefing: California State Senate Transportation Committee on “Electric Vehicle Benefits and Costs in the United States” and “Electric Vehicle Adoption Potential in the United States” (2015)
- l. Policy Briefing: California State Assembly Transportation Committee on “Electric Vehicle Benefits and Costs in the

United States” and “Electric Vehicle Adoption Potential in the United States” (2015)

- m. Policy Briefing: Office of State Senator Fran Pavley on “Electric Vehicle Benefits and Costs in the United States” and “Electric Vehicle Adoption Potential in the United States” (2015)
- n. Policy Briefing: California State Assembly Natural Resources Committee on “Electric Vehicle Benefits and Costs in the United States” and “Electric Vehicle Adoption Potential in the United States” (2015)
- o. Policy Briefing, Union of Concerned Scientists on “Electric Vehicle Benefits and Costs in the United States” and “Electric Vehicle Adoption Potential in the United States” (2015)
- p. Policy Briefing, U.S. Congressional Budget Office on “Air Emissions and Oil Displacement Benefits from Plug-in Vehicles” (2012)
- q. Policy Briefing, U.S. Congressional Research Service on “Air Emissions and Oil Displacement Benefits from Plug-in Vehicles” (2012)
- r. Policy Briefing, U.S. Senate Energy and Natural Resources Committee on “Air Emissions and Oil Displacement Benefits from Plug-in Vehicles” (2012)
- s. Policy Briefing, U.S. Senate Commerce, Science and Transportation Committee on “Air Emissions and Oil Displacement Benefits from Plug-in Vehicles” (2012)
- t. Policy Briefing, Office of U.S. Representative Levin on “Air Emissions and Oil Displacement Benefits from Plug-in Vehicles” (2012)
- u. Policy Briefing, National Academy of Engineering, Maxine Savitz, Vice President on “Air Emissions and Oil Displacement Benefits from Plug-in Vehicles” (2012)

- v. National Petroleum Council study on Future Transportation Fuels, Electricity Subgroup (2010-2012)
- w. Policy Briefing, U.S. House of Representatives Energy and Commerce Committee on “Economic, Environmental and Security Implications of Plug-in Vehicles” (2009)
- x. Policy Briefing, U.S. House of Representatives Committee on Science and Technology on “Economic, Environmental and Security Implications of Plug-in Vehicles” (2009)
- y. Policy Briefing, U.S. House of Representatives Select Committee on Energy Independence and Global Warming on “Economic, Environmental and Security Implications of Plug-in Vehicles” (2009)
- z. Policy Briefing, U.S. Congressional Research Service on “Economic, Environmental and Security Implications of Plug-in Vehicles” (2009)
- aa. Policy Briefing, Office of U.S. Senator Specter on “Economic, Environmental and Security Implications of Plug-in Vehicles” (2009)
- bb. Policy Briefing, Office of U.S. Representative Markey on “Economic, Environmental and Security Implications of Plug-in Vehicles” (2009)

7. It is important that the statements I make in these briefings, which influence state and federal policy decisions, are correct and supported by complete and accurate information.

**Need for EPA Data and Analysis to Participate in Regulatory  
Proceedings as a Public Stakeholder**

8. In addition to contributions to academic publications and participation in policy briefings, I also submit public comments to regulatory agencies regarding

proposed actions affecting vehicle policy. Specifically, I have been engaged with the Environmental Protection Agency and Department of Transportation's establishment of and review of light-duty greenhouse gas emission standards for MY2022-2025. For example:

- a. Whitefoot, K., J.J. Michlalek and I. Azevedo (2017) "Comment on [Docket No. NHTSA-2017-0059] Civil Penalties Rate for Violations of Corporate Average Fuel Economy Standards," U.S. Federal Register.  
<https://www.regulations.gov/document?D=NHTSA-2017-0059-0013>.
- b. Whitefoot, K., J.J. Michalek, and I. Azevedo (2017) "Comment on Docket No.: EPA-HQ-OAR-2015-0827 and NHTSA-2016-0068, Reconsideration of the Final Determination of the Mid-Term Evaluation of Greenhouse Gas Emissions Standards for Model Year 2022-2025 Light-Duty Vehicles; and Model Year 2021 Greenhouse Gas Emissions Standards," U.S. Federal Register, <https://www.regulations.gov/document?D=EPA-HQ-OAR-2015-0827-10126>.
- c. Whitefoot, K., J.J. Michalek, and I. Azevedo (2016) "Comment on [Docket No.: EPA-HQ-OAR-2015-0827] Proposed Determination on the Appropriateness of the Model Year 2022-2025 Light-Duty Vehicle Greenhouse Gas Emissions Standards under the Midterm Evaluation,"  
<https://www.regulations.gov/document?D=EPA-HQ-OAR-2015-0827-6163>

9. Being able to assess the technical, economic, energy, environmental, and human health implications of U.S. policies including the federal light-duty vehicle corporate average fuel economy (CAFE) and greenhouse gas (GHG) emissions standards is central to my work. Thus, I have followed and analyzed the development, adoption and implementation of the Model Year (MY) 2012 -2016 (Phase 1 standards) and MY 2017 -2025 light-duty vehicle greenhouse gas

emission and CAFE standards (Phase 2 standards) by the U.S. Environmental Protection Agency and the Department of Transportation.<sup>1</sup>

10. As indicated above, I submitted comments during the public comment period for the EPA action, *Request for Comment on Reconsideration of the Final Determination of the Mid-Term Evaluation of Greenhouse Gas Emissions Standards for Model Year 2022-2025 Light-Duty Vehicles; Request for Comment on Model Year 2021 Greenhouse Gas Emissions Standards*, 82 Fed. Reg. 39551 (Aug. 21, 2017).

11. I understand that in April 2018, without further opportunity for public comment, EPA issued *Mid-Term Evaluation of Greenhouse Gas Emissions Standards for Model Year 2022-2025 Light-Duty Vehicles*, 83 Fed. Reg. 16077 (April 13, 2018) (Revised Final Determination), withdrawing the Final Determination that EPA issued in January 2017, which had determined that the standards were appropriate and did not need to be changed, *Final Determination on the Appropriateness of the Model Year 2022-2025 Light-Duty Vehicle Greenhouse Gas Emissions Standards under the Midterm Evaluation*, January 2017 (EPA-420-R-17-001).

12. In contrast to the record developed to support EPA's January 2017 Final Determination, and the opportunities for public participation that led up to the issuance of that determination, in which I engaged as indicated above, EPA did

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<sup>1</sup> U.S. EPA and DOT, *Light-Duty Vehicle Greenhouse Gas Emission Standards and Corporate Average Fuel Economy Standards*, 75 Fed. Reg. 25324 (May 7, 2010); U.S. EPA and DOT, *2017 and Later Model Year Light-Duty Vehicle GHG and CAFE Standards*, 77 Fed. Reg. 62,624 (Oct. 15, 2012).

not develop a similar record to support the Revised Final Determination. The lack of a substantive technical record accompanying either the Request for Comment or the Revised Final Determination limited my ability to meaningfully participate as a public stakeholder on EPA's decision that the "standards are not appropriate."<sup>2</sup> As noted in my public comment on the Request for Comment, "transparent and rigorous evidence [had] not been provided to support reducing the stringency of the standards."<sup>3</sup>

### **Need for EPA Data and Analysis in Research**

13. To conduct my research, I make use of data and analysis provided by EPA detailing the basis for the level of stringency of the standards, including information on the cost, feasibility, and effectiveness of technologies to reduce vehicle greenhouse gas emissions. I use the data and analysis in the course of performing independent research on the implications of the policy as well as its interactions with other federal, state, and local policies, technology trends, and consumer behavior.

14. For example, in one publication—Jenn, Azevedo and Michalek (2016)—my coauthors and I used and cited the Phase 1 standards, the Phase 2

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<sup>2</sup> 83 Fed. Reg. at 16077.

<sup>3</sup> Whitefoot, K., J.J. Michalek, and I. Azevedo (2017) "Comment on Docket No.: EPA-HQ-OAR-2015-0827 and NHTSA-2016-0068, <https://www.regulations.gov/document?D=EPA-HQ-OAR-2015-0827-10126>.

standards, and the associated Regulatory Impact Analyses to conduct our own independent analysis on the implications of alternative-fuel vehicle incentives in the standards. We are currently conducting a follow-up study, Jenn et al., 2018a,<sup>4</sup> making use of these same data and analyses to investigate the interactions of federal policy with state policy. For the follow-up study we will utilize any comparable data, analysis, interpretation, and justification for modifications to the rule.

15. As mentioned, we are currently pursuing research that extends our prior work (Jenn et al, 2018a) and continues to use and cite agency analysis and rationale. The lack of transparent and rigorous information provided by EPA in its reconsideration of the Mid-Term Evaluation (MTE) for the MY2022-2025 light-duty vehicle standards has hindered our ability to revise this ongoing research in light of the agency's apparently changed views on technology availability, effectiveness, and costs.

16. In contrast to the detailed data and analysis EPA has provided in the past, which we have drawn on to inform our research, the agency's April 2018 Revised Final Determination, which was issued after EPA took public comment on its reconsideration of the MTE, consists of only 11 pages in the Federal Register

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<sup>4</sup> Jenn, A., I.L. Azevedo and J.J. Michalek (2018a) "U.S. alternative-fuel-vehicle policy interactions increase greenhouse gas emissions," in second review, Transportation Research Part A: Policy and Practice.

and lacks substantive agency analysis.<sup>5</sup> Though EPA regulations require that the agency “set forth in detail the bases for [its] determination ..., including [EPA’s] assessment of [seven enumerated] factors,”<sup>6</sup> the Revised Final Determination refers to data and claims submitted in comments by interest groups, without substantive analysis or explanation from EPA sufficient to document the purported bases for EPA’s reversal from its prior technical conclusions.

17. In order to move forward with my research, it is useful for me and my colleagues in academia to have access to the information and analyses related to the cost, feasibility, and effectiveness of technologies to reduce greenhouse gas emissions . In order to conduct a rigorous analysis of the impact of such an action on the automotive industry, consumers, and the economy with the high quality, objectivity, relevance, and contextualization we strive for, I need to review the technology assessments, policy objectives, modeling and other data, and assumptions that contributed to the agency’s decision. Furthermore, I need to see what analysis of that information was conducted by the agency to reach a conclusion. Thus, I am harmed by EPA’s failure to disclose data and analyses related to its reconsideration of the MTE and subsequent Revised Final Determination.

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<sup>5</sup> U.S. EPA, *Mid-Term Evaluation of Greenhouse Gas Emissions Standards for Model Year 2022–2025 Light-Duty Vehicles*, 72 Fed. Reg. 16077 (Apr. 13, 2018).

<sup>6</sup> 40 C.F.R., § 86.1818-12(h)(4).

18. I declare under penalty of perjury that the foregoing is true and correct.

Executed on August 27, 2018



Jeremy Michalek

III.

Declarations of Environmental Defense Fund

6. Dr. Kate Whitefoot, Environmental Defense Fund member

## DECLARATION OF DR. KATE WHITEFOOT

I, Kate Whitefoot, declare as follows:

1. I am an Assistant Professor of Engineering and Public Policy and Assistant Professor of Mechanical Engineering at Carnegie Mellon University. I am a Faculty Affiliate of the Carnegie Mellon Scott Institute for Energy Innovation, which works through the university's academic units to find solutions for the nation's and the world's energy challenges, including pathways to a low carbon future. I am also a member of the NextManufacturing Center for additive manufacturing research. I received my PhD from the University of Michigan in Design Science, with a concentration in mechanical engineering and economics, as well as my M.S. in Mechanical Engineering.

2. I have over 10 years of experience studying light-duty vehicle energy policies, and have given briefings on my research at the U.S. EPA and U.S. House of Representatives. My research has been featured in several major news outlets including the Washington Post, Wall Street Journal, and Businessweek.

3. I am a member of the Environmental Defense Fund. My views are not necessarily representative of Carnegie Mellon University and are not provided on behalf of Carnegie Mellon University or any other organization.

### Expertise and Research Focus

4. As a professor of engineering and public policy, I engage in the study of federal policies relating to vehicles, and their implications for economics, energy, human health, and the environment. I also assess the technical feasibility of such policies and the implications for automobile manufacturers, vehicle part suppliers, and other regulated entities. Access to rigorous government data and analyses is necessary to adequately assess the technical feasibility of policy decisions that impact the auto industry. Much of my research focuses on the influence of policies on engineering design decisions in the automotive industry, so the regulation of greenhouse gas emissions from vehicles is highly relevant to my work.

5. In the context of light-duty vehicles, I have published research that assesses key technical and policy questions in light of the regulatory landscape. For example:

- a. Yip, Arthur, Jeremy J. Michalek, and Kate S. Whitefoot. 2018. "On the Implications of Using Composite Vehicles in Choice Model Prediction." *Transportation Research: Part B*. Forthcoming.
- b. Whitefoot, Kate S., Meredith L. Fowlie, and Steven J. Skerlos. 2017. "Compliance by Design: Influence of Acceleration Trade-Offs on CO2 Emissions and Costs of Fuel Economy and Greenhouse Gas Regulations." *Environmental Science & Technology* 51 (18): 10307–15.
- c. Whitefoot, Kate S., and Steven J. Skerlos. 2012. "Design Incentives to Increase Vehicle Size Created from the US

Footprint-Based Fuel Economy Standards.” *Energy Policy* 41: 402–11.

- d. Whitefoot, Kate S., Hilary G. Grimes-Casey, Carol E. Girata, W. Ross Morrow, James J. Winebrake, Gregory A. Keoleian, and Steven J. Skerlos. 2011. “Consequential Life Cycle Assessment with Market-driven Design.” *Journal of Industrial Ecology* 15 (5): 726–42.
- e. Whitefoot, Kate S. 2011. “Quantifying the Impact of Environmental Policy on Engineering Design Decisions.” PhD Dissertation. University of Michigan.

6. In addition to contributions to academic publications, I also submit public comments to regulatory agencies regarding proposed actions affecting vehicle policy. Specifically, I have been engaged with the Environmental Protection Agency and Department of Transportation’s establishment of and review of light-duty greenhouse gas emission standards for MY2022-2025. For example:

- a. Whitefoot, K., J.J. Michlalek and I. Azevedo (2017) “Comment on [Docket No. NHTSA-2017-0059] Civil Penalties Rate for Violations of Corporate Average Fuel Economy Standards,” U.S. Federal Register. <https://www.regulations.gov/document?D=NHTSA-2017-0059-0013>.
- b. Whitefoot, K., J.J. Michalek, and I. Azevedo (2017) “Comment on Docket No.: EPA-HQ-OAR-2015-0827 and NHTSA-2016-0068 Reconsideration of the Final Determination of the Mid-Term Evaluation of Greenhouse Gas Emissions Standards for Model Year 2022-2025 Light-Duty Vehicles; and Model Year 2021 Greenhouse Gas Emissions Standards,” U.S. Federal Register, <https://www.regulations.gov/document?D=EPA-HQ-OAR-2015-0827-10126>.

- c. Whitefoot, K., J.J. Michalek, and I. Azevedo (2016) "Comment on [Docket No.: EPA-HQ-OAR-2015-0827] Proposed Determination on the Appropriateness of the Model Year 2022-2025 Light-Duty Vehicle Greenhouse Gas Emissions Standards under the Midterm Evaluation,"  
<https://www.regulations.gov/document?D=EPA-HQ-OAR-2015-0827-6163>.

7. I also participate in regular briefings and seminars informing policymakers, NGOs, and policy research groups about light-duty vehicle technologies. For example:

- a. "Compliance by Design: Acceleration Tradeoffs on CO2 Emissions and Costs of Fuel Economy and Greenhouse Gas Regulations," Energy Policy Institute at University of Chicago Seminar Series, Chicago, IL, February 14, 2017.
- b. Policy Briefing, U.S. Senate Commerce, Science and Transportation Committee, 2015.
- c. Policy Briefing, U.S. Department of Commerce, 2015.
- d. "Discussion of the Economics of Attribute-Based Regulation: Theory and Evidence from Fuel-Economy Standards," National Tax Association Spring Symposium (Session on Energy Policy), Washington, DC, May 15, 2014.
- e. "Product design and market responses to footprint-based fuel economy standards," Resources for the Future Workshop on Identifying Research Priorities for the Midterm Review of US Light Duty Vehicle Fuel Economy and Greenhouse Gas Emissions Rate Standards, Washington, DC, December 17, 2013.
- f. Policy Briefing, Environmental Protection Agency, Office of Transportation and Air Quality, Ann Arbor, MI, July 29, 2010.

8. It is very important that the statements I make in these briefings and seminars, which influence the decisions of policy actors, are correct and supported by complete and accurate information.

### **Need for EPA Data and Analysis in Research**

9. In order to conduct my research, as catalogued above, it is necessary that I have access to the information and analysis that forms the basis for and justifies government decisions and policy choices related to the transportation sector. Being able to assess the technical, economic, energy, environmental, and human health implications of U.S. policies including the federal light-duty vehicle corporate average fuel economy (CAFE) and greenhouse gas (GHG) emissions standards is central to my work. Thus, I have closely followed and analyzed the development, adoption and implementation of the Model Year (MY) 2012 -2016 (Phase 1 standards) and MY 2017 -2025 light-duty vehicle greenhouse gas emission and CAFE standards (Phase 2 standards) by the U.S. Environmental Protection Agency and the Department of Transportation.<sup>1</sup> To conduct this research, I make use of data and analysis provided by EPA detailing the basis for the level of stringency of the standards, including information on the cost,

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<sup>1</sup> U.S. EPA and DOT, *Light-Duty Vehicle Greenhouse Gas Emission Standards and Corporate Average Fuel Economy Standards*, 75 Fed. Reg. 25324 (May 7, 2010); U.S. EPA and DOT, *2017 and Later Model Year Light-Duty Vehicle GHG and CAFE Standards*, 77 Fed. Reg. 62,624 (Oct. 15, 2012).

feasibility, and effectiveness of technologies to reduce vehicle greenhouse gas emissions. I use the data and analysis in the course of performing independent research on the implications of the policy as well as its interactions with other federal, state, and local policies, technology trends, and consumer behavior.

10. For example, in one publication, Whitefoot et al. (2017),<sup>2</sup> we assessed the assumptions made by the agency, the estimates calculated by the agency, and the methods of analysis employed by the agency in the Phase 1 Standards, Phase 2 Standards, and the joint technical support document for the MY2017-2025 standards.<sup>3</sup> Without question, it was crucial to our research that we had access to those assumptions, estimates, and methodologies underlying the agency's emission standards. We used and referenced the Phase 1 and Phase 2 standards, and the joint technical support document supporting EPA's 2016 Proposed Determination,<sup>4</sup> to conduct our independent analysis of the influence of the regulations on GHG

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<sup>2</sup> Whitefoot, Kate S., Meredith L. Fowlie, and Steven J. Skerlos. 2017. "Compliance by Design: Influence of Acceleration Trade-Offs on CO<sub>2</sub> Emissions and Costs of Fuel Economy and Greenhouse Gas Regulations." *Environmental Science & Technology* 51 (18): 10307–15.

<sup>3</sup> *Supra* n. 1; U.S. EPA and DOT, Joint Technical Support Document: Final Rulemaking for 2017-2025 Light-Duty Vehicle Greenhouse Gas Emission Standards and Corporate Average Fuel Economy Standards (Aug. 2012), [https://www.nhtsa.gov/sites/nhtsa.dot.gov/files/joint\\_final\\_tsd.pdf](https://www.nhtsa.gov/sites/nhtsa.dot.gov/files/joint_final_tsd.pdf).

<sup>4</sup> Proposed Determination on the Appropriateness of the Model Year 2022-2025 Light-Duty Vehicle Greenhouse Gas Emissions Standards under the Midterm Evaluation: Technical Support Document (November 2016), available at <https://nepis.epa.gov/Exe/ZyPDF.cgi?Dockkey=P100Q3L4.pdf>.

emissions, producer profits, and consumer surplus. In this analysis, we modeled automakers' adoption of various combinations of technologies and other engineering design decisions to comply with the standards. We use information from EPA to inform our specification of the types of technologies that are available to automakers to comply with the standards, the impact the technologies have on fuel economy and GHG emissions, and the costs of incorporating these technologies into their vehicles. While estimates of some of these factors are provided by other organizations<sup>5</sup>, it is generally important for us to have access to EPA's assessment of the accuracy of these estimates because EPA often has access to proprietary information from the industry.

11. We are currently beginning research that extends our prior work (Whitefoot et al., 2017). The lack of transparent and rigorous information provided by EPA in its reconsideration of the Mid-Term Evaluation (MTE) for the MY2022-2025 light-duty vehicle standards stunts our ability to revise this ongoing research in light of the agency's apparently changed views on technology availability, effectiveness, and costs.

12. In contrast to the detailed data and analysis EPA has provided in the past, which we have drawn on to inform our research, the agency's April 2018

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<sup>5</sup> See, e.g., National Research Council. (2015) *Cost, Effectiveness and Deployment of Fuel Economy Technologies for Light-Duty Vehicles*. The National Academies Press.

Final Determination reversing an earlier determination that the Phase 2 standards remain appropriate and do not need to be changed (Revised Final Determination), which was issued after EPA took public comment on its reconsideration of the MTE, consists of only 11 pages in the Federal Register and lacks substantive agency analysis.<sup>6</sup> Though EPA regulations require that the agency “set forth in detail the bases for [its] determination . . . , including [EPA’s] assessment of [seven enumerated] factors,”<sup>7</sup> the Revised Final Determination refers to data and claims submitted in comments by interest groups, without substantive analysis or explanation from EPA sufficient to document the purported bases for EPA’s reversal from its prior technical conclusions. While the Proposed Rule issued subsequent to the Final Determination provides further analysis, it also lacks transparent and rigorous information that is necessary to understand EPA’s determination.

13. In order to conduct my research rigorously with consideration of the most up-to-date information, it is important for me and my colleagues in academia to have access to the information and analyses related to the cost, feasibility, and effectiveness of technologies to reduce greenhouse gas emissions, which was required by regulation to be (but was not) included in former Administrator Pruitt’s

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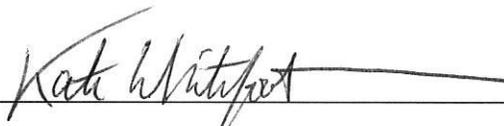
<sup>6</sup> U.S. EPA, *Mid-Term Evaluation of Greenhouse Gas Emissions Standards for Model Year 2022–2025 Light-Duty Vehicles*, 72 Fed. Reg. 16077 (Apr. 13, 2018).

<sup>7</sup> 40 C.F.R. § 86.1818-12(h)(4).

Revised Final Determination concluding that the existing MY2022-2025 standards should be rolled back. In order to conduct a rigorous analysis of the impact of such an action on the automotive industry, consumers, and the economy, I need to review the technology assessments, policy objectives, modeling and other data, and assumptions about consumer behavior that contributed to the agency's decision. Furthermore, I need to see what analysis of that information was conducted by the agency to reach a conclusion. Thus, I am harmed by EPA's failure to disclose data and analyses related to its reconsideration of the MTE and subsequent Revised Final Determination.

I declare under penalty of perjury that the foregoing is true and correct.

Executed on August 27, 2018

  
\_\_\_\_\_  
Kate Whitefoot

III.

Declarations of Environmental Defense Fund

7. Kate Zalzal, Environmental Defense Fund member

## DECLARATION OF KATE ZALZAL

I, Kate Zalzal, declare as follows:

1. I am a member of the Environmental Defense Fund (EDF) and have been a member since 2012.

2. I reside in the town of Lyons, Colorado with my husband and three children.

3. I drive a 2006 Toyota 4Runner, and I am in the market to replace this vehicle. I am hoping to purchase a new car within the next year because my car has not been running smoothly, no longer meets the needs of my family, and no longer contains the attributes we desire in a vehicle. Our family also has a second vehicle, purchased before we had children, that no longer fits our whole family and so it is likely that we will have to replace that vehicle within the next five years as well.

4. We recently welcomed our youngest child to the family in January 2018, and as a mother of three, I need a car that will fit myself, my husband, and all of our children. I also use my vehicle for a variety of purposes that often require me to transport multiple passengers. One of my children attends dance classes, the other plays on a soccer team and goes to practices, and in the summer both of my older children participate in summer camps. I drive our kids to these activities and often participate in carpools with other families who likewise have children in these activities.

5. My family also travels around the Colorado mountains in the summertime and wintertime for camping trips and other vacation activities. We regularly visit my parents, who live in the mountains between Lyons and Estes Park. Driving to these places makes four-wheel drive, all-wheel drive, or other similar features valuable during both the summer and winter.

6. One of my highest priorities in shopping for a new car is high fuel efficiency. Because I often have to drive to surrounding towns, it is important for me to save on fuel costs by driving a car that gets better mileage than my current vehicle, which has a combined city / highway rating of only 17 miles per gallon. I am also concerned about the climate pollution emitted by passenger vehicles, and it is important to me to own a car that releases fewer of these harmful emissions.

7. In light of these vehicle capabilities and attributes that are important to me and my family, I am planning to purchase a minivan, larger SUV, or similar vehicle. My objective is to find a vehicle with high fuel efficiency that will comfortably fit my family and allow us to travel in the mountains during both the summer and the winter.

8. Since I started shopping for a new car, I have realized that there are not many options for minivans or large SUVs with high fuel economy. For instance, the fuel economy of the 4Runner has not improved significantly from Model Year 2006 to the current version. I have considered purchasing a plug-in-hybrid electric

vehicle. However, there is only one plug-in hybrid minivan currently available on the market—the Chrysler Pacifica—and it is not available with four-wheel or all-wheel drive. My husband and I have even discussed purchasing a truck—which is not a vehicle that I am otherwise interested in driving—because, at least one truck—the Ford F-150—can fit our family, offers four-wheel drive, and is equipped with some fuel-saving and greenhouse gas reducing technologies. While the F-150 delivers better fuel economy and fewer emissions than our current vehicle, it is not nearly as efficient as the Pacifica and is less maneuverable with no additional seating for friends and family.

9. The lack of choice of vehicles that meet all of our family’s needs—passenger capacity, fuel economy, decreased air pollution, and all-weather capabilities—limits my options as a consumer and means that it is likely I will be forced to purchase a vehicle that compromises on some of the attributes that are important to me and my family.

10. I am aware that the Environmental Protection Agency and the National Highway Traffic Safety Administration have adopted Clean Car Standards, which require automakers to reduce greenhouse gas emissions and improve the fuel efficiency of new vehicles sold in the United States. I understand that these standards are based on a vehicle’s “footprint,” meaning that for each class of

vehicles—including those we are considering purchasing—the standards require emission reductions and improvements in fuel economy over time.

11. I am aware that during 2015-17, the Environmental Protection Agency conducted a Mid-Term Evaluation of the Clean Car Standards for Model Year (MY) 2022-2025 vehicles, and the agency concluded that the strong standards should remain in place and are achievable by automakers. I am aware that former EPA Administrator Scott Pruitt reconsidered that finding, and that in April 2018 he issued a Revised Final Determination concluding that the Clean Car Standards are “not appropriate,”<sup>1</sup> and announced that EPA would “roll back” the existing standards.<sup>2</sup> Additionally, I am aware that EPA and NHTSA recently issued a proposal that would significantly weaken the requirements for MY 2021-2026 vehicles, so that fuel economy and climate pollution controls would not necessarily improve during that time.<sup>3</sup>

12. I understand that the current greenhouse gas emission standards for light-duty vehicles require automakers to achieve significant improvements during the

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<sup>1</sup> EPA, *Mid-Term Evaluation of Greenhouse Gas Emissions Standards for Model Year 2022-2025 Light-duty Vehicles*, 83 Fed. Reg. 16077 (Apr. 13, 2018).

<sup>2</sup> Scott Pruitt (@EPAScottPruitt), TWITTER (Apr. 3, 2018, 11:39 AM), <https://web.archive.org/web/20180608153304/https://twitter.com/epascottpruitt/status/981239876971565056>.

<sup>3</sup> EPA & NHTSA, Proposed Rule: *The Safer Affordable Fuel-Efficient (SAFE) Vehicles Rule for Model Years 2021-2026 Passenger Cars and Light Trucks*, 83 Fed. Reg. 42986 (Aug. 24, 2018).

MY 2022-2025 period. As I look to purchase a new vehicle in the next year and likely replace our family's other, smaller car in the next five years, my priority is to find vehicles that comfortably hold our family, while achieving high fuel economy and low greenhouse gas emissions. I am concerned that former Administrator Pruitt's action, determining that Clean Car Standards in the 2022-25 timeframe are no longer appropriate, will lead to a weakening of the standards, further limiting the availability of an already limited selection of vehicles that meet my and my family's needs.

13.I declare that the foregoing is true and correct.

Executed August 28, 2018

  
Kate Zalzal

IV.

Declarations of Natural Resources Defense Council

IV.

Declaration of Natural Resources Defense Council

1. Luke Tonachel, Director of the Clean Vehicles and Fuels Project, Natural Resources Defense Council

**UNITED STATES COURT OF APPEALS  
FOR THE DISTRICT OF COLUMBIA**

CENTER FOR BIOLOGICAL  
DIVERSITY., *et al.*,

Petitioners,

v.

UNITED STATES  
ENVIRONMENTAL PROTECTION  
AGENCY,

Respondent.

Case No. 18-1139 (consolidated with cases  
18-1114, 18-1118, 18-1162)

**DECLARATION OF LUKE TONACHEL**

I, Luke Tonachel, state and declare as follows:

1. I am the Director of the Clean Vehicles and Fuels project at the Natural Resources Defense Council (NRDC). I have been employed by NRDC for the past fourteen years. I have personal knowledge of the subject matter of this declaration and, if called as a witness, could and would competently testify as to its contents.

2. I received my Bachelor of Science Degree in Mechanical Engineering from the University of Rochester and my Master of Public Policy Degree from the University of California, Berkeley.

3. I have extensive professional experience working on clean transportation policies at the state and federal level. I have provided detailed technical comments on clean and efficient vehicle regulatory policies,

through proceedings conducted by the Environmental Protection Agency and the National Highway Traffic Safety Administration, as well as at state environmental and utility regulatory agencies. I have conducted detailed analyses of environmental and economic impacts to support comments and testimony before various agencies, and have been a lead author of recent reports including *Supplying Ingenuity II: U.S. Suppliers of Key Clean, Fuel-Efficient Vehicle Technologies* by NRDC and the BlueGreen Alliance, and the *Environmental Assessment of a Full Electric Transportation Portfolio* by NRDC and the Electric Power Research Institute.

4. For decades, a core part of NRDC's work has been decarbonizing and cleaning up transportation sector emissions, through pushing for stronger carbon emission and fuel-economy standards in passenger vehicles and trucks, promoting policies encouraging the adoption of electric vehicles, and advocating for cleaner fuels. Our staff relies on various tools to achieve these goals, ranging from education and advocacy at the state and federal level to litigation.

5. Ensuring strong vehicle greenhouse gas emission standards is an essential part of our work to reduce reliance on petroleum and associated pollution, and to slow climate change. We were key litigants in *Massachusetts v. Environmental Protection Agency*, which affirmed EPA's obligation to regulate greenhouse gas emissions from motor vehicles. We have also been active participants in past EPA rulemakings to develop vehicle greenhouse

gas emission standards, including the following proceedings: *Light-Duty Vehicle Greenhouse Gas Emission Standards and Corporate Average Fuel Economy Standards for Model Years 2012-2016* (Docket No. EPA-HQ-OAR-2009-0472; NHTSA-2009-0059); and *2017 and Later Model Year Light-Duty Vehicle Greenhouse Gas Emissions and Corporate Average Fuel Economy Standards* (Docket No. EPA-HQ-OAR-2010-0799/NHTSA-2010-0131).

6. We supported EPA's Final Determination, issued in January 2017, which concluded that EPA's vehicle greenhouse gas emission standards for model years 2022 to 2025 remained appropriate. The Final Determination was based on years of extensive technical analysis by EPA, including a Technical Assessment Report, which conducted a detailed study of the technology feasibility, manufacturer and consumer costs, pollution benefits, and other factors justifying the standards for model years 2022 to 2025. The Final Determination carefully explained the basis for EPA's conclusion, and covered all the factors required by EPA regulations. In addition, EPA provided ample time for public comment on the Technical Assessment Report and proposed Final Determination, which allowed NRDC time to review supporting technical materials and submit detailed comments.

7. EPA's Revised Final Determination, issued in April 2018, fails to provide the information required by EPA's regulations, which would allow NRDC to fully analyze and comment on EPA's Revised Final Determination and proposal to revise vehicle greenhouse gas emission standards. EPA's

failure to provide the required information includes: failure to provide an updated Technical Assessment Report, or similarly detailed document providing the technical, economic, and environmental basis for EPA's Revised Determination, failure to provide a detailed explanation in the Final Determination covering each of the factors required by EPA's regulations, and failure to supply the new information that warrants EPA's Revised Final Determination.

8. NRDC needs this information for multiple purposes. First, NRDC needs this information in order to conduct a thorough analysis of EPA's Revised Final Determination and EPA's proposed vehicle greenhouse gas emission standards. With our decades of expertise advocating for strong vehicle emissions standards and for the reduction of climate pollution, and with our in-house technical staff and affiliated technical consultants, we are in a unique position to provide detailed technical comments on EPA's regulatory actions regarding vehicle emissions standards, and to push for standards that adequately protect the environment and residents of the United States. We have been able to provide such comments in past proceedings related to vehicle emissions standards. Without the full set of information and opportunity for public comment that is required by EPA's Midterm Evaluation process, it is more difficult to complete our work. If EPA supplies the required information, we can better evaluate the technical, economic, environmental, and other assumptions underlying their proposed

regulatory changes, and can provide better informed and detailed technical comments. Further, because we do not know the full set of information EPA considered in making its Revised Final Determination, we are unable to make a meaningful comparison with the information EPA relies upon in its proposal to rollback clean car standards, or to determine whether the rollback proposal relies on the same information.

9. We also work to advocate for a cleaner transportation sector in other governmental and non-governmental forums. The information and analysis that EPA has failed to disclose may be important to this work as well.

I declare under penalty of perjury that the foregoing is true and correct to the best of my knowledge and belief. Executed on August 28, 2018, in New York, New York.



Luke Tonachel

V.

Declarations of Public Citizen

V.

Declarations of Public Citizen

1. Joan Claybrook, member, former President, and current member of Board of Directors of Public Citizen

IN THE UNITED STATES COURT OF APPEALS  
FOR THE DISTRICT OF COLUMBIA CIRCUIT

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	v.	)	No. 18-1139
		)	
UNITED STATES ENVIRONMENTAL		)	
PROTECTION AGENCY,		)	
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**DECLARATION OF JOAN CLAYBROOK**

1. My name is Joan Claybrook. I am a member of Public Citizen, Inc., as well as being a former president of the organization and a current member of its Board of Directors.

2. Public Citizen is a non-profit consumer advocacy group that represents the interests of its members on a wide range of issues before administrative agencies, courts and legislatures. Public Citizen has long been involved in regulatory issues involving the automobile industry, including issues related to emissions standards regulated by the Environmental Protection Agency (EPA), as well as matters falling

within the regulatory authority of the National Highway Traffic Safety Administration, such as fuel economy and motor vehicle safety. Public Citizen's organizational mission includes advocating for the interests of its members in the availability of clean, safe, and economical motor vehicles.

3. As a member of Public Citizen, I personally share those interests. I have owned an automobile through much of my adult life, and like many other members of Public Citizen, I periodically replace my vehicle. Public Citizen has tens of thousands of members nationwide, and a great many of them purchase new automobiles in any given year.

4. My current car will be nearing the end of its useful life by the early 2020s, and I expect to replace it with a new vehicle in the period covered by the automakers' model years 2022 to 2025.

5. When purchasing a new vehicle, it is important to me as an environmentally responsible consumer concerned about effects of global warming to be able to select one that produces relatively low emissions of greenhouse gases. Such low-emission vehicles are also beneficial to me as a consumer because they tend to achieve emissions reductions in

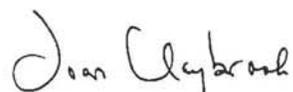
part through increased fuel efficiency, and they are therefore less expensive to operate.

6. The current EPA emissions standards require substantial decreases in greenhouse gas emissions for model years 2022 to 2025 and thus will require automakers to provide a wider range of lower emission vehicles than they would without those standards in place. The existing standards protect my interest, and the interests of thousands of other Public Citizen members, in the availability of a broad selection of low-emission vehicles during those model years.

7. EPA's issuance of a new "mid-term evaluation" finding the existing standards are not "appropriate" because they require too much reduction in emissions threatens the protection of my interests provided by the existing standards. The revision of the standards that EPA's action makes possible would allow automakers to produce a mix of vehicles including more higher-emission and fewer lower-emission vehicles. That would directly affect my interests, and cause me injury, by reducing my ability to choose from among a broad range of low-emission vehicles when I purchase a new car. Many other Public Citizen members are threatened with injury in the same way by EPA's action.

I declare under penalty of perjury that the foregoing is true and correct.

Executed on August 29, 2018.



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Joan Claybrook

V.

Declarations of Public Citizen

2. Christopher Fleming, Public Citizen member

**IN THE UNITED STATES COURT OF APPEALS  
FOR THE DISTRICT OF COLUMBIA CIRCUIT**

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PROTECTION AGENCY,		)
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No. 18-1139

**DECLARATION OF CHRISTOPHER FLEMING**

1. My name is Christopher Fleming. I am a member of Public Citizen, Inc.

2. I am a member of Public Citizen because I support its efforts to advocate for consumer interests, including interests in products that protect people and the environment and save consumers money.

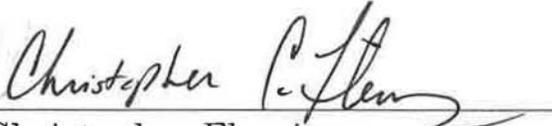
3. My wife and I currently have a 2011 model car that we expect to give to our son, who is now 13, when he is old enough to drive on his own. As a result, we expect to replace that car with a new vehicle sometime in the fall of 2021 or in the next few years after that.

4. When buying a new car, it is important to my family that we choose one that is environmentally friendly and that has lower emissions of greenhouse gases that contribute to global warming. It is also important to us to have a car that gets good gas mileage so that we have to refill it less often and spend less at the pump. When we purchase our next vehicle, we would like a broad range of choices of cars with low emissions and good gas mileage.

5. I believe that government rules that require auto companies to sell lower-emission, higher-mileage vehicles protect my interest in having a wide range of choices of those vehicles when the time comes to buy our new car. For the same reason, rolling back those rules will harm me by limiting my choice of low-emitting, high mileage cars.

I declare under penalty of perjury that the foregoing is true and correct.

Executed on August 28, 2018.

  
Christopher Fleming

VI.

Declarations of Sierra Club

VI.

Declarations of Sierra Club

1. Francis Blake, Sierra Club member

**DECLARATION OF FRANCIS BLAKE**

I, Francis Blake, declare as follows:

1. I live in Houston, Texas, in Harris County. I have lived in Harris County for over 37 years.
2. I am a member of the Sierra Club and have been since 1985. I have held various volunteer leadership positions within Sierra Club at the group and chapter level. I currently serve as the Outings Chair for the Sierra Club Lone Star Chapter's Houston Regional Group.
3. I enjoy engaging in outdoor activities such as biking, walking, hiking, bird watching, and leading Sierra Club outings. I regularly bicycle in the city to do errands and for recreation, and I periodically lead bicycle tours for Sierra Club. I walk outdoors daily, including to Buffalo Bayou Park approximately three to four times a week for personal recreation. I normally lead, approximately, one to two outings per month for Sierra Club, as well as seasonal camping weekends. Destinations for our Sierra Club outings include city and regional parks, and nearby public lands in and around Harris County. During outings we hike, conduct nature education, or work on service projects such as prairie restoration or coastal beach clean ups. I plan to continue engaging in these

outdoor activities in the future. Getting outdoors is extremely important to me and is essential to my wellbeing.

4. I have asthma. I was diagnosed with asthma in approximately 2001.

Throughout the year, I regularly use preventative medication to control my asthma. My asthma has impaired my breathing capacity, and, because of this, I can no longer run like I used to. On some days, poor air quality conditions can even make walking at a fast pace or bike riding difficult for me. Such conditions aggravate my asthma, and force me to limit my outdoor activities, even when I do not want to.

5. Through my involvement with Sierra Club and because of my breathing problems, I am aware that ozone can cause serious health problems, including irritation of the airways, coughing, difficulty breathing, inflammation, increased susceptibility to respiratory illnesses like pneumonia and bronchitis, and permanent lung damage. I am also aware that ozone can affect people with asthma by aggravating this condition. According to the Environmental Protection Agency (EPA), people with asthma, like me, are among the most likely to be adversely affected by ozone pollution. I know that Harris County, Texas is a nonattainment county for ozone under the National Ambient Air Quality Standards, meaning that the ozone levels here are unsafe for my health.

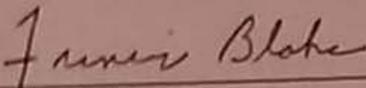
6. Houston's poor air quality impairs my ability to enjoy the outdoors like I want to. I can often tell when ozone levels are elevated as my airways feel more constricted and my breathing becomes more shallow and labored, thereby limiting my oxygen intake and my activity level. I also receive air pollution alerts from my local television and radio stations, as well as their respective websites. When there are severe pollution alerts for ozone, I must take extra precautions in preparing for the day. If I have outdoor activities planned, I prepare by, for example, taking medication earlier than usual, taking a dose more frequently than usual, and ensuring that I take my medication before I go outside. Sometimes, when the air pollution alerts say that the air quality is particularly bad, I am forced to limit my outdoor activities. Houston's poor air quality also forces me and Medicare to spend more money on the medication and medical treatment that I need to control my asthma. I already use strong preventative asthma medication and have had to change medications in the past when they proved inadequate.
  
7. I understand that the transportation industry is a major cause of this dangerous pollution due to the diesel and gasoline combusted by vehicles. This pollution stems in part from fuel production at oil refineries, and I am aware that there are many refineries in Harris County. In addition, according to EPA, the transportation sector is one of the largest emitter of greenhouse gas pollution

that endangers our climate and causes more frequent and severe weather events every year, as well as worsens ozone pollution.

8. I am aware that EPA has issued a decision that the light-duty vehicle regulations issued during the Obama administration to reduce this pollution are no longer appropriate and are going to be rolled-back. I am extremely concerned that weakening these regulations will increase greenhouse gas emissions and ground-level ozone, which will make Houston's air quality worse. If that happens, I am concerned that my asthma will become aggravated with greater intensity and frequency. This will force me to further limit my outdoor activities and to spend more money on medication.
9. I support Sierra Club's lawsuit challenging the EPA's decision that the emission standards for light-duty vehicles issued during the Obama administration are no longer appropriate and need to be revised. I am worried that, if the standards are weakened, these EPA actions will allow the amount of ozone in the air to increase. If the amount of ozone in the air increases, my asthma symptoms will worsen and my well-being will deteriorate.

I declare, under penalty of perjury, that the foregoing is true and correct.

Dated: August 26, 2018.

  
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Francis Blake

VI.

Declarations of Sierra Club

2. Dr. Dolores Leonard, Sierra Club member

**DECLARATION OF DR. DOLORES V. LEONARD**

I, Dr. Dolores V. Leonard, declare as follows:

1. I am a member of Sierra Club, which I joined in 2005 to help with their work on environmental justice. After joining, I volunteered for Sierra Club's Committee on Environmental Justice in its Detroit office, where I conducted research, edited a quarterly newsletter, and helped review permits and draft comments, among other things. As a result of this work, I am familiar with health, environmental, and equity issues in Detroit and the nation.
2. I live in Detroit in zip code 48217 in Wayne County, Michigan. I have lived at my current residence since 1957.
3. My house is surrounded by industrial facilities that emit high amounts of pollution. Wayne County is home to oil refineries, steel mills, and other industrial facilities. I live one mile from the Marathon Detroit HOUP oil refinery. Many of these facilities are located across the street from people's homes and are also close to public schools.
4. I also live close to major highways, including about a half-mile from the I-75, a major north to south interstate highway. Vehicles on these highways and the gas stations that distribute the fuel that power these cars emit soot, as well as other pollution that turns into soot and smog. The air around my house is highly polluted on a regular basis also as a result of high traffic levels in Wayne County.

5. I have asthma, for which I regularly use an inhaler and take medication when my symptoms worsen. I regularly check the news for ozone levels, and refrain from spending time outdoors when air quality is bad. Due to poor air quality, I rarely open the windows of my house. I have to use a central air system, which I do not like, to help with air circulation and to manage my respiratory problems. I have flower and vegetable gardens, but do not tend to them as much as I would like to because I am concerned about air pollution.

6. I also frequently smell foul odors in my neighborhood, which I believe are primarily due to all of the air pollution in the area that is caused by industry and cars on the highways. The smell of kerosene and rotten eggs discourages me from spending time outdoors. The odors are especially strong when driving on the I-75. The stench fills my car, even when the windows are closed, and can linger for days.

7. Zip code 48217—the most polluted zip code in Michigan—is a predominately African American community. Growing up in the Detroit area, I am well aware that communities of color and low-income communities are disproportionately harmed by the health effects of air pollution and emissions from the transportation sector, which is the largest emitter of greenhouse gases in the United States. Wayne County has the highest number of pediatric asthma cases in the state, as well as the highest population living in poverty.

8. I also understand that low-income communities and communities of color, like the community where I live, are disproportionately vulnerable to the threat of climate change. Scientists have estimated that climate change will have large impacts on the Great Lakes region, and there are several cities in this region, including Detroit, which will experience more extreme heat events that will cause myriad health effects, including premature deaths, from climate change. Due to a lack of economic resources and proper healthcare, these communities will be less prepared than others to adapt to climate-related impacts. As climate change worsens, these communities will also bear the burden of spending higher proportions of their income as a result of rising food prices, water scarcity, and increasingly prevalent health issues.

9. I understand that the transportation sector emits more of the country's greenhouse gas emissions than any other sector, making it the largest source of climate pollution. I understand that reducing greenhouse gas emissions will help curb climate change and climate change-related health risks.

10. I am also aware that vehicles and the process of producing fuel for vehicles emits substantial amounts of other harmful air pollution that have significant impacts on human health. I understand that sulfur dioxide and particulate matter pollution from refineries and vehicles can penetrate deep into the lungs and are linked to a range of respiratory problems, including bronchitis and asthma.

Sulfur dioxide can also aggravate existing heart disease, and lead to increased hospitalizations and premature deaths. Researchers have documented numerous deaths, heart attacks, asthma attacks, and other harmful effects from particulate matter pollution, including in my community. I also understand that nitrogen oxides and greenhouse gases contribute to formation of ozone, which also causes respiratory illnesses and premature deaths from heart and lung disease.

11. I understand that the Environmental Protection Agency's (EPA) decision that the emission standards for light-duty vehicles issued during the Obama administration are no longer appropriate will lead to weaker standards—and that will worsen air quality, both in my community and beyond. Because I am over the age of 65 and have asthma, I am more vulnerable to the harmful impacts of air pollution and emissions from vehicles that would result from this regulatory rollback.

12. I am aware that increasing temperatures from extreme heat events can prolong the allergy season and worsen asthma and other respiratory illnesses. I understand that children and the elderly are among the most vulnerable to these climate-related health effects. I am very concerned about the impacts of rolling back the light-duty vehicle standards on my health, the health of my great-grandson, and the health of my community.

13. I understand that sulfur dioxide, nitrogen oxide, and particulate matter pollution from refineries and from vehicles driving the roads, in addition to climate-related changes in air quality due to their greenhouse gas emissions, harm my health, and the health of my family and community. I worry about the negative impacts of continued exposure to poor air quality if the changes to the light-duty vehicle standards worsen air quality.

14. I support Sierra Club's lawsuit challenging the EPA's decision that the emission standards for light-duty vehicles issued during the Obama administration are no longer appropriate and need to be redone. With weaker standards, I worry that my asthma will worsen and my health will be adversely affected. Increased carbon emissions, as well as particulate matter, sulfur dioxide, and nitrogen oxides, will harm my health and wellbeing, as well as my family's health and wellbeing. On the other hand, if the Obama-era standards remain in place, I will benefit from reduced air pollution and improved health.

I declare, under penalty of perjury, that the foregoing is true and correct.

Executed on August 27 2018.

  
Dolores V. Leonard, Ed.D., NCC, LPC

VI.

Declarations of Sierra Club

3. Andrew Linhardt, Deputy Advocacy Director of the Clean Transportation for All Campaign, Sierra Club

## DECLARATION OF ANDREW LINHARDT

I, Andrew Linhardt, declare as follows:

1. I am the Deputy Advocacy Director of the Sierra Club Clean Transportation for All Campaign. I previously held the positions of Legislative Director for Transportation and Associate Director for Legislative and Administrative Advocacy at Sierra Club.

2. In my current role, I manage and coordinate Sierra Club's policies and efforts on behalf of its members to advocate for greenhouse gas reductions and greater fuel efficiency from our nation's fleet. While at Sierra Club, I have worked on numerous matters involving the Environmental Protection Agency's (EPA) greenhouse gas regulations and the National Highway Traffic Safety Administration's (NHTSA) corporate average fuel (CAFE) standards for light-duty and heavy-duty vehicles. My position requires me to be familiar with Sierra Club's purpose and mission, its activities relating to motor vehicles and to air quality (among other things), and the nature and scope of its membership.

3. Sierra Club is a non-profit membership organization incorporated under the laws of the State of California, with its principal place of business in Oakland. Sierra Club's mission is to explore, enjoy and protect the wild places of the Earth; to practice and promote the responsible use of the Earth's resources and ecosystems; to educate and enlist humanity to protect and restore the quality of the

natural and human environment; and to use all lawful means to carry out these objectives.

4. Sierra Club has 784,231 members, according to data last updated in July, 2018. Sierra Club has members who reside in every state and the District of Columbia. These include members living in close proximity to heavily-traveled highways as well as refineries that process the oil powering the vehicles that drive these busy highways. They also include members in states and counties that have been designated non-attainment for ozone and particulate matter, pollution that is caused by vehicles, among other sources. These members have a strong interest in protecting human health and the environment from the air pollution emitted by the transportation sector.

5. As part of carrying out its mission, for decades the Sierra Club has used the traditional tools of advocacy--organizing, lobbying, litigation, and public outreach—to push for policies that decrease air and climate pollution and reduce our nation's dependence on fossil fuels. Sierra Club has a long history of involvement in vehicle regulations aimed at reducing pollution and lessening our dependence on oil as a transportation fuel.

6. Sierra Club has long advocated for climate regulations for vehicles. In 2002, Sierra Club and other organizations filed a lawsuit against EPA asking the agency to regulate greenhouse gases from motor vehicles. EPA settled that lawsuit

and denied the petition in 2003, on the grounds that the agency lacked authority to do so. Sierra Club and numerous states and environmental organizations challenged that denial, ultimately leading to the Supreme Court's decision in *Massachusetts v. EPA*, which held that greenhouse gases are air pollutants subject to regulation under the Clean Air Act. 549 U.S. 497 (2007).

7. The Supreme Court's ruling resulted in EPA's issuance of a finding that six greenhouse gases endanger the public health and welfare of current and future generations, which forms the basis of the agency's greenhouse gas regulations for light-duty and heavy-duty vehicles. *Endangerment and Cause or Contribute Findings for Greenhouse Gases Under Section 202(a) of the Clean Air Act*, 74 Fed. Reg. 66,496 (Dec. 15, 2009).

8. In 2010, EPA and NHTSA jointly issued greenhouse gas emission standards and CAFE standards for light-duty vehicles. *Light-Duty Vehicle Greenhouse Gas Emission Standards and Corporate Average Fuel Economy Standards; Final Rule*, 75 Fed. Reg. 25,324 (May 7, 2010). Sierra Club and others submitted comments on the proposed rule and intervened in the industry's lawsuit challenging the standards. *Coalition for Responsible Regulation, Inc. v. EPA*, 684 F.3d 102 (D.C. Cir. 2012), *rev'd on other grounds sub nom. Utility Air Regulatory Group v. EPA*, 134 S. Ct. 2427 (2014). NHTSA and EPA updated these standards in 2012. EPA established final, binding greenhouse gas standards for MY2017 to

MY2025 light-duty vehicles. *2017 and Later Model Year Light-Duty Vehicle Greenhouse Gas Emissions and Corporate Average Fuel Economy Standards*, 77 Fed. Reg. 62,624 (Oct. 15, 2012).

9. In 2011, NHTSA and EPA adopted CAFE and greenhouse gas standards for heavy-duty trucks, updating these standards in 2016. *Greenhouse Gas Emission Standards and Fuel Efficiency Standards for Medium- and Heavy-Duty Engines and Vehicles; Final Rule*, 76 Fed. Reg. 57,106 (Sep. 15, 2011); *Greenhouse Gas Emissions and Fuel Efficiency Standards for Medium- and Heavy-Duty Engines and Vehicles-Phase 2*, 81 Fed. Reg. 73,478 (Oct. 25, 2016). Sierra Club and others intervened to defend those rules against industry challenges. *Truck Trailer Manufacturers Association v. EPA*, Nos. 16-1430, 16-1447 (D.C. Cir. 2017). Recently, Sierra Club and its allies challenged EPA's final decision not to enforce its regulations of glider vehicles nationwide. *Environmental Defense Fund v. EPA*, No. 18-1190 (D.C. Cir. 2018).

10. Together with other organizations, Sierra Club has in the past challenged NHTSA's CAFE standards for light-duty vehicles for failure to comply with the relevant requirements under the Energy Policy and Conservation Act. *Center for Biological Diversity v. National Highway Traffic Safety Administration*, 538 F.3d 1172 (9th Cir. 2008). More recently, Sierra Club and its allies challenged NHTSA's indefinite delay of a prior rule that adjusted CAFE civil penalties for

inflation, a delay that violated the Federal Civil Penalties Inflation Adjustment Act Improvements Act. *Natural Resources Defense Council v. National Highway Traffic Safety Administration*, 894 F.3d 95 (2d. Cir. 2018).

11. In its 2012 final rule establishing greenhouse gas standards for MY2017-2025 light-duty vehicles, EPA adopted regulations requiring it to undertake a thorough mid-term evaluation of the MY2022-2025 standards before April 1, 2018, in order to determine whether they are still appropriate under Section 202(a) of the Clean Air Act. The mid-term evaluation regulations require EPA to consider the information available on the factors that EPA must consider in setting greenhouse gas standards under Section 202(a) as well as other factors set forth in the regulation. These regulations require EPA to provide an opportunity for public comment before finalizing the evaluation. EPA's determination must be based on a robust record that includes a draft Technical Assessment Report (TAR), public comment on the TAR, and public comment on whether the standards for MY 2022 through 2025 remain appropriate. 40 C.F.R. § 86.1818–12(h).

12. To comply with the mid-term evaluation requirements, in November 2016, then-EPA Administrator Gina McCarthy proposed to determine that the MY 2022-2025 standards remain appropriate and warrant no revision. This proposed determination was based on the TAR, input from the auto industry and other stakeholders, and analyses updated with 2016 data. After receiving over 100,000

public comments, on January 12, 2018, then-Administrator McCarthy finalized EPA's determination that these standards are appropriate, finding that they are feasible at reasonable cost. The agency explained that, based on compliance information collected between MY 2012 and 2015, the auto industry is meeting the standards more quickly than required. The agency also found that the standards will achieve significant carbon dioxide reductions and provide significant benefits to consumers and the public.

13. In March 2017, then-EPA Administrator Scott Pruitt announced that the agency would reconsider its final determination. 82 Fed. Reg. 14,671-72 (Mar. 22, 2017). In August 2017, EPA requested comment on whether the light-duty vehicle greenhouse gas standards are appropriate, but it did not reopen the TAR for public comment. 82 Fed. Reg. 39,551 (Aug. 21, 2017). In April 2018, EPA published a decision asserting that the current standards are based on "outdated" information and that more recent information suggests that the standards may be too stringent. 83 Fed. Reg. 16,077 (Apr. 13, 2018). In a drastic reversal from its findings under Administrator McCarthy, the agency now claims that several key assumptions on which EPA previously relied, such as its predictions about gas prices and consumer acceptance of advanced technology vehicles, were overly optimistic or have significantly changed; and thus the standards need to be revised. EPA's decision failed to follow the robust stakeholder and analytical process

required under the mid-term evaluation regulations and did not explain the agency's departure from the robust technical analyses and public comments that underlie the McCarthy's final determination.

14. As the April 2018 decision and other EPA public statements make clear, the intent of reversing the final determination is to weaken the 2012 standards. Sierra Club and allies oppose such weakening because it would injure Sierra Club members, threatening their health and welfare by increasing emissions of harmful air pollutants such as carbon dioxide, nitrogen oxides, and particulate matter.

I declare under penalty of perjury that the foregoing is true and correct to the best of my knowledge and belief. Executed on August 28, 2018.

  
\_\_\_\_\_  
Andrew Linhardt

VII.

Declarations of Union of Concerned Scientists

VII.

Declarations of Union of Concerned Scientists

1. Jean-Charles Ginestra, Union of Concerned Scientists member

**IN THE UNITED STATES COURT OF APPEALS  
FOR THE DISTRICT OF COLUMBIA CIRCUIT**

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CENTER FOR BIOLOGICAL  
DIVERSITY; CONSERVATION  
LAW FOUNDATION;  
ENVIRONMENTAL  
DEFENSE FUND; NATURAL  
RESOURCES DEFENSE COUNCIL;  
PUBLIC CITIZEN, INC., SIERRA  
CLUB, UNION OF CONCERNED  
SCIENTISTS

*Petitioners,*

v.

UNITED STATES  
ENVIRONMENTAL PROTECTION  
AGENCY,

*Respondent.*

---

No. 18-1139  
(consolidated with Nos.  
18-1114, 18-1118, &  
18-1162)

**DECLARATION OF JEAN-CHARLES GINESTRA**

I, Jean-Charles Ginestra, declare as follows:

1. I have lived in the greater Houston area since 1980. I have a master’s degree and a doctorate in chemical engineering from the University of Houston, and worked for Shell Oil Company in Houston from 1985 to 2015. I am a member of the Union of Concerned Scientists.

2. In 1995, I moved to my current residence in Richmond, Texas, located in Fort Bend County.

3. When I moved to Fort Bend County in 1995, flooding was unheard of, and there were no concerns of or requirements for protecting homes from flood damage. But over the next twenty years, violent storm events became more frequent and severe in Fort Bend County. As a result, flooding became a greater concern to me and my community, especially since our homes were not designed or equipped to handle floods.

4. The federal government also took note of the more frequent storm events and new potential for flooding in Fort Bend County. In 2014 the Federal Emergency Management Agency (“FEMA”) placed my home in the 100-year flood plain, which means that my house is deemed by FEMA to have a one percent risk of flooding every year. As a result, my mortgage company started requiring me to carry flood insurance. I have carried this insurance since 2014, yet this did not prepare me or my home for the destructive force of Hurricane Harvey.

5. In August 2017, Hurricane Harvey struck multiple counties in Texas, killing at least 82 citizens. This severe weather event flooded twenty houses in my subdivision, including my house, which flooded with nine inches of water on August 28, 2017. I had never experienced a flood event before, nor had my house ever been flooded.

6. I spent that night on the second floor of my flooded house with my family, including grandchildren aged six months and two years, two dogs, and two cats. We were evacuated by boat in the morning, since the flood water between my house and the street was two to three feet deep.

7. The total cost of damage to my home was \$150,000. I had to move to a temporary location for four months, and it took six months to rebuild my home. Some of my subdivision neighbors did not fare as well: they were hit with up to 32 inches of water, and have yet to move back into their homes. The emotional toll of Harvey disaster has also been devastating and traumatic.

8. I understand the scientific evidence showing that anthropogenic climate change is exacerbating extreme weather events like Hurricane Harvey, and that the area in which I live is likely to experience increases in extreme weather events – like flooding and hurricanes – that risk damaging my home and neighborhood, and that will continuously drive up my insurance costs. I have no plans to move from the Houston Area.

9. I also understand that we must have policies to help curb our greenhouse gas emissions, so that we can avoid future consequences of climate change. Doing so will help my family and future generations survive some of the financial and emotional costs that my family suffered because of Hurricane

Harvey, especially since even relatively small cuts to global emissions can make a difference in world of extreme weather patterns.

10. Motor vehicle emissions standards are one of the best ways to cut GHG emissions, as transportation is the largest single source of such emissions in the United States. Strong standards not only directly reduce GHG emissions from cars in the United States, but drive innovation world-wide.

11. Without strong standards, climate-destabilizing emissions will continue to increase, which will exacerbate the frequency and severity of extreme weather events and cause further economic and environmental harm to Fort Bend County and other communities. The emissions standards that the Environmental Protection Agency (“EPA”) formally reviewed in 2017 and 2018 are among the most efficacious and important regulations the United States has ever adopted at reducing greenhouse gas emissions; EPA’s decision to formally reexamine these standards makes it much more likely that the agency will ultimately relax the standards, directly environmental hazards to me and my community.

12. I declare under penalty of perjury that the foregoing is true and correct.

Executed in Richmond, Texas on August 28, 2018.

  
\_\_\_\_\_  
Jean-Charles Ginestra, Ph.D.

VII.

Declarations of Union of Concerned Scientists

2. Gregory Kempf, Union of Concerned Scientists member

**IN THE UNITED STATES COURT OF APPEALS  
FOR THE DISTRICT OF COLUMBIA CIRCUIT**

CENTER FOR BIOLOGICAL  
DIVERSITY; CONSERVATION  
LAW FOUNDATION;  
ENVIRONMENTAL  
DEFENSE FUND; NATURAL  
RESOURCES DEFENSE COUNCIL;  
PUBLIC CITIZEN, INC., SIERRA  
CLUB, UNION OF CONCERNED  
SCIENTISTS

*Petitioners,*

v.

UNITED STATES  
ENVIRONMENTAL PROTECTION  
AGENCY,

*Respondent.*

No. 18-1139  
(consolidated with Nos.  
18-1114, 18-1118, &  
18-1162)

**DECLARATION OF GREGORY KEMPF**

I, Gregory Kempf, declare as follows:

1. My name is Gregory Kempf. I am over eighteen years of age, of sound mind, and fully competent to make this declaration. I also have personal knowledge of the factual statements contained herein.

2. I have been a member of the Union of Concerned Scientists continuously since December 28, 2017.

3. I received a bachelor's degree in mechanical engineering from Ohio State University in 1980 and a master's degree in mechanical engineering from Purdue University in 1992. Between 1980 to 2017, I was employed by General Motors, where I designed automatic transmissions for all types of vehicles.

4. I live in Avon, Indiana, a town of approximately 13,000 people west of Indianapolis. Avon lacks well-developed mass transit options such as public busses or rail networks.

5. Driving a car is therefore my normal means of transportation. I drive about 15,000 miles a year for all manner of purposes, including medical and dental appointments, transporting my grandchildren, shopping, recreation, volunteering, voting, and miscellaneous errands. My wife doesn't like driving at night, so I regularly do the family driving. My daughter owns a small knitting and crocheting business, and I occasionally assist her by hauling supplies for special events and delivering orders to the post office. All told, I drive somewhere almost daily.

6. Regular occupants in my vehicle include my wife, my two grandchildren (both toddlers), and my son-in-law.

7. My wife and I have three vehicles: a 2014 Chevrolet Malibu, a 2010 Chevrolet Equinox, and a 2006 Pontiac Solstice. We drive all three vehicles regularly, choosing among them according to our needs for a given trip.

8. It is our intention to replace one of our current vehicles with a new vehicle between 2020 and 2025. We are most likely to replace the 2006 Solstice (a convertible), as it's the oldest and least adaptable to my errands.

9. Because of my wide range of driving activities and varying number of passengers, I will choose a replacement for the Solstice based upon the vehicle's safety record, reliability, passenger space, fuel economy, and initial cost.

10. Fuel economy is among the most important factors I will examine when purchasing a new car, and I am particularly interested in an electric vehicle. I spend almost \$1,800 annually on fuel. Better fuel economy means not only that I will spend less time and money refueling, but also that my car will contribute less to climate change.

11. The mitigation of climate change is vitally important to me, since humans and wildlife are at serious risk as the phenomenon worsens. World-wide, millions are dying prematurely due to the effects of climate change, and future generations will deal with an even more hostile environment.

12. I have followed climate science closely over the past decade, and especially since my retirement in May 2017. My interest in the subject has prompted me to more seriously pursue environmental advocacy, including the creation of a novel about climate change, testimony to the EPA concerning GHGs, and my membership in both UCS and the Citizens' Climate Lobby, both of which

spend significant resources to fight climate change. I've also joined the renewable energy program from my local utility (which raises my utility bills), and I've begun making my five-acre property more heavily wooded by planting about 200 trees.

13. Due to the ever-worsening effects of climate change, it's vital that low GHG emission vehicles are cost competitive with higher emission vehicles, so that low emissions vehicles are purchased in large enough numbers to significantly reduce emissions and mitigate climate change.

14. In short, it is of the utmost importance to me that, when I choose a new car, I have access to the widest array of low emissions technologies, at the lowest costs.

15. The current Corporate Average Fuel Economy Standards ("CAFE") and GHG Standards incentivize automakers to continue the electric vehicle developments that have so far led to relatively affordable cars like the Tesla Model 3, Chevy Bolt, and Nissan Leaf. As I evaluate replacement automobiles, I am interested in future iterations of these cars, and in entirely new models of electric vehicles that have yet to arrive on the market.

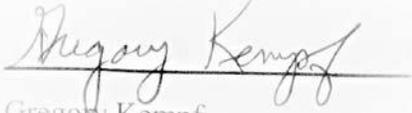
16. As the records undergirding EPA's 2017 and 2018 mid-term evaluations indicate, development of zero emission vehicles has accelerated in response to implementation of the now-operative GHG and CAFE standards. A

firm commitment to the current standards will generate higher demand for low emissions vehicles, increasing the variety of consumer options and driving down prices for those who, like me, value fuel economy or electric vehicles. Conversely, weakening CAFE and GHG standards will lower incentives for automakers to further innovate low emissions vehicles.

17. I am injured by any action that makes it more likely that replacement CAFE and GHG standards will be less stringent than those now in effect, and that would narrow my options for a new vehicle or make those options more expensive.

18. I declare under penalty of perjury that the foregoing is true and correct.

Executed in Sonoma County, California on August 28, 2018.



Gregory Kempf

VII.

Declarations of Union of Concerned Scientists

3. Michelle Robinson, Director, Clean Vehicles Program, Union of Concerned Scientists

IN THE UNITED STATES COURT OF APPEALS  
FOR THE DISTRICT OF COLUMBIA CIRCUIT

CENTER FOR BIOLOGICAL  
DIVERSITY; CONSERVATION  
LAW FOUNDATION;  
ENVIRONMENTAL  
DEFENSE FUND; NATURAL  
RESOURCES DEFENSE COUNCIL;  
PUBLIC CITIZEN, INC., SIERRA  
CLUB, UNION OF CONCERNED  
SCIENTISTS,

*Petitioners,*

v.

UNITED STATES  
ENVIRONMENTAL PROTECTION  
AGENCY,

*Respondent.*

No. 18-1139  
(consolidated with Nos.  
18-1114, 18-1118, &  
18-1162)

DECLARATION OF MICHELLE ROBINSON

I, Michelle Robinson, declare as follows:

1. My name is Michelle Robinson. I am over eighteen years of age, of sound mind, and fully competent to make this declaration. I also have personal knowledge of the factual statements contained herein

2. I am the Director of the Union of Concerned Scientists’ (“UCS”) Clean Vehicles Program. I have served in this role since 2003, and have worked

for UCS since 1992. As a longtime member of the UCS leadership team, I am very familiar with the policies and practices of UCS.

3. UCS was founded in 1969 by scientists and students at the Massachusetts Institute of Technology to conduct scientific and technical analysis and research in the public interest, and to help scientists present their views to all branches of the United States government. Today, UCS works for scientific integrity, a healthy planet, and a more just and safer world. To that end, UCS staff develop and implement innovative, practical solutions to some of our planet's most pressing problems: UCS works to combat global warming; fight misinformation; advance racial equity; reduce the threat of nuclear war; and develop sustainable ways to feed, power, and transport the world's 7.6 billion people.

4. UCS' leadership and supporters number over 500,000 and include strong representation from the scientific community: a majority of UCS' Board members and a large share of the organization's National Advisory Board are scientists. The UCS Science Network – a membership organization within UCS – is made up of over 25,000 scientists who work to educate the public and policy makers about decisions that are critical to human health, global security, safety, and the environment. To be a member of the UCS Science Network, an individual must have or be working towards an advanced degree in the life, physical,

mathematical, or social sciences, medicine or public health, engineering, or otherwise have expertise in science history or science policy.

5. UCS is divided into several programs, including the Clean Vehicles Program. The mission of the UCS Clean Vehicles Program is to reduce oil consumption, greenhouse gas (“GHG”) emissions, and air pollution from the transportation sector, and to increase equitable access to clean, affordable transportation for communities across the nation.

6. UCS created the Clean Vehicles Program in 1990 to advance clean vehicle and fuels policies at the state and federal level, and has been instrumental in enacting legislation and regulation to drive down emissions and transform the way we move people and goods in this country. The Clean Vehicles Program is staffed by dozens of scientists and engineers, policy experts, and outreach and communication specialists in offices across the country.

7. The transportation sector emits almost a third of global greenhouse gases and is a major source of air pollution in the United States. As a result, any policy or rule that helps reduce GHG emissions from the transportation sector – or that lowers the costs or increases the availability of clean vehicles – is critical to the mission of UCS and the Clean Vehicles Program.

8. The UCS Clean Vehicles Program has invested considerable time and resources into legislative and regulatory measures to reduce oil use and

transportation-related global warming emissions. For example, UCS staff advocated for the Energy Independence and Security Act of 2007, which raised the fuel efficiency of America's cars, light trucks, and SUVs to a combined average of at least 35 miles per gallon by 2020, and which required fuel efficiency standards to be set at maximum feasible levels through 2030.<sup>1</sup> In support of these and other regulations, UCS Clean Vehicles staff has spent significant time meeting with agency officials at the Environmental Protection Agency, the National Highway Traffic Safety Administration, and the Office of Management and Budget over the last 25 years.

9. In collaboration with allies in its Clean Cars Coalition, UCS has participated in hundreds of in-person meetings with congressional representatives or their staff and has offered dozens of briefings to the public and Congress.

10. UCS analysts spent significant time quantifying the benefits of the EPA's GHG emissions standards for cars and light trucks through model year 2025. UCS staff found that this regulation, combined with NHTSA's fuel efficiency standards, would cut global warming emissions by 280 million metric

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<sup>1</sup> For example, UCS submitted expert comments to: NHTSA's Notice of Proposed Rulemaking Regarding Average Fuel Economy Standards for Passenger Cars and Light Trucks – Model Years 2011 – 2015, the Proposed Rulemaking for Light-duty Vehicle Greenhouse Gas Emissions Standards and Corporate Average Fuel Economy for Model Years 2012 – 2016, the Draft Technical Assessment Report for the Mid-term Evaluation of Model Year 2022-2025 Light-duty Vehicle Greenhouse Gas Emissions and Fuel Economy Standards, and testimony in response to NHTSA and EPA Proposed Phase 2 Greenhouse Gas Emissions and Fuel Efficiency Standards for Medium- and Heavy-Duty Engines and Vehicles.

tons a year, create an estimated 650,000 jobs in the United States, reduce American oil use by 2.4 million barrels per day, and save a new car buyer about \$6,000 over the lifetime of a new 2025 vehicle. No other federal policy will deliver greater oil savings, consumer benefits, and global warming emissions reductions.

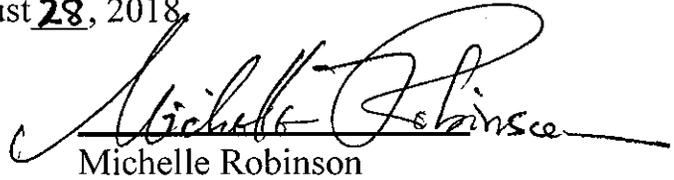
11. The EPA's 2018 mid-term evaluation – including the agency's decision to withdraw the 2017 mid-term evaluation – frustrates the mission of the UCS Clean Vehicles Program, since any weakening of the standard will reduce the planet's ability to curb global warming emissions and oil use, increase transportation-related costs by necessitating additional expenditures on fuel, and reduce accessibility to cleaner and more fuel-efficient vehicles.

12. The 2018 mid-term evaluation process has also injured UCS and the Clean Vehicles Program by truncating the notice-and-comment process contemplated by the Clean Air Act and its implementing regulations. By improperly issuing the 2018 determination without the information and analysis required by law, the Clean Cars program has been unable to fully apprehend EPA's rationale for the decision. In particular, EPA's failure to disseminate information undergirding the 2018 decision – both in the proposed and final determinations – has left UCS unable to share up-to-date information concerning the federal government's regulation of GHG emissions with its technical staff or with its membership. In an effort to better discern the information that EPA improperly

omitted from its 2018 finding – such as the voluminous technical analysis that would have been required to rebut and withdraw the findings of the 2017 finding – UCS has spent significant resources attempting to “reverse engineer” the finding, including by lodging requests under the Freedom of Information Act.

13. I declare under penalty of perjury that the foregoing is true and correct.

Executed in Washington, D.C. on August 28, 2018.



Michelle Robinson

VIII.

EPA Administrator Scott Pruitt (@EPAScottPruitt),  
TWITTER (Apr. 3, 2018, 11:39 AM), archived at  
<https://web.archive.org/web/20180608153304/https://twitter.com/epascottpruitt/status/981239876971565056>



**Administrator Pruitt** ✓

@EPAScottPruitt

Follow



Today, we announced @EPA plans to roll back Obama Admin fuel standards. These standards were inappropriate & needed to be revised. The focus should be on providing consumer choice and the strongest environmental protections.

Catch the full event here 

[m.youtube.com/watch?feature=...](https://m.youtube.com/watch?feature=...)



11:39 AM - 3 Apr 2018

222 Retweets 459 Likes



IX.

EPA Administrator Scott Pruitt (@EPAScottPruitt),  
TWITTER (Apr. 2, 2018, 12:05 PM), archived at  
<https://web.archive.org/web/20180407164951/https://twitter.com/epascottpruitt/status/980883819468386304>

**Administrator Pruitt** ✓

@EPAScottPruitt

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The previous administration's determination was wrong. Obama's EPA cut the Midterm Evaluation process short with politically charged expediency, made assumptions about the standards that didn't comport with reality & set the standards too high. Read more:

12:05 PM - 2 Apr 2018

111 Retweets 208 Likes

398 111 208

**Administrator Pruitt** ✓ @EPAScottPruitt · Apr 2

▼

Cooperative federalism doesn't mean 1 state can dictate standards for the rest of the country. @EPA will set a nat'l standard for GHG emissions that allows auto manufacturers to make cars ppl want & can afford, while still expanding environmental & safety benefits of newer cars.

695 95 196

**CERTIFICATE OF SERVICE**

I hereby certify that on this 7th day of February, 2019, the foregoing Addendum was filed via the Court's CM/ECF system, which will provide electronic copies to all registered counsel.

/s/ Sean H. Donahue