

May 7, 2021

VIA EFILING ONLY

Katie Izzo
Rule Coordinator
Minnesota Pollution Control Agency
Katie.Izzo@state.mn.us

**Re: In the Matter of Clean Cars Minnesota Rulemaking
OAH 71-9003-36416; Revisor R-4626**

Dear Ms. Izzo:

Enclosed herewith and served upon you is the **REPORT OF THE ADMINISTRATIVE LAW JUDGE** in the above-entitled matter. The Administrative Law Judge has determined there are no negative findings in these rules.

The Office of Administrative Hearings has closed this file and is returning the rule record so that the Minnesota Pollution Control Agency can maintain the official rulemaking record in this matter as required by Minn. Stat. § 14.365. Please ensure that the agency's signed order adopting the rules is filed with our office. The Office of Administrative Hearings will request copies of the finalized rules from the Revisor's office following receipt of that order. Our office will then file the adopted rules with the Secretary of State, who will forward one copy to the Revisor of Statutes, one copy to the Governor, and one to the agency for its rulemaking record. The Agency will then receive from the Revisor's office three copies of the Notice of Adoption of the rules.

The Agency's next step is to arrange for publication of the Notice of Adoption in the *State Register*. Two copies of the Notice of Adoption provided by the Revisor's office should be submitted to the *State Register* for publication. A permanent rule with a hearing does not become effective until five working days after a Notice of Adoption is published in the *State Register* in accordance with Minn. Stat. § 14.27.

If you have any questions regarding this matter, please contact Denise Collins at (651) 361-7875, denise.collins@state.mn.us or via facsimile at (651) 539-0310.

Sincerely,



DENISE S. COLLINS
Legal Assistant

Enclosure

cc: Legislative Coordinating Commission
Revisor of Statutes
Joseph Dammel

STATE OF MINNESOTA
OFFICE OF ADMINISTRATIVE HEARINGS

In the Matter of the Proposed
Rules of the Minnesota Pollution
Control Agency Adopting Vehicle
Greenhouse Gas Emissions Standards
(Clean Cars Minnesota), Minnesota Rules
Chapter 7023

**REPORT OF THE
ADMINISTRATIVE LAW JUDGE**

This matter came before Administrative Law Judge Jessica A. Palmer-Denig for rulemaking hearings on February 22 and 23, 2021. To safeguard public health due to the ongoing COVID-19 pandemic, the public hearings were held remotely through an interactive video conference on the WebEx platform.

As explained below, the Minnesota Pollution Control Agency (Agency or MPCA) proposes to amend its administrative rules to adopt vehicle greenhouse gas (GHG) emission standards. This rule is known as the Clean Cars Minnesota Rule. The public hearing and this Report are part of a larger rulemaking process under the Minnesota Administrative Procedure Act.¹ The Minnesota Legislature designed this process to ensure that state agencies meet all of the requirements of law and rule in adopting and amending rules.

The public hearing was conducted to permit agency representatives and the Administrative Law Judge to hear public comments regarding the impact of the proposed rules, and any changes that might be appropriate. Further, the hearing process provides the public an opportunity to review, discuss, and critique the proposed rules, and to ensure a fully developed rulemaking record. In addition to the comments received at the public hearings, the public was permitted to submit written comments into the record.

As described more extensively below, the agency must establish that the proposed rules are needed and reasonable; the rules are within the agency's statutory authority; the agency has fulfilled all procedural requirements; and that any modifications to the rule made after the proposed rules were initially published in the *State Register* are within the scope of the matter that was originally announced.

SUMMARY OF CONCLUSIONS

The MPCA established it has the statutory authority to adopt the proposed rules, it complied with all procedural requirements of law and rule, and that the proposed rules are needed and reasonable. Therefore, the Administrative Law Judge **APPROVES** the proposed rules and recommends they be adopted.

¹ See Minn. Stat. §§ 14.05-.20 (2020).

Based upon all the record, including the Agency's exhibits, and the oral and written comments received, the Administrative Law Judge makes the following:

FINDINGS OF FACT

I. Background Regarding the Proposed Rules

1. The MPCA seeks to amend its rules governing GHG and other air pollution emissions from passenger cars, light-duty trucks, and medium-duty vehicles. Specifically, the MPCA proposes to adopt California's Low Emission Vehicle (LEV) and Zero Emission Vehicle (ZEV) standards, and to create an initial credit bank for crediting manufacturers.²

2. Low-emission vehicles are conventional internal combustion engine (ICE) passenger cars, light-duty trucks, sports utility vehicles (SUVs) and medium-duty vehicles. Zero-emission vehicles are vehicles powered by electricity and have no tailpipe emissions.³

3. The federal Clean Air Act (CAA) prohibits any state from adopting new motor vehicle emission standards that differ from those established under the CAA.⁴ However, the CAA permits the Environmental Protection Agency (EPA) to waive the express preemption of state regulations for the State of California, under section 209(b), and section 177 permits other states to adopt regulations that are identical to those promulgated by California.⁵

4. California developed both the LEV and ZEV standards under its section 209 authority to create two key mechanisms for reducing emissions from vehicles: first, reducing emissions from ICE passenger cars, light-duty trucks, and medium-duty vehicles; and second, increasing the proportion of ZEVs that produce no emissions from the tailpipe.⁶

5. California has adopted LEV standards in stages covering different time periods, labeled as LEV I, LEV II, and the current version, LEV III, which covers Model Years (MY) 2015-2025.⁷ The MPCA proposes to adopt the LEV III standards.⁸ California adopted the ZEV standard in 1990.⁹

6. At the time that this proceeding was filed, California's LEV standard governed in 14 states and the District of Columbia, and the ZEV standard applied in 12

² Exhibit (Ex.) D at 8, 12-13 (SONAR).

³ *Id.* at 11-12.

⁴ See 42 U.S.C. § 7543(a) (2018).

⁵ 42 U.S.C §§ 7507, 7543(b)(2) (2018).

⁶ Ex. D at 11. Electric vehicles (EVs) include battery electric vehicles (BEVs), plug-in hybrid electric vehicles (PHEVs), and hydrogen-fueled vehicles. *Id.* at 12. PHEVs are considered "transitional zero emission vehicles" or "TZEVs" in California's regulatory language, although TZEV is not a commonly used term. The MPCA notes that the terms TZEV and PHEV are synonymous, but that it has used PHEV for consistency throughout this rulemaking. *Id.* at 12, n.10.

⁷ *Id.* at 22.

⁸ *Id.* at 8.

⁹ *Id.* at 22.

states.¹⁰ During the pendency of this matter, the State of Virginia also adopted the LEV and ZEV standards.¹¹ States that have adopted these standards are referred to as “Section 177 states.”¹²

7. Both the LEV standard and the federal standard are tailpipe emissions standards for GHGs and other air pollutants. A tailpipe emissions standard requires vehicles to emit less than a maximum amount of a given pollutant per mile and is usually written as grams per mile. California certifies vehicles as meeting the LEV standards while the federal government certifies vehicles to meet the federal standards.¹³

8. Until 2020, California’s LEV standard was identical to the federal standard.¹⁴ However, on April 30, 2020, the EPA published its final Safer Affordable Fuel-Efficient (SAFE) Vehicles rule.¹⁵ That rule rolls back the federal GHG emission standards for passenger cars and light-duty trucks that were finalized in 2012, and sets new, less stringent GHG emissions standards for MY 2021-2026.¹⁶

9. The MPCA maintains that the EPA’s SAFE Vehicles rule reduces environmental protections, impedes Minnesota’s ability to address GHG emissions and climate change, and conflicts with the MPCA’s mission to protect and improve the environment.¹⁷

10. The MPCA states that, in light of the federal government’s actions, adopting the California LEV standard is necessary to avoid erosion of environmental gains in Minnesota. The MPCA asserts that the proposed rule will allow Minnesota to maintain the current GHG emissions standards and continue to receive the anticipated benefits it has relied on to help it achieve its emission reduction goals.¹⁸ The MPCA further states that the ZEV standard will help put the state on a path toward the levels of EV adoption that will eventually be necessary to meet Minnesota’s GHG emission reduction goals.¹⁹

11. The MPCA notes that in 2007, the Minnesota Legislature passed the bipartisan Next Generation Energy Act (NGEA), which set goals for Minnesota to achieve

¹⁰ *Id.* at 8, 22. Colorado, Connecticut, Maine, Maryland, Massachusetts, New Jersey, New York, Oregon, Rhode Island, Vermont, and Washington have adopted the LEV and ZEV standards, while Delaware, Pennsylvania, and the District of Columbia have adopted only the LEV standard. *Id.* at 22.

¹¹ Va. Code Ann. § 10.1-1307.04 (2021); see also Governor Northam Signs Key Bills into Law, <https://www.governor.virginia.gov/newsroom/all-releases/2021/march/headline-893938-en.html> (press release announcing signing of Virginia law on March 19, 2021).

¹² Ex. D at 22.

¹³ *Id.* at 11.

¹⁴ California and the federal government harmonized the LEV standards in 2012. *Id.* at 22.

¹⁵ *Id.* at 8, 11, 19; See U.S. Dep’t of Transportation & Env’tl Prot. Agency, Notice of Final Rule: The Safer Affordable (SAFE) Vehicles Rule for Model Years 2021–2026 Passenger Cars and Light Trucks, 85 FR 24174 (Apr. 30, 2020).

¹⁶ Ex. D at 8, 11, 19; See U.S. Dep’t of Transportation & Env’tl Prot. Agency, Notice of Final Rule: The Safer Affordable (SAFE) Vehicles Rule for Model Years 2021–2026 Passenger Cars and Light Trucks, 85 FR 24174 (Apr. 30, 2020).

¹⁷ Ex. D at 20.

¹⁸ *Id.* at 11.

¹⁹ *Id.* at 9.

significant GHG emission reductions over the next decades to address this complex global challenge.²⁰ The NGEA provides that Minnesota should reduce its GHG emissions 15 percent by 2015, 30 percent by 2025, and 80 percent by 2050, as compared to 2005 levels.²¹ Minnesota did not meet its 2015 goal and is not on track to meet its 2025 or 2050 goals. To achieve these goals, Minnesota must reduce additional emissions from major sources.²²

12. The transportation sector is now the largest emitter of GHGs in Minnesota, accounting for a quarter of overall GHG emissions in the state.²³ In 2019, the Minnesota Department of Transportation (MnDOT), in collaboration with the MPCA and other state agencies, conducted public meetings and engaged in research to determine ways that Minnesota can reduce GHG emissions from transportation. MnDOT published a study, “Pathways to Decarbonizing Transportation in Minnesota,” (Pathways Report) finding that action is needed across many areas of transportation, such as reducing emissions from gasoline and diesel vehicles, transitioning to electricity and biofuels as vehicle energy sources, and reducing vehicle miles traveled. The Pathways Report recommended adopting the LEV and ZEV standards.²⁴

13. According to the MPCA, it is imperative that Minnesota target emission reductions in the transportation sector to reduce the state’s overall emissions.²⁵ The MPCA anticipates the proposed rule will be an incremental, but integral, step needed for Minnesota to achieve its GHG emission reduction goals and to address Minnesota’s contribution to climate change.²⁶ The MPCA asserts that by targeting GHG emissions and increasing the adoption of EVs, the Clean Cars Minnesota Rule will reduce air pollution, protect public health, and advance environmental justice.²⁷

14. The MPCA proposes to adopt both California’s LEV and ZEV standards in order to reduce motor vehicle emissions and accelerate the adoption of EVs. The proposed Clean Cars Minnesota Rule incorporates the California regulations by reference, as amended, to ensure the standards are identical to California’s and, therefore, comply with the CAA.²⁸

15. The proposed rule will require automobile manufacturers to deliver for sale in Minnesota only passenger cars, light-duty trucks, medium-duty vehicles, and medium-duty passenger vehicles that are certified by California as meeting the LEV standard. Manufacturers must meet average emission requirements for the entire fleet of vehicles

²⁰ *Id.* at 15; 2007 Minn. Laws ch. 136, art. 5, § 1.

²¹ See Minn. Stat. § 216H.02, subd. 1 (2020).

²² Ex. D at 8.

²³ *Id.* at 8, 16. The MPCA notes that Minnesota has seen a reduction of 30 percent in emissions from electricity generation, but that Minnesota has not seen similar action in the transportation sector. *Id.* at 15.

²⁴ Ex. D. at 8, 20; Pathways Report at 7, <https://www.dot.state.mn.us/sustainability/docs/pathways-report-2019.pdf>.

²⁵ Ex. D at 8.

²⁶ *Id.* at 18.

²⁷ Public Hearing Transcript Volume (Tr. Vol.) I at 32 (Feb. 22, 2021).

²⁸ Ex. D at 11.

they deliver for sale in Minnesota, and there are separate fleet-wide emission standards for each of the different categories of vehicles.²⁹

16. The ZEV standard requires a certain percentage of the passenger cars and light-duty trucks that each automobile manufacturer delivers for sale in Minnesota annually to be vehicles with zero tailpipe emissions, including BEVs, PHEVs, and hydrogen-fueled vehicles.³⁰

17. Adoption of the ZEV standard is intended to reduce emissions by encouraging consumers to purchase EVs rather than higher-emitting vehicles. The proposed rule would increase the percentage of EVs delivered for sale in Minnesota, improving options for Minnesotans who want to purchase an EV, and for Minnesotans who might consider purchasing an EV if more were available. The proposed rule does not require any Minnesotan to purchase an EV or prohibit the sale of ICE vehicles in Minnesota.³¹

18. The ZEV standard relies on a credit system under which different vehicles are accorded varying numbers of credits. For instance, long-range BEVs receive the most credits (up to 4 per vehicle) while PHEVs with short electric ranges receive the fewest. Regular (non-plug-in) hybrids and highly efficient ICE vehicles do not receive any ZEV credits.³²

19. Manufacturers are given ZEV credit percentage quotas, and the quotas increase every year until MY 2025, after which the quota remains constant.³³ To comply with the ZEV standard, the MPCA estimates that EVs would need to make up approximately 6.2-7.4 percent of manufacturers' light-duty vehicle sales in Minnesota during the 10-year time frame spanning MY 2025 to 2034.³⁴

20. The LEV standard allows manufacturers to demonstrate compliance across California and all Section 177 states combined. The proposed rule would adopt a different crediting approach for ZEVs, requiring that all credits to meet the requirement must be generated by vehicles delivered for sale in Minnesota.³⁵

21. The proposed rule also establishes an initial credit bank with two components: (1) manufacturers may earn early-action credits for ZEVs delivered to Minnesota starting in MY 2022 and until the beginning of the first effective model year; and (2) manufacturers will receive a one-time allotment of ZEV credits equivalent to the credit requirements for the first effective model year of the rule.³⁶ The MPCA believes establishing an initial ZEV credit bank to be used beginning in the first effective model

²⁹ *Id.* at 12.

³⁰ *Id.*

³¹ *Id.* at 12-13, 43.

³² *Id.* at 13.

³³ *Id.*

³⁴ *Id.* at 43.

³⁵ *Id.* at 13.

³⁶ *Id.*

year is an important component of implementing the ZEV standard and providing flexibility for manufacturers in the early years of implementation.³⁷

22. The MPCA asserts adoption of these standards is needed to combat climate change by reducing GHGs. The MPCA notes that Minnesota is already seeing the effects of a changing global climate.³⁸ Minnesota's temperatures have increased, especially in winter, and Minnesota is experiencing larger, more frequent extreme precipitation events.³⁹ Research indicates even warmer winters and larger rainfalls due to climate change are expected in the years ahead.⁴⁰ Climate change is driven by GHG emissions from human activity.⁴¹

23. The MPCA also maintains that the proposed rule would reduce tailpipe emissions of other harmful air pollutants, including particulate matter (PM) and the pollutants that form ground-level ozone, which directly affect the health of Minnesotans. In June of 2019, in collaboration with the Minnesota Department of Health (MDH), the MPCA released a report titled, "Life and breath: How air pollution affects health in Minnesota" (Life and Breath Report).⁴² This report showed that fine particles in ground level ozone contributed to roughly 2,000 to 4,000 deaths and hundreds of increased hospital visits in Minnesota in 2013, which was the most recent data at the time.⁴³ The MPCA's research showed that communities of color and lower income communities are disproportionately located near busy roadways and exposed to pollution from vehicles. The MPCA asserts that reducing emissions from vehicles is necessary to reduce air pollution exposure to these communities and advance environmental justice for these communities in particular.⁴⁴

24. The MPCA initially estimated that the proposed rule would result in annual reductions of 637 tons of PM and 998 tons of nitrogen oxides (NOX) and non-methane organic gases (NMOG) in 2034.⁴⁵ The Agency further estimated that the proposed rule would reduce 3,245 tons of PM and 6,059 tons of NMOG + NOX during the first 10 years of implementation.⁴⁶

25. At one of the public hearings in this matter, the MPCA announced that its analysis of PM reductions in the SONAR and related Technical Support Document (TSD) contained a transcription error.⁴⁷ Instead of employing a .003 grams per mile and a .001 grams per mile standard in its analysis, the MPCA used a .03 grams per mile and a

³⁷ *Id.*

³⁸ *Id.* at 8.

³⁹ *Id.* at 8, 14.

⁴⁰ *Id.* at 8, 14.

⁴¹ *Id.* at 8, citing *Intergovernmental Panel on Climate Change, Summary for Policymakers*, 4 (2018), https://www.ipcc.ch/site/assets/uploads/sites/2/2019/05/SR15_SPM_version_report_LR.pdf.

⁴² Ex. D at 8, 19; see also "Life and breath: How air pollution affects health in Minnesota," David Bael and Kathy Raleigh, <https://www.pca.state.mn.us/air/life-and-breath-report>.

⁴³ Ex. D at 19.

⁴⁴ *Id.* at 8, 19.

⁴⁵ *Id.* at 79.

⁴⁶ *Id.*; Appendix 1 at 21-22, 27-30 (Technical Support Document).

⁴⁷ Public Hearing Tr. Vol. II at 250-51 (Feb. 23, 2021); Ex. O (Addendum to SONAR, Feb. 2021).

.01 grams per mile standard.⁴⁸ Following the hearing, the MPCA filed an addendum to the SONAR describing and correcting the error.⁴⁹ Using the corrected figures, the MPCA now estimates the proposed rule will reduce tailpipe emissions of PM by 552 tons over the first ten years of implementation, with a reduction of 106 tons of PM in 2034.⁵⁰ This correction also reduces the estimated health and equity benefits of the proposed rule.⁵¹

26. Though the transcription error impacts the scale of PM reduction benefits estimated in MPCA's analysis, the MPCA asserts it does not change the overall conclusion reached by the Agency that the proposed rule will reduce negative health impacts.

II. General Issues Regarding the Review of the Proposed Rules

27. This rulemaking matter has proceeded according to statutes and rules governing the process for the adoption or amendment of rules following a public hearing.⁵² The process is intended to fulfill one of the purposes of the Minnesota Administrative Procedure Act, as identified by the legislature in Minn. Stat. § 14.001 (2020), which is to increase public participation in the formulation of administrative rules.⁵³ A rulemaking proceeding that includes one or more public hearings, in addition to a period for submission of written comments, offers an opportunity for members of the public to participate in the rulemaking process. In this matter, members of the public and organizations with an interest in the outcome of this proceeding submitted over 10,000 comments for consideration, and over 30,000 signatures on petitions supporting and opposing the rule.

28. Some commenters objected to the rulemaking process in this case based on their belief that the rulemaking is related to, or arises from, an exercise of emergency powers authorized for Minnesota's governor due to the ongoing COVID-19 pandemic.⁵⁴ This rulemaking matter has been conducted under a long-standing process created and authorized by the Minnesota Legislature. Many of the statutes and rules governing this process have been in place for decades.⁵⁵ The process used in this case does not arise

⁴⁸ Tr. Vol. II at 251; Ex. O.

⁴⁹ Ex. O.

⁵⁰ *Id.* at 3.

⁵¹ *Id.* at 6-7.

⁵² Ex. D at 9; Minn. R. 1400.2000-.2240 (2019). In Minnesota, rules may be adopted without a public hearing, some rulemakings are exempted from the full rulemaking process, and some rules are authorized for adoption according to an expedited process. See Minn. Stat. §§ 14.22, .385, .389 (2020).

⁵³ Minn. Stat. § 14.001(5).

⁵⁴ Comments of Jason Gorr (“[T]he Governor is attempting to circumvent the proper process and take advantage of his highly contested and progressively tyrannical ‘Emergency Powers.’”); Comments of Kevin Kahler (“Mr. Walz is going around our legislature to do this under his Covid powers.”); Comments of Jason Davidson (“Ramming through this massively-impactful policy outside of the legislature, and deterring public debate by hiding behind Covid-19, is weak.”); Comments of Bob Guggenberger (“I strongly oppose the proposed [rule] for many reasons beginning with the implementation process. When did Minnesota cease being a democracy? It is time for our Governor to give up his emergency powers and return legislative duties back to our elected representatives.”); Gregory Swanstrom (“And this should be Legislation that comes from the Legislative branch and not an Executive Order.”).

⁵⁵ See, e.g., Minn. Stat. §§ 14.131-14.20.

from the exercise of emergency powers. The only adjustment made due to the pandemic was the use of remote, rather than in-person, hearings to protect public health.

29. Some commenters expressed concerns about the role of the Administrative Law Judge in the rulemaking process.⁵⁶ Again, the legislature has established in statute each step of the rulemaking process, the notices that must be made, and the legal standards to be applied. According to the legislature's directives and rules promulgated to effectuate those directives, the Administrative Law Judge must consider the legality of the rule, including whether the MPCA has authority to adopt the rule, whether the agency has fulfilled all procedural requirements, and whether the agency has established that the rule is needed and reasonable.⁵⁷ It is important to note that an administrative law judge's order approving a rule does not actually adopt a rule; rather, final adoption of a rule is undertaken by the agency following publication of a notice of adoption.⁵⁸

30. Further, in some cases, rules undergo an additional review process beyond that conducted by an administrative law judge. For example, if an administrative law judge finds that a rule contains defects that prevent adoption, the matter is automatically subject to review by the Chief Administrative Law Judge.⁵⁹ If an agency wishes to adopt a rule without correcting identified defects, it may submit the proposed rule to the Legislative Coordinating Commission and the Minnesota house and senate committees with primary jurisdiction over state governmental operations to obtain advice and comment.⁶⁰ Additionally, the validity of a rule is subject to judicial review.⁶¹

31. Many commenters expressed concerns that the MPCA has undertaken a rulemaking rather than seeking enactment of a state law to accomplish its goals. These commenters contend that an issue such as this one should be debated and decided by the Minnesota Legislature, and not promulgated by rule.⁶² These concerns are appropriately addressed to the MPCA and to Minnesota's elected officials. But the legal review to be conducted in this case does not permit the Administrative Law Judge to opine on whether a particular issue should be decided through a different process. The choice of whether to pursue legislation or proceed with a rulemaking is committed to the agency, here the MPCA. Once the agency has made a choice to pursue rulemaking, the Administrative Law Judge's role is to ensure that the agency acts lawfully. The rulemaking review standards do not contemplate disapproval of a rule that falls within the MPCA's

⁵⁶ See, e.g., Comments of Richard Thielen ("The final insult is for this process to be decided by a single administrative law judge, an [un]elected bureaucrat and political appointee. The administrative law judge will simply decide [sic] the appropriateness and legality of the rulemaking process, thus simply 'rubberstamp' the [California Air Resource Board] regulations into law with no citizens or elected Representative input and 'Zero' recourse to its final implementation.").

⁵⁷ Minn. Stat. 14.50-.51; Minn. R. 1400.2100 (2019)

⁵⁸ Minn. Stat. §§ 14.16, subd. 1, .18, subd. 1.

⁵⁹ Minn. Stat. § 14.15, subd. 3.

⁶⁰ *Id.*, subd. 4.

⁶¹ Minn. Stat. § 14.14.

⁶² See, e.g., Comments of Terry Cook, Guy Caruso, Rachel Daberkow, Jerome Grudem, Economic Development Authority in and for the City of Marshall, Laurentian Chamber of Commerce, Lyon County Board of Commissioners, Minnesota Rural Counties, Minnesota Soybean Growers Association, Pipestone County Board of Commissioners.

authority based upon the preference expressed by some commenters for legislative action.

III. Rulemaking Authority

32. Under Minn. Stat. § 116.07, subd. 2(a) (2020), the Minnesota Legislature directed that the MPCA shall “adopt standards of air quality, including maximum allowable standards of emission of air contaminants from motor vehicles,” recognizing that no single standard of purity of air is applicable to all areas of the state.

33. Minn. Stat. § 116.07, subd. 4(a) (2020) authorizes the MPCA to engage in rulemaking pursuant to Chapter 14 to adopt rules and standards “for the prevention, abatement, or control of air pollution.” The statute further provides as follows:

Without limitation, rules or standards may relate to the *sources or emissions of air contamination or air pollution*, to the quality or composition of such emissions, or to the quality of or composition of the ambient air or outdoor atmosphere *or to any other matter relevant to the prevention, abatement, or control of air pollution.*⁶³

34. GHGs are “air contaminants” under Minnesota law.⁶⁴ GHGs are also considered a “air pollutant” under existing rules promulgated by the MPCA.⁶⁵

35. Commenters supporting and opposing the proposed rule filed comments addressing the MPCA’s authority under state law to adopt the LEV and ZEV standards. In particular, a group of 26 members of the Minnesota Senate filed a comment opposing the rule. These Senators contend that the MPCA lacks rulemaking authority in this matter because Minn. Stat. § 116.07 was enacted in 1967 as part of the enabling legislation creating the MPCA, and that at the time of enactment, state agency rulemaking authority was not as developed or comprehensive as it is today. The commenting Senators contend that the 1967 legislature could not have intended to authorize the MPCA to adopt rules in the manner proposed here, and that doing so robs the legislature of its authority to enact public policy legislation.⁶⁶

36. Another group made up of 58 members of the Minnesota Senate and House of Representatives filed a comment supporting adoption of the rule. They maintain that the MPCA has clear authority to adopt the proposed rules, and opine that the proposed rules are consistent with the “legislatively mandated” statewide goal for GHG reductions established by the NGEA. These legislators further state that:

⁶³ Minn. Stat. § 116.07, subd. 4(a) (Emphasis added.).

⁶⁴ See Minn. Stat. § 116.06, subd. 2 (2020) (defining “air contaminant” to include the presence in the outdoor atmosphere of any vapor, gas, or other gaseous, fluid, or particulate substance differing in composition from or exceeding in concentration the natural components of the atmosphere.).

⁶⁵ Minn. R. 7005.0100, subp. 14a (2019) (defining GHGs as “the air pollutant defined as the aggregate group of six greenhouse gases: carbon dioxide, nitrous oxide, methane, hydrofluorocarbons, perfluorocarbons, and sulfur hexafluoride.”).

⁶⁶ Comments of 26 Members of the Minnesota Senate.

This language was adopted in 1967, which means that the Minnesota House and Senate have had 54 regular sessions in which we could have reconsidered and agreed upon a repeal or amendment of this section of law. We have not done so, and additionally note that the entire 2020 regular session as well as seven special sessions have occurred subsequently to MPCA's initial request for comment on the proposed Clean Cars Minnesota rules in October 2019. The Legislature has had ample opportunity to enact statutory changes in response to this administrative action and has not done so.⁶⁷

37. The legislature has established that “[t]he object of all interpretation and construction of laws is to ascertain and effectuate the intention of the legislature.”⁶⁸ Every law must be construed, if possible, to give effect to all of its provisions,⁶⁹ and it is presumed that the legislature intends the entire statute to be effective and certain.⁷⁰

38. Under Minn. Stat. § 116.01 (2020), the legislature determined that the public interest required that the MPCA be established, in part to address the “variety and complexity” of problems related to air pollution. Under Minn. Stat. § 116.07, subds. 2(a), (4)(a), the MPCA is directed to adopt standards of air quality, expressly including motor vehicle emissions standards, and it has authority to adopt rules and standards having the force of law to address air pollution. The rulemaking authorization specifically states that “[w]ithout limitation, rules or standards may relate to sources or emissions of air contamination or air pollution . . . or to any other matter relevant to the prevention, abatement, or control of air pollution.”⁷¹ The rules proposed here regulate vehicle tailpipe emissions, requiring LEVs to meet the California standards and promoting greater availability of ZEVs in Minnesota; these regulations do not set “a single standard of purity of air . . . applicable to the entire state.”⁷² Under the plain language of these provisions, the MPCA has the statutory authority under Minnesota law to adopt the proposed LEV and ZEV emission standards.

39. Even so, the MPCA may only adopt vehicle emission standards consistent with the federal CAA. The CAA prohibits states from adopting emission standards for motor vehicles that are different from those established under the CAA, except that states may adopt California's rules pursuant to section 209(b).⁷³ Under that section, California is authorized to adopt its own more stringent motor vehicle emission with a waiver from the EPA. Under section 177, other states may choose to adopt California's emissions standards instead of the federal standards, so long as the adopting state has maintenance or nonattainment “plan provisions” approved by EPA.⁷⁴ Minnesota has

⁶⁷ Comments of 58 Members of the Minnesota Senate and House of Representatives.

⁶⁸ Minn. Stat. § 645.16 (2020).

⁶⁹ *Id.*

⁷⁰ Minn. Stat. § 645.17(2) (2020).

⁷¹ Minn. Stat. 116.07, subd. 4(a).

⁷² *Id.*, subd. 2(a); see Comments of Minnesota Automobile Dealers Association (MADA) (contending that the proposed rule adopts a single, statewide air quality standard and asserting that MPCA lacks authority to adopt the proposed rule).

⁷³ See 42 U.S.C. § 7543 (2018).

⁷⁴ 42 U.S.C. § 7507.

nonattainment and maintenance plans approved by the EPA, therefore Minnesota meets this requirement.⁷⁵

40. Further, states may adopt emissions standards permitted under section 209(b) only if “such standards are identical to the California standards for which a waiver has been granted for such model year.”⁷⁶ The MPCA proposes to incorporate California’s standards by reference, as amended, ensuring that Minnesota’s regulations will be identical to the California standards. Manufacturers will be required to meet the same certification and fleet emission standards in Minnesota that they meet in California and the other Section 177 states under the LEV standard. Likewise, manufacturers would be subject to the same ZEV targets in Minnesota as in California and the other Section 177 states.

41. Numerous commenters contend that Minnesota is not authorized to adopt the LEV and ZEV standards because California does not currently have a waiver under section 209(b).⁷⁷ On September 27, 2019, the EPA withdrew California’s CAA preemption waiver, thereby invalidating California’s motor vehicle emission standards.⁷⁸ Additionally, the National Highway Transportation and Safety Administration (NHTSA) promulgated rules providing that state regulations of tailpipe carbon dioxide emissions are fuel economy standards within the meaning of 49 U.S.C. § 32919 (2018), of the Energy Policy and Conservation Act of 1975 (EPCA).⁷⁹ This law prohibits states from adopting fuel economy standards for automobiles when the federal government has done so.⁸⁰

42. Throughout this proceeding, the MPCA has asserted that California’s waiver is likely to be reinstated. First, Minnesota and other states challenged the EPA’s withdrawal of the waiver in federal court, and these matters remain in litigation.⁸¹ Second, commenters noted that the administration of President Joseph Biden was likely to reverse federal agency decisions related to the waiver and state adoption of emissions standards.⁸² During the pendency of this matter, the NHTSA published a notice indicating that it proposes to repeal regulatory text and appendices in 49 C.F.R. parts 531 and 533, related to the preemptive effect of 49 U.S.C. 32919, because it has substantial doubts

⁷⁵ See 40 C.F.R. § 52.1237 (2020) (Minnesota’s Implementation Plan); U.S. E.P.A., Status of Minnesota Designated Areas, https://www3.epa.gov/airquality/urbanair/sipstatus/reports/mn_areabypoll.html (displaying a table of non-attainment and maintenance areas in Minnesota).

⁷⁶ 42 U.S.C. § 7507.

⁷⁷ See, e.g., Comments of the Alliance for Automotive Innovation (Auto Innovators); Comments of MADA; Comments of the Clean Fuels Development Coalition. Many commenters also opined that Minnesota has the authority to adopt the rule under the CAA. See, e.g., Comments of the California Air Resources Board (CARB); Comments of Tesla.

⁷⁸ See 84 Fed. Reg. 51310 (Sept. 27, 2019). This portion of the federal government’s rules on state standards is referred to as the “Safe I Rule,” and this is the rule through which the waiver was withdrawn. The “Safe II Rule” is the final rule setting lower emissions standards that prompted this rulemaking by the MPCA.

⁷⁹ The Energy Policy and Conservation Act of 1975, Pub. L. 94–163, 89 Stat. 871.

⁸⁰ 49 C.F.R. pt. 531, App. B(a)(3) (2020).

⁸¹ Ex. D at 36.

⁸² See Comments of Fresh Energy, Minnesota Center for Environmental Advocacy, National Resources Defense Council and Sierra Club; Exec. Order No. 13990, *Protecting Public Health and the Environment and Restoring Science to Tackle the Climate Crisis*, 86 Fed. Reg. 7037 (Jan. 25, 2021).

about whether Congress provided it with authority to engage in rulemaking regarding the scope of EPCA preemption.⁸³ On April 28, 2021, the EPA published a notice indicating it was reconsidering its withdrawal of the waiver for California’s emissions standards, stating that the agency believes significant issues of concern exist as to whether the waiver withdrawal was “a valid and appropriate exercise of agency authority.”⁸⁴

43. To address this issue, the MPCA proposes to delay the effective date of the LEV and ZEV standards until after California’s waiver is reinstated.⁸⁵ While the proposed rule would be adopted, only the provisions related to the voluntary ZEV early-action credit bank would be effective prior to reinstatement of the waiver, allowing manufacturers to earn credits for vehicles delivered to Minnesota beginning in MY 2022 and continuing until the first effective model year.⁸⁶ The LEV and ZEV standards would not become effective until the agency publishes a notice of the effective date in the *State Register* after restoration of California’s waiver.⁸⁷ Under the CAA, the proposed rule will not actually require manufacturer compliance until two model years after the rule becomes effective.⁸⁸ Because the effective date begins the two-year clock, if the MPCA publishes notice of the effective date in 2021, the first effective model year for the LEV and ZEV standards would be MY 2025.⁸⁹

44. Under section 177 of the CAA, a state is permitted to adopt California’s standards issued under section 209(b) even in the absence of a valid waiver, so long as the state does not enforce the standards until after a waiver is issued.⁹⁰ This is consistent with the framework established by the CAA. The CAA makes California’s authority contingent on federal action, and the authority of other states contingent upon action by California, creating a system that contemplates some fluctuation of the authority of the Section 177 states to enforce state-adopted emissions standards. By proposing to adopt the rules, but to delay the effective date of the LEV and ZEV standards, the MPCA’s approach complies with the CAA.

45. The MPCA has the statutory authority to adopt the proposed rules under Minn. Stat. § 116.07, 42 U.S.C. § 7507, and 40 C.F.R. § 52.1237.

⁸³ NHTSA, Notice of Proposed Rulemaking Relating to CAFÉ Preemption (Apr. 22, 2021), https://www.nhtsa.gov/sites/nhtsa.gov/files/2021-04/cafe_preemption_nprm_04222021_1_0.pdf.

⁸⁴ 86 Fed. Reg. 22421 (Apr. 28, 2021).

⁸⁵ Ex. D at 36, 53.

⁸⁶ See Proposed Rule part 7023.0300, subp. 4(E).

⁸⁷ Ex. D at 36, 53.

⁸⁸ See 42 U.S.C. § 7507(2) (stating that California and other adopting states must “adopt such standards at least two years before commencement of such model year.”).

⁸⁹ Ex. D at 53.

⁹⁰ See *Motor Vehicle Mfrs. Ass’n of the United States, Inc. v. New York State Dep’t. of Env’tl Conservation*, 17 F.3d 521, 533-34 (2d Cir. 1994) (holding that New York validly adopted California’s LEV plan before the EPA granted California a waiver for the plan, but that issuance of the waiver was a precondition for enforcement of New York’s rules).

IV. Procedural Requirements of Minn. Stat. Ch. 14 and Minn. R. Ch. 1400

A. Request for Comments

46. Minn. Stat. § 14.101 requires that an agency solicit comments from the public on the subject matter of a proposed rulemaking at least 60 days prior to the publication of a notice of intent to adopt rules or a notice of hearing. Such notice must be published in the *State Register*.⁹¹

47. On October 7, 2019, the MPCA published in the *State Register* a Request for Comments seeking comments on its planned new rules governing GHG emissions, known as the Clean Cars Minnesota Rule.⁹² The MPCA explained that the rulemaking is intended to reduce GHG and other harmful air pollutant emissions from passenger vehicles by adopting the California LEV and ZEV standards.⁹³

48. The Request for Comments was published at least 60 days prior to the publication of the Notice of Intent to Adopt Rules, as discussed below.

49. The MPCA complied with the requirements established by Minn. Stat. § 14.101.

B. Publication of Notice of Intent to Adopt Rules

50. Minn. Stat. § 14.14, subd. 1a(a) and Minn. R. 1400.2080, subp. 6 (2019), require that an agency publish in the *State Register* a notice of intent to adopt rules at least 30 days prior to the date of hearing and at least 30 days prior to the end of the comment period.

51. The MPCA originally requested approval of its Additional Notice Plan and Notice of Intent to Adopt Rules with a Hearing (Notice of Hearing) on September 10, 2020. The Administrative Law Judge approved both by Order dated September 14, 2020.⁹⁴ Public hearings on the proposed rules were scheduled to take place in December 2020. Ultimately, however, the matter was postponed and the MPCA did not publish that notice of hearing.⁹⁵

52. On December 2, 2020, the MPCA filed an amended request for review and approval of its Additional Notice Plan and Notice of Hearing. The MPCA supplemented its submission on December 4, 2020, making the filing complete. The Administrative Law

⁹¹ Minn. Stat. § 14.101.

⁹² Ex. A (Request for Comments).

⁹³ *Id.*

⁹⁴ See Order on Request for Review and Approval of Additional Notice Plan and Notice of Hearing (Sept. 14, 2020).

⁹⁵ See Order on Amended Request for Review and Approval of Additional Notice Plan and Notice of Hearing (Dec. 9, 2020).

Judge approved both the Additional Notice Plan and Notice of Hearing by Order dated December 9, 2020.⁹⁶

53. The MPCA published the Notice of Hearing in the *State Register* issued on December 21, 2020.⁹⁷ The Notice of Hearing scheduled hearings to take place by video conference on February 22 and 23, 2021. The Notice of Hearing provided information on how persons could submit comments on the proposed rules and how persons could join the hearing via the internet or telephone.⁹⁸

54. The Notice of Hearing contained all the information required under Minn. R. 1400.2080 and was published more than 30 days before the hearing and the close of the comment period.

C. Notice Requirements

1. Notice to Official Rulemaking List

55. Minn. Stat. § 14.14, subd. 1a, requires that each agency maintain a list of all persons who have registered with the agency for the purpose of receiving notice of rule proceedings.

56. On December 21, 2020, the MPCA emailed a copy of the Notice of Hearing to all persons and entities on its official rulemaking list.⁹⁹ The official rulemaking list was comprised of all persons and entities who requested to be placed on the MPCA's GovDelivery system for the purpose of receiving such notice.¹⁰⁰ The Notice of Hearing was emailed to 3,299 GovDelivery subscribers.¹⁰¹

57. The Notice of Hearing advised that the comment period would expire on a date to be determined by the Administrative Law Judge following the hearing on February 23, 2021.¹⁰² The comment period was extended until March 15, 2021.¹⁰³

58. Minn. Stat. § 14.14, subd. 1a, requires that an agency give notice of its intent to adopt rules by U.S. mail or electronic mail to all persons on its official rulemaking list at least 30 days before the date of the hearing.

59. Minn. R. 1400.2080, subp. 6, provides that a notice of hearing or notice of intent to adopt rules must be mailed at least 33 days before the end of the comment period or the date of the hearing.

⁹⁶ *Id.*

⁹⁷ Ex. F (Notice of Hearing).

⁹⁸ *Id.*

⁹⁹ Ex. G-1 (Certificate of Mailing Notice of Hearing).

¹⁰⁰ *Id.*

¹⁰¹ Ex. G-2 (GovDelivery email bulletin).

¹⁰² Ex. F (Notice of Hearing).

¹⁰³ Tr. Vol. I at 21-22.

60. The MPCA fulfilled the notice requirements established in Minn. Stat. § 14.14 and Minn. R. 1400.2080, subp. 6.

2. Additional Notice

61. Minn. Stat. § 14.14, subd. 1a(a), requires that an agency make reasonable efforts to notify persons or classes of persons who may be significantly affected by the rule being proposed by giving notice of its intent to adopt rules. Such notice may be made in newsletters, newspapers, or other publications, or through other means of communication.¹⁰⁴ This notice is referred to as “additional notice” and is detailed by an agency in its additional notice plan.

62. Minn. Stat. § 14.131 requires that an agency include in its Statement of Need and Reasonableness (SONAR) a description of its efforts to provide additional notice. Alternatively, the agency must detail why additional notification efforts were not made.¹⁰⁵

63. An agency may request approval of its additional notice plan by an administrative law judge prior to service.¹⁰⁶

64. The MPCA requested and was granted approval of its Additional Notice Plan on December 9, 2020.¹⁰⁷

65. On December 21, 2020, the MPCA provided notice according to its approved Amended Additional Notice Plan, as follows:¹⁰⁸

- (a) Published Notice of Hearing on the MPCA’s Public Notice webpage at <https://www.pca.state.mn.us/public-notices>;
- (b) Provided an extended comment period by scheduling rulemaking hearing at least 45 days after the Notice of Hearing was published;
- (c) Held four public meetings during the prehearing comment period to provide information to stakeholders about the proposed rule and the process for submitting comments;¹⁰⁹
- (d) Provided specific notice to tribal authorities via email with a hyperlink to electronic copies of the Notice of Hearing,

¹⁰⁴ Minn. Stat. § 14.14, subd. 1a(a).

¹⁰⁵ Minn. Stat. § 14.131.

¹⁰⁶ Minn. R. 1400.2060 (2019).

¹⁰⁷ Order on Amended Request for Review and Approval of Additional Notice Plan and Notice of Hearing (Dec. 9, 2020).

¹⁰⁸ Ex. H.

¹⁰⁹ Recordings of these informational meetings are available on the MPCA’s rulemaking webpage at: <https://www.pca.state.mn.us/air/clean-cars-mn-rulemaking> (last viewed on May 4, 2021).

SONAR, and proposed rule amendments to the 11 federally recognized tribes in Minnesota;

- (e) Provided specific notice to automotive and business associations, environmental groups, government entities and other organizations identified in the Additional Notice Plan section of the SONAR via email with a hyperlink to electronic copies of the Notice of Hearing, SONAR, and proposed rule amendments;
- (f) Provided notice to MPCA Air Mail electronic newsletter subscribers via email with a hyperlink to electronic copies of the Notice of Hearing, SONAR, and proposed rule amendments;¹¹⁰
- (g) Posted relevant rulemaking updates and associated documents including the Notice of Hearing, SONAR, and proposed rule on the Clean Cars Minnesota rulemaking webpage at <https://www.pca.state.mn.us/air/clean-cars-mn-rulemaking>.

66. The MPCA complied with its Additional Notice Plan and fulfilled the additional notice requirements provided in Minn. Stat. §§ 14.14, subd. 1a(a), .131.

3. Notice to Legislators

67. Under Minn. Stat. § 14.116, an agency is required to send a copy of the Notice of Intent to Adopt and the SONAR to certain legislators at the time it mails its Notice of Intent to Adopt to persons on its rulemaking list and pursuant to its additional notice plan.

68. On December 21, 2020, the MPCA mailed or emailed a copy of the Notice of Hearing, SONAR, and proposed rules the chairs and ranking minority party members of the legislative policy and budget committees with jurisdiction over the proposed rules, and to the Legislative Coordinating Commission.¹¹¹

69. The MPCA fulfilled its notification responsibilities under Minn. Stat. § 14.116.

¹¹⁰ The MPCA maintains rule-specific lists of subscribers who request to receive information related to various topics. The MPCA has approximately 3,600 subscribers on the list for “Air Quality Regulatory and Technical News” also known as “Air Mail.” See Ex. D at 27.

¹¹¹ Exs. K-2, K-3 (Certificates of Sending Notice and SONAR to Legislators and Legislative Coordinating Commission).

4. Notice to the Legislative Reference Library

70. Minn. Stat. § 14.131 and Minn. R. 1400.2070, subp. 3 (2019), require the agency to send a copy of the SONAR to the Legislative Reference Library when the Notice of Intent to Adopt is mailed.

71. On December 21, 2020, the MPCA mailed a copy of the SONAR to the Legislative Reference Library.¹¹²

72. The MPCA complied with Minn. Stat. § 14.131 and Minn. R. 1400.2070, subp. 3.

5. Notice to Commissioner of Agriculture

73. Minn. Stat. § 14.111 imposes additional notice requirements when the proposed rules affect farming operations. The statute requires that an agency provide a copy of any such changes to the Commissioner of Agriculture at least 30 days prior to publishing the proposed rules in the *State Register*.¹¹³

74. The MPCA's proposed rules do not impose restrictions or have an impact on farming operations. As a result, the MPCA was not required to notify the Commissioner of Agriculture.¹¹⁴

D. Rule Hearing and Submission of Written Comments

75. The Administrative Law Judge conducted public rulemaking hearings on February 22 and 23, 2021.¹¹⁵ The MPCA's panel at the hearing included: Joseph Dammel, Rulemaking Attorney; Amanda Jarrett Smith, Climate and Energy Policy Planner; David Bael, Economic Policy Analyst; Katie Izzo, Rule Coordinator; and Maggie Wenger, Air Policy Planner.¹¹⁶

76. In support of its request for approval to adopt the proposed rules, the Agency offered the following documents into the record as exhibits, as required by Minn. Stat. § 14.14, subd. 2a and Minn. R. 1400.2220:

Ex. A: MPCA's Request for Comments as published in the *State Register* on October 7, 2019;

Ex. C: Proposed rules dated March 2, 2020, including the Revisor's approval;

Ex. D: MPCA's SONAR, dated December 2020;

¹¹² Ex. E.

¹¹³ Minn. Stat. § 14.111.

¹¹⁴ See Ex. D at 96.

¹¹⁵ See Tr. Vol. I; Tr. Vol. II.

¹¹⁶ Tr. Vol. I at 2.

Ex. E: Copy of transmittal letter mailing the SONAR to the Legislative Reference Library on December 21, 2020;

Ex. F: Notice of Hearing as published in the *State Register* on December 21, 2020;

Ex. G-1: Certificate of Mailing the Notice of Hearing to the Agency's rulemaking mailing list on December 21, 2020;

Ex. G-2: Agency's GovDelivery Bulleting with recipient count;

Ex. G-3: Certificate of Accuracy of Mailing List;

Ex. H: Certificate of Giving Additional Notice Under the Additional Notice Plan on December 21, 2020;

Ex. I: Written comments on the proposed rules that the MPCA received during the comment period that followed the Notice of Hearing;

Ex. K-1: Letter to Minnesota Management and Budget (MMB);

Ex. K-2: Certificate of Sending Notice of Hearing and SONAR to Legislators and Legislative Coordinating Commission (LCC) on December 21, 2020;

Ex. K-3: Copy of Transmittal Letter to Legislators and LCC;

Ex. L-1: Copy of slides from MPCA's presentation at rulemaking hearing on February 22 and 23, 2021;

Ex. L-2: Hearing Comments;

Ex. L-3: Hearing Registers;

Ex. M: Written rulemaking comments and materials submitted during the post hearing comment period;

Ex. N: Written comments and materials submitted during the rebuttal period.

77. Mr. Dammel offered the MPCA's exhibits and addressed the procedural requirements for rulemaking.¹¹⁷ Ms. Jarrett Smith presented the MPCA's positions as to the need for and reasonableness of the rule.¹¹⁸

¹¹⁷ Tr. Vol. 1 at 24-29 (The MPCA offered Exs. A-K at the commencement of the rulemaking hearing on February 22, 2021. The MPCA submitted Exs. L-N after the hearing.).

¹¹⁸ *Id.* at 29-54.

78. Approximately 209 people attended the hearing on February 22, 2021, and approximately 165 people attended the hearing on February 23, 2021.¹¹⁹ The hearing continued until all interested persons, groups, or associations had an opportunity to be heard concerning the proposed rules. Forty members of the public made statements during the first day of the hearing.¹²⁰ Thirty-four members of the public made statements during the second day of the hearing.¹²¹

79. After the hearing, the Administrative Law Judge extended the time period for submission of public comments for another 20 calendar days – until March 15, 2021 – to permit interested persons and the Agency additional time to submit written comments.¹²² During the initial public comment period, more than 10,000 written comments were submitted by members of the public, along with tens of thousands of petition signatures, and the MPCA also submitted two preliminary responsive comments.¹²³

80. Following the initial comment period, the hearing record remained open an additional five business days to permit interested persons and the Agency to reply to the earlier-submitted comments. Approximately 26 rebuttal comments were filed, also including thousands of petition signatures, and the MPCA also submitted a comment in rebuttal. The rebuttal comment period closed on March 22, 2021, and the hearing record closed on that date.

81. By Order dated March 24, 2021, the Chief Administrative Law Judge extended the deadline for completion of the Administrative Law Judge's report to May 7, 2021.¹²⁴

V. Statutory Requirements

A. Regulatory Factors

82. The Administrative Procedure Act requires an agency adopting rules to address eight factors in its SONAR.¹²⁵ Those factors are:

- (1) a description of the classes of persons who probably will be affected by the proposed rule, including classes that will bear the costs of the proposed rule and classes that will benefit from the proposed rule;

¹¹⁹ Ex. L-3 (list of hearing attendees).

¹²⁰ See Tr. Vol. I.

¹²¹ See Tr. Vol. II.

¹²² See Minn. Stat. § 14.15, subd. 1.

¹²³ See MPCA's Final Response at 1, 3 (Mar. 22, 2021) (MPCA Rebuttal Comments).

¹²⁴ Order Extending Deadline for Rule Report (Mar. 24, 2021); see Minn. Stat. § 14.15, subd. 2.

¹²⁵ Minn. Stat. § 14.131.

- (2) the probable costs to the agency and to any other agency of the implementation and enforcement of the proposed rule and any anticipated effect on state revenues;
 - (3) a determination of whether there are less costly methods or less intrusive methods for achieving the purpose of the proposed rule;
 - (4) a description of any alternative methods for achieving the purpose of the proposed rule that were seriously considered by the agency and the reasons why they were rejected in favor of the proposed rule;
 - (5) the probable costs of complying with the proposed rule, including the portion of the total costs that will be borne by identifiable categories of affected parties, such as separate classes of governmental units, businesses, or individuals;
 - (6) the probable costs or consequences of not adopting the proposed rule, including those costs or consequences borne by identifiable categories of affected parties, such as separate classes of government units, businesses, or individuals;
 - (7) an assessment of any differences between the proposed rule and existing federal regulations and a specific analysis of the need for and reasonableness of each difference; and
 - (8) an assessment of the cumulative effect of the rule with other federal and state regulations related to the specific purpose of the rule and reasonableness of each difference.¹²⁶
- 1. Classes of Persons Affected, Benefitted, or Bearing Costs of the Proposed Rule**

83. The MPCA states that the persons and entities affected directly and indirectly by this proposed rule are automobile manufacturers and dealers, individuals and groups that purchase new vehicles, related industries, and all Minnesotans.¹²⁷

(a) Automobile manufacturers

84. Automobile manufacturers are the only group directly regulated by the proposed rule. The rule will require manufacturers to ensure that vehicles delivered for sale in Minnesota comply with the LEV standard and must meet ZEV credit requirements.

¹²⁶ *Id.*

¹²⁷ Ex. D at 62.

In addition, the proposed rule imposes certain reporting requirements on manufacturers.¹²⁸

85. Automobile manufacturers will also bear costs associated with the proposed rule. The MPCA maintains, however, that it is reasonable to expect most of these costs will be passed on to consumers who purchase vehicles and who will benefit from cost savings over the lifetime of the vehicle.¹²⁹

(b) Automobile dealers

86. The MPCA states that automobile dealers may have some costs associated with the proposed rule. However, as with manufacturers, the MPCA maintains that it is reasonable to assume most of these costs will be passed on to consumers who purchase these vehicles, and who will benefit from cost savings over the lifetime of the vehicles.

87. Dealers are not directly regulated by the proposed rule, but they are the interface between manufacturers and consumers. Therefore, dealers may experience some costs associated with ensuring that only LEV-certified vehicles are offered for sale in Minnesota. They may also experience limitations on trading vehicles with dealers in other states if those dealers do not carry LEV-certified vehicles. The MPCA notes that dealers may need to invest in charging infrastructure, tools, and training to support increased EV sales.¹³⁰

(c) Individuals and groups that purchase new vehicles

88. Individuals and groups that purchase new vehicles will likely incur increased up-front costs associated with these vehicles but, according to the MPCA, these parties will also experience long-term savings from reduced fuel costs. The MPCA states that people who purchase new vehicles and register and title them in Minnesota will need to ensure their new vehicle is LEV-certified. Because in most cases dealers are the group that receives new vehicles from manufacturers and typically registers and titles the new vehicle for the purchaser, the MPCA assumes dealers will help individuals ensure they are not purchasing a non-compliant vehicle.¹³¹

89. The MPCA maintains that new vehicle purchasers who wish to buy a new EV will benefit from the adoption of the ZEV standard because the rule encourages manufactures to provide greater availability of EV models to Minnesotans. Because the ZEV standard will not limit new vehicle options for Minnesota consumers or mandate that anyone in Minnesota buy an EV, the MPCA maintains the ZEV standard will not have any impact on vehicle purchasers who choose not to purchase a new EV.¹³²

¹²⁸ *Id.*

¹²⁹ *Id.*

¹³⁰ *Id.* at 63.

¹³¹ *Id.*

¹³² *Id.*

(d) Related industries

90. The MPCA acknowledges that some industries related to vehicles may see costs and benefits associated with the proposed rule. For example, the MPCA notes that businesses that manufacture, install, operate, and maintain EV infrastructure may experience increased demand for their products and services, and thus benefit from the proposed rule. On the other hand, mechanics and others who maintain automobiles may experience a decrease in demand for services because EVs tend to have fewer maintenance needs than ICE vehicles.¹³³ Companies that build components for vehicles that help cut GHG emissions may see an increased demand for their products as a result of the proposed rule.¹³⁴

91. The MPCA also notes that electric utilities may see increased demand for electricity and thus obtain a benefit from the proposed rule. These utilities already incorporate EV adoption into their Integrated Resource Plans, but they may need to adjust the scale of EV adoption in their planning.¹³⁵ As EVs become more common, utilities may also see more interest in programs for time-of-use rates and EV charging in homes and businesses. The petroleum industry may experience a reduction in demand for gasoline and diesel fuels due to the proposed rule. Likewise, although the proposed rule does not regulate biofuels, the biofuels industry may experience a reduction in per-vehicle demand for liquid fuels into which biofuels such as ethanol and biodiesel are blended.¹³⁶

(e) All Minnesotans

92. The MPCA states that all Minnesotans will benefit from the reduced emissions of GHGs and other pollutants that are expected as a result of this rule. Moreover, the MPCA notes that decreased fuel use will result in the added benefit of reduced upstream emissions from liquid fuel extraction, transportation, and production. The MPCA also suggests that, to the extent that ZEV may increase electricity demand in Minnesota, there could be downward pressure on electricity rates, particularly if utilities encourage EV charging at times when the cost of electricity is the lowest, and that this would benefit all Minnesotans, regardless of whether they own an EV.¹³⁷

2. Probable Costs to the Agency and Other Agencies for Implementation and Enforcement and Effect on State Revenues

93. According to the MPCA, other states that have adopted this rule have reported ease of implementation.¹³⁸ The MPCA anticipates it will need to hire one to two additional full time equivalent (FTE) employee(s) to conduct initial outreach to dealers, manufacturers, and the public; process data; track updates to the California regulations; manage compliance; and work with its compliance and enforcement unit and other state

¹³³ *Id.*

¹³⁴ *Id.*

¹³⁵ See Minn. Stat. § 216B.2422 (2020) (requiring utilities to periodically file resource plans with the Minnesota Public Utilities Commission (PUC)).

¹³⁶ Ex. D at 63-64.

¹³⁷ *Id.* at 64.

¹³⁸ *Id.*

agencies when necessary. The MPCA budgets \$121,000 annually per FTE. Therefore, the MPCA anticipates incurring staffing costs of \$121,000-\$242,000 annually for implementing and enforcing the rule.¹³⁹

94. The MPCA notes that the Department of Public Safety (DPS) and its Division of Driver and Vehicle Services (DVS) may be impacted by the rule. To ensure that new motor vehicles registered in Minnesota comply with the LEV standards, the MPCA will need to work with DVS on a mechanism to check emissions certifications during the registration process. DVS already has a statutory requirement that vehicles comply with CAA requirements to be registered and titled in Minnesota. The MPCA maintains that, because this rule is simply an alternative to the federal standard, no statutory change will be needed. The LEV standards will trigger the same compliance check requirement. According to the MPCA, most states simply add a check box to their existing registration forms. The MPCA asserts that it is working with DVS to develop the specific mechanism for emissions compliance checks to be employed in Minnesota.¹⁴⁰

95. DVS has indicated to the MPCA that it does not believe additional staffing will be needed to integrate these new standards into its existing work. According to the MPCA, DVS advised it that DVS adds new registration requirements almost every year, so adding a mechanism to check LEV compliance should require more effort than other annual updates.¹⁴¹ In addition, the MPCA states that it will work with DVS to develop communication and education plans to ensure that dealers and Deputy Registrar Offices around the state know about the new rules and processes. DVS has systems in place to update these groups regarding process changes, as there are typically annual changes to the registration system.¹⁴²

96. The MPCA states that it and DVS will also need to develop an implementation plan for enforcement. According to the MPCA, other Section 177 states have indicated they encountered very few compliance issues (fewer than five per year), especially after the first year or two. The MPCA does not anticipate significant compliance and enforcement burdens for either agency. Based on conversations with DVS and the fact that DVS implements new registration requirements almost every year, the MPCA does not currently anticipate new costs to DVS beyond those typically required for their annual updates.¹⁴³

97. The MPCA states that adoption of the LEV and ZEV standards may impact state tax revenues. The MPCA analyzed the potential impact on state tax revenue in Appendix 1 to the SONAR.¹⁴⁴ To the extent that the proposed rule results in lower gasoline spending by Minnesota vehicle owners, the state would generate less revenue from its fuel tax. However, the MPCA notes that, to the extent that LEV-certified vehicles and EVs have a higher up-front cost, the lost revenue from decreased gasoline spending

¹³⁹ *Id.*

¹⁴⁰ *Id.*

¹⁴¹ *Id.*

¹⁴² *Id.*

¹⁴³ *Id.* at 65.

¹⁴⁴ *Id.*; See Appendix 1 of SONAR.

could be recovered through the higher motor vehicle sales tax and increased registration taxes over vehicle lifetimes.¹⁴⁵ The \$75 annual state registration fee premium for BEVs represents another source of revenue for the state. The MPCA estimates that the loss in state revenues from fuel taxes would be fully offset by the gain in state revenues from sales taxes, registration taxes, and registration fee premiums.¹⁴⁶

98. Based on its analysis and modeling, the MPCA maintains that, despite potential reductions in fuel tax revenue, the anticipated increases in sales tax revenue, vehicle registration tax revenue, and EV registration fee premiums will result in a potential average net increase of approximately \$9.2 million per year in state transportation revenues over the first 10 years of implementation.¹⁴⁷ The MPCA acknowledges that formulation of these estimates is accompanied by a high level of uncertainty and potentially incomplete information. However, the MPCA notes that MnDOT modeling has also found that the combination of continuing current BEV registration premiums into the future and increased sales tax revenues and vehicle registration tax revenues from EVs will most likely continue to result in state revenue gains.¹⁴⁸

3. Less Costly or Less Intrusive Methods for Achieving the Purpose of the Proposed Rule

99. The purpose of the proposed rule is to reduce GHG and other pollutant emissions from the transportation sector, specifically from passenger cars, light-duty trucks, and medium-duty vehicles. The MPCA asserts that emissions standards, like LEV, are a critical tool for reducing air pollution emissions from vehicles.¹⁴⁹

100. The MPCA notes that because states wishing to adopt more stringent standards than those established under the CAA may only adopt standards identical to California's. Minnesota does not have the option to develop Minnesota-specific standards. To have more stringent vehicle emissions standards than current federal standards, there is no less-costly option than adopting the proposed LEV standard.¹⁵⁰

101. The MPCA is already participating in a variety of actions designed to increase EV adoption through non-regulatory means, such as by educating Minnesotans about EVs through Drive Electric Minnesota.¹⁵¹ The ZEV standard encourages manufacturers to bring more EVs to the state but does not require anyone to purchase an EV. The ZEV standard also does not require the distribution of taxpayer funds in the form of an incentive. Therefore, the MPCA maintains that the ZEV is not overly costly or intrusive.¹⁵²

¹⁴⁵ Ex. D at 65.

¹⁴⁶ *Id.*

¹⁴⁷ *Id.* at 66.

¹⁴⁸ *Id.*

¹⁴⁹ *Id.* (citing *Electric Vehicles – Financial Outlook*, Minnesota Department of Transportation (2019), <http://www.dot.state.mn.us/sustainability/docs/ev-revenue-190419.pdf>.)

¹⁵⁰ *Id.* at 67.

¹⁵¹ *Id.*

¹⁵² *Id.*

102. The MPCA notes that some commenters have recommended that Minnesota implement EV purchase incentives.¹⁵³ The Agency points out that, to date, the Minnesota Legislature has not provided any executive branch agency with authority, direction, or funding to offer such an incentive.¹⁵⁴

4. Description of Alternative Methods for Achieving the Purpose of the Proposed Rule Considered by the Agency and Why Alternatives Were Rejected

103. Under the CAA, if the MPCA wishes to adopt emissions standards more stringent than the federal standards, it must use the same standards as California. Minnesota is prohibited from developing a unique, Minnesota-specific program. Therefore, the MPCA maintains that no other alternative vehicle emissions standards exist that will allow Minnesota to meet vehicle emissions reduction goals.¹⁵⁵

104. Because the MPCA has limited authority to otherwise reduce emissions from the transportation sector, it contends that adopting the standards in this rule is the only appropriate mechanism available to reduce emissions.¹⁵⁶

5. Probable Costs of Complying with Proposed Rules, Including the Portion of the Total Costs Borne by Identifiable Categories of Affected Parties

105. The MPCA has conducted an analysis of the costs and benefits of this proposed rule.¹⁵⁷ Overall, the MPCA has found a net benefit results from adopting both the LEV and the ZEV standards.¹⁵⁸

106. As discussed above, the MPCA identified five categories of parties affected by the proposed rule: automobile manufacturers; automobile dealers; individuals and groups that purchase new vehicles; related industries; and all Minnesotans.¹⁵⁹

(a) Automobile manufacturers

107. The proposed rule directly regulates automobile manufacturers. Both LEV-certified vehicles and EVs cost more to manufacture than non-LEV ICE vehicles. However, the MPCA assumes that vehicle technology and compliance costs borne by the manufacturers (and the new vehicle dealers) will ultimately be passed along to purchasers of LEV-certified vehicles and EVs in the form of higher purchase prices.¹⁶⁰ The MPCA also believes vehicle purchasers as a group will accrue benefits from fuel savings for these vehicles. According to the MPCA, its assumptions are consistent with

¹⁵³ *Id.*

¹⁵⁴ *Id.*

¹⁵⁵ *Id.*

¹⁵⁶ *Id.*

¹⁵⁷ See Ex. D (SONAR), Appendix 1.

¹⁵⁸ *Id.*

¹⁵⁹ Ex. D at 68.

¹⁶⁰ *Id.* See analysis in Ex. D part 7(E)(iii) at 69-75.

analyses conducted by other states and the federal government when considering vehicle emissions standards.¹⁶¹

108. The MPCA asserts that because these standards have already been implemented in other states, manufacturers will not experience increased research and development costs for new vehicles as a result of Minnesota's adoption of the standard. Manufacturers may experience some marginal costs in staff time for increased tracking and reporting of vehicles delivered for sale in Minnesota. However, because this tracking and reporting will be the same as that performed for the other Section 177 states, the MPCA does not anticipate that manufacturers will need to hire new staff to manage this additional data. And the MPCA asserts that any increase in marketing and advertising to sell more EVs to comply with the ZEV requirements, will come out of funds manufacturers are already investing in marketing and advertising other products in their lines.¹⁶²

109. The MPCA states that, during the Request for Comment period, it asked businesses for estimates of costs for complying with the proposed rule. The Alliance of Automobile Manufacturers and the Association of Global Automakers;¹⁶³ both commented but, according to the MPCA, neither identified specific costs that they were concerned about bearing. The MPCA anticipates minimal costs for manufacturers to comply with the proposed rule and that any costs borne by the manufacturers would be passed on to consumers.¹⁶⁴

(b) Automobile dealers

110. The MPCA states that automobile dealers may incur potential costs related to marketing efforts to encourage EV purchasing. Though training of sales and service staff at dealerships is an ongoing process with any new model year introduction, the MPCA concedes that dealers will be required to offer training reflecting different product characteristics and service needs, and will need to increase understanding among their staff about EVs, charging, and how best to communicate EV-specific information to car buyers. However, the MPCA assumes any costs borne by dealers for marketing and training will be passed along to new vehicle purchasers.¹⁶⁵

111. The MPCA states that dealers offering EVs for sale for the first time may need to invest in infrastructure, training, and tools. MADA submitted comments to the MPCA during the Request for Comments period stating that "some manufacturers require dealers to make investments in infrastructure and personnel, costing upwards of \$25,000-50,000, to be authorized to sell EVs."¹⁶⁶ The MPCA states that MADA did not provide specific information about these potential costs. However, the MPCA notes that some dealers might be eligible for no- and low-interest loans from the MPCA available for small-

¹⁶¹ Ex. D at 68 (see generally *Regulatory Analysis for Proposed Colorado Air Quality Control Commission Regulation Number 20*, 5 CCR 1001-24, Nov. 9, 2018).

¹⁶² *Id.*

¹⁶³ These entities subsequently merged to form Auto Innovators, which is a commenter in this matter. See Comments of Auto Innovators.

¹⁶⁴ Ex. D at 68.

¹⁶⁵ *Id.* at 69.

¹⁶⁶ *Id.* (citing Comment from MADA submitted Dec. 6, 2019).

and medium-sized businesses seeking to reduce pollution. The MPCA also points out that potential costs for dealers to develop the infrastructure and expertise to sell EVs are not solely the result of this proposed rule. Even without the proposed ZEV standard, the EV market is increasing and manufacturers are already announcing new EV models to be released in the coming years, requiring dealers to adapt.¹⁶⁷

112. The MPCA notes that some dealers expressed concerns about potential lost sales resulting from the LEV standard. An LEV-certified vehicle, on average, will likely have a higher purchase price than an otherwise comparable federally certified vehicle compliant with the final SAFE rule. These dealers have expressed concerns that the potential upfront cost increases could cause diminished sales from Minnesota dealers to people living in surrounding states or that increased upfront costs would cause Minnesotans to purchase fewer new vehicles.¹⁶⁸ The MPCA notes that proposed rule 7023.0250, subp. 2(E) provides an exemption allowing dealers to sell non-LEV certified vehicles to purchasers who will register the vehicle out of state. The MPCA states that this exemption permits dealers near the state's borders to address the needs of their out-of-state customers. Moreover, according to the MPCA, studies have not shown a clear relationship between the upfront costs of vehicles and sales. The MPCA asserts that vehicle purchases are influenced by many factors including fuel economy, performance, options, and the strength of the economy as a whole.¹⁶⁹

113. Dealers also expressed concern that it may be more difficult to trade vehicles with dealers in surrounding states. The MPCA contends that it is not able to determine the level of impact the standards will have with respect to trades. According to the MPCA, it is unclear how many dealers surrounding Minnesota might stock LEV-certified vehicles, how many trades with out-of-state dealers could be replaced with trades in state, or the costs associated with trading over longer distances.¹⁷⁰

(c) Individuals and groups purchasing new vehicles

114. The MPCA assumes that all costs to vehicle manufacturers and dealers attributable to the proposed rule will be passed on to consumers. It notes, however, that consumers are also the group that will accrue the benefits associated with operating LEV-certified vehicles and EVs.¹⁷¹

115. The MPCA analyzed the costs and benefits of adopting the LEV and ZEV standards for the first 10 model years of implementation. The MPCA found that EVs are generally less expensive to own and operate over the life of the vehicle, due in large part to fuel and maintenance savings.¹⁷² EVs have higher up-front purchase costs than comparable ICE vehicles. The MPCA notes studies suggesting that BEVs will obtain cost parity with ICE vehicles, but that PHEVs are likely to continue to have an up-front pricing

¹⁶⁷ *Id.*

¹⁶⁸ *Id.*

¹⁶⁹ *Id.* at 70, Appendix 1.

¹⁷⁰ *Id.* at 70.

¹⁷¹ *Id.*

¹⁷² *Id.*

premium.¹⁷³ The MPCA estimates that the average savings over the life of an EV relative to an ICE vehicle will be \$11,000 or \$12,400, depending on the discount rate applied. The MPCA's estimates factor in lower costs for charging vehicles and reduced maintenance costs, and an anticipated reduction in up-front costs through 2020-2030.¹⁷⁴

116. The MPCA acknowledges that by MY 2025, the average up-front purchase price of a new LEV-certified vehicle may be \$900 to \$1,200 more than a SAFE-certified vehicle subject to the current federal standard, depending on the vehicle size and type. The MPCA has estimated that an average new LEV-certified vehicle in Minnesota will be approximately \$1,139, more than a new SAFE-certified vehicle, because more light-duty trucks are sold in Minnesota than passenger cars.¹⁷⁵ The MPCA estimates that the increased purchase cost of LEV-certified vehicles may be mostly or entirely offset by fuel savings over the life of the vehicles.¹⁷⁶ For MY 2025, the MPCA estimates an average Minnesotan who purchases a new LEV-certified vehicle will realize a reduction of \$200 annually in fuel costs as compared to a SAFE-certified vehicle, resulting in estimated savings of over \$1,700 over the life of the vehicle.¹⁷⁷

117. Depending on the choice of discount rate, the MPCA estimates that the proposed rule would result in between \$23 million average annual net consumer costs to \$48 million of average net consumer savings per model year over vehicles' lifetimes by model year 2034.¹⁷⁸ The MPCA also estimates that over the first 10 model years of implementation, consumers would accrue between a total cost of \$236 million over vehicles' lifetimes to a total benefit of \$476 million.¹⁷⁹

(d) Related industries

118. The MPCA states that organizations that manufacture, install, operate, and maintain EV infrastructure may experience increased demand for their services to charge increasing numbers of EVs, which could result in economic benefits for these industries.¹⁸⁰

119. Mechanics and others who work on vehicles may experience impacts. EVs tend to require less maintenance, which may reduce demand for services from mechanics and negatively affect that industry. Mechanics may also need to obtain training and appropriate tools to be able to work on EVs, which may be a cost to that industry. However, the MPCA points out that the transition to EVs is occurring even without this proposed rule. Therefore, any economic loss or costs associated with this change for related businesses will not arise solely from adoption of the proposed rule. Moreover, with

¹⁷³ *Id.* at 74.

¹⁷⁴ *Id.*

¹⁷⁵ *Id.* at 71.

¹⁷⁶ *Id.* at 70.

¹⁷⁷ *Id.* at 72.

¹⁷⁸ *Id.* at 70.

¹⁷⁹ *Id.* at 70-75 (See full analysis, methods, assumptions, data, and conclusions at Appendix 1).

¹⁸⁰ *Id.* at 75-76.

respect to mechanics, even with the ZEV standard in place, millions of ICE vehicles will remain on the road, and will need repairs and servicing, for many years to come.¹⁸¹

120. Companies that produce components used to help vehicles comply with emissions standards and improve fuel economy may see increased demand for their products. Testimony produced to Minnesota Senate committees by the BlueGreen Alliance represents that there are 16 manufacturers and assemblers that produce “hybrid electric drive system components, propulsion systems for full battery-electric vehicles, thermal management systems for electronic and power systems in advanced vehicles,” and that these companies employ over 3,000 Minnesotans.¹⁸²

121. Electric utilities may see increased demand for electricity, which could increase their revenues. The MPCA estimates total additional revenue resulting from increased electricity consumption for the utility sector to be about \$152 million over the first 10 years of the ZEV standard.¹⁸³ At the same time, the petroleum industry may see reduced revenue from a reduction in per-vehicle demand for gasoline and diesel, as the proposed rule may lead to reduced gasoline consumption. The MPCA estimates a total reduction in gasoline consumption in Minnesota from the proposed rule will be about 700 million gallons over the first 10 years of implementation. The reduced gasoline sales may result in about a \$2.1 billion reduction in revenue for the petroleum industry.¹⁸⁴ The biofuels industry may experience a reduction in per-vehicle demand for liquid fuels into which biofuels such as ethanol and biodiesel are blended.¹⁸⁵ This rulemaking does not regulate biofuels or limit the state’s ability to take action to grow demand for biofuels.¹⁸⁶

122. Finally, the MPCA states that there may be macroeconomic impacts to Minnesota’s economy from adopting the proposed rule. According to the MPCA, studies in other states have shown that adopting LEV and ZEV standards is likely to result in small overall increases in the states’ gross domestic product and the states’ total employment.¹⁸⁷

(e) All Minnesotans

123. The MPCA states that the proposed rule will affect all people who breathe Minnesota’s air, as well as all people who are affected by climate change. The MPCA analyzed the effects of the proposed rule on emissions related to the transportation sector. The details of its analysis including methods, assumptions, data sources, and conclusions can be found in the SONAR at Appendix 1.¹⁸⁸

124. The MPCA estimates the proposed rule will result in total emissions benefit of 8.4 million tons of GHGs reduced over the first 10 model years of implementation of

¹⁸¹ *Id.* at 76.

¹⁸² *Id.*

¹⁸³ *Id.*

¹⁸⁴ *Id.*

¹⁸⁵ *Id.*

¹⁸⁶ *Id.*

¹⁸⁷ *Id.* at 77.

¹⁸⁸ *Id.*

the proposed rule, measured in carbon dioxide equivalents (CO_{2e}). This includes both the tailpipe emissions from vehicles and the upstream emissions from the power sector and extracting, processing, and transporting fuel (called well-to-wheel emissions).¹⁸⁹ As older ICE vehicles are replaced by lower-emitting LEV vehicles, each year's emissions benefit is greater than the previous year. The MPCA's analysis estimates that by 2034, annual well-to-wheel emissions benefits would amount to a reduction of 1.4 million tons of GHGs.¹⁹⁰

125. The MPCA also analyzed the expected health benefits resulting from the reduced tailpipe and upstream emissions of non-GHG pollutants. The majority of these health benefits will occur in Minnesota and virtually all of them will occur within the continental U.S. The MPCA estimates that over the first 10 years of implementation of these standards, these emissions reductions could prevent between 18-65 premature deaths from the respiratory and cardiovascular health impacts of air pollution. Additionally, numerous less severe health outcomes caused by air pollution, including emergency room visits, hospital admissions, non-fatal heart attacks, acute bronchitis, respiratory symptoms, asthma exacerbation, and work-loss days, could also be avoided as a result of these standards. The economic value of all these avoided health impacts is estimated to be between \$200 million and \$600 million.¹⁹¹

6. Probable Costs or Consequences of not Adopting the Proposed Rules, Including Costs Borne by Individual Categories of Affected Parties

126. The MPCA states that the probable costs or consequences of not adopting the proposed rule will be the loss of all the net benefits that the LEV and ZEV standards are expected to provide.¹⁹² The MPCA asserts that not adopting the rule and remaining with the less stringent federal standards will result in increases in GHG emissions from transportation and will prevent Minnesota from achieving its NGEA emissions reduction goals. Also, if the proposed rule is not adopted, the MPCA maintains Minnesota will not have a mechanism to ensure federal regulatory actions do not erode the expected emission reductions from motor vehicles.¹⁹³

127. In addition, MPCA and MDH's recent Life and Breath Report found that air pollution contributes to the deaths of between 2,000 and 4,000 Minnesotans annually, as well as approximately 500 hospital stays and 800 emergency room visits. Transportation is the largest emitter of air pollutants that contribute to these negative health outcomes.¹⁹⁴ The MPCA contends that not adopting the LEV and ZEV standards will result in business-as-usual for air pollution emissions from transportation and avoid potential public health benefits from reduced pollution exposures.¹⁹⁵

¹⁸⁹ *Id.*

¹⁹⁰ *Id.*

¹⁹¹ *Id.* at 81; Ex. O (containing corrected figures).

¹⁹² Ex. D at 81.

¹⁹³ *Id.* at 82.

¹⁹⁴ *Id.*; Life and Breath Report, <https://www.pca.state.mn.us/air/life-and-breath-report>.

¹⁹⁵ Ex. D at 82.

128. In summary, the MPCA contends that not adopting the proposed rule and allowing the weakened federal emissions standards to govern Minnesota will result in backsliding on important environmental protections and gains.¹⁹⁶

7. Assessment of Differences Between Proposed Rules and Existing Federal Regulations

129. In addition to the requirements of Minn. Stat. § 14.131 regarding this factor, for a rulemaking relating to air quality standards, Minn. Stat. § 116.07, subd. 2(f), requires the MPCA to include in its SONAR an assessment of any differences between the proposed rule and federal standards, and similar standards the states that border Minnesota and other states within EPA Region 5. The MPCA must provide specific analysis of the need and reasonableness for any difference in its proposed rule.

130. The MPCA states that the proposed LEV and ZEV standards are fully compliant with all existing federal regulations and the CAA. Under the CAA, once a waiver is granted for more stringent vehicle emission standards, “compliance with such State standards shall be treated as compliance with applicable Federal standards....”¹⁹⁷ Because the proposed rules are identical to the California standards, the MPCA maintains the rule complies with the CAA.¹⁹⁸ The MPCA also maintains that it is necessary to differ from the federal standard articulated in the SAFE Vehicles rule ensure compliance with state’s environmental goals.¹⁹⁹

131. The MPCA also maintains that no other states bordering Minnesota have set emissions reduction standards like those found in the NGEA. Other states within EPA Region 5 have emissions reduction goals, but the MPCA contends these states have not taken substantive steps toward those targets. The MPCA asserts that Minnesota has taken a leadership role in addressing climate change, and because Minnesota is not on track to meet its NGEA goals, it is reasonable for Minnesota to take action to meet its state specific standards.²⁰⁰

132. The MPCA has met the requirements of Minn. Stat. § 116.07, subd. 2(f).

8. Cumulative Effect of the Rule with Other Federal and State Regulations

133. Minn. Stat. § 14.131 defines “cumulative effect” as “the impact that results from incremental impact of the proposed rule in addition to the other rules, regardless of what state or federal agency has adopted the other rules.”

134. The MPCA states that by incorporating regulations by reference, the rule is minimizing the cumulative effect of complying with new air pollution control programs by using regulatory programs already in place. Once the standards are effective, the

¹⁹⁶ *Id.*

¹⁹⁷ 42 U.S.C. § 7543(b)(3).

¹⁹⁸ Ex. D at 82.

¹⁹⁹ *Id.*

²⁰⁰ *Id.* at 94.

proposed rule amendments will align Minnesota's state air quality rules with rules that are already in effect. According to the MPCA, incorporating the requirements by reference ensures that the state rules do not overlap or add new requirements that could be considered cumulative with the existing requirements.²⁰¹

135. The MPCA notes that, if the rules are adopted, Minnesota will be joining a program in use by 15 other states and the District of Columbia for the LEV standard and 13 states for the ZEV standard.²⁰² The MPCA states that adopting the proposed rule merely extends the geography of where these standards apply. It is not creating new standards for manufacturers to meet.²⁰³

B. Performance-Based Regulation

136. An agency is required to describe in its SONAR the manner in which the agency has considered and implemented the legislative policy supporting performance-based regulatory systems.²⁰⁴ A performance-based rule is one that emphasizes superior achievement in meeting the agency's regulatory objectives and maximum flexibility for the regulated party and the agency in meeting those goals.²⁰⁵

137. The MPCA notes that it is required to adopt standards that are identical to the California standards in order to meet the requirements of the CAA. The MPCA maintains that the LEV and ZEV standards themselves provide flexibility for manufacturers. For example, the ZEV standard gives manufacturers flexibility to develop and sell eligible vehicles, so each manufacturer can develop its own compliance strategy. Credits can be banked for future use so manufacturers can give themselves a buffer for future years where they might experience a dip in sales. Credits can also be bought and sold, so manufacturers can choose to not develop any EVs and instead comply by purchasing credits from other manufacturers.²⁰⁶

138. In addition, the MPCA is proposing a voluntary, flexible early-action credit system to allow manufacturers to choose to earn credits before the requirements of the rule begin. One of the goals of this program is to ensure manufacturers have flexibility in the first years of implementation, as intended by the rule. By offering early-action credits that accumulate at the same levels that will be available under the rule once it is enforced, MPCA maintains it is offering flexibility without reducing the emission reduction outcomes intended by the proposed rule.²⁰⁷

139. The MPCA states that the LEV standard also provides flexibility by allowing manufacturers to comply through a fleet averaging calculation that allows the manufacturer to achieve greater reductions from some vehicle models than others. There

²⁰¹ *Id.* at 83.

²⁰² *Id.* Adoption of these standards by the State of Virginia increases the totals originally referenced by the MPCA by one state for both the LEV and ZEV standards.

²⁰³ *Id.*

²⁰⁴ Minn. Stat. §§ 14.002; 131.

²⁰⁵ Minn. Stat. § 14.002.

²⁰⁶ Ex. D at 92.

²⁰⁷ *Id.*

are separate fleet-wide emission standards for passenger cars, light-duty trucks, and medium-duty vehicles. The rule provides flexibility for manufacturers by using a vehicle footprint-based calculation for determining the manufacturer's fleet-wide average. Under this system, the fleet-wide average requirement for a manufacturer who sells a higher percentage of larger trucks or cars would be less stringent than if they sold a higher percentage of smaller trucks or cars. According to the MPCA, this flexibility allows manufacturers to sell the types of vehicles that meets the needs of their customers while achieving overall emissions reductions.²⁰⁸

140. Finally, the MPCA states that the LEV standards provide additional flexibilities including banking and trading of credits across model years and trading of credits between manufacturers. And for the LEV standards, manufacturers may demonstrate compliance across California and all the Section 177 states rather than demonstrating compliance on a state-by-state basis.²⁰⁹

141. The MPCA has described how it considered the legislative policy related to performance-based regulatory systems, in compliance with Minn. Stat. § 14.131.²¹⁰

C. Consultation with the Commissioner of Minnesota Management and Budget

142. Minn. Stat. § 14.131 requires that agencies consult with the Commissioner of Minnesota Management and Budget (MMB) to help evaluate the fiscal impact and fiscal benefits of the proposed rule on local units of government.

143. On March 3, 2020, the MPCA sent a letter to MMB's Commissioner, along with the proposed rules and SONAR, seeking the required consultation.²¹¹

D. Summary of Requirements Set Forth in Minn. Stat. § 14.131

144. The Administrative Law Judge finds that the Agency has met the requirements established by Minn. Stat. § 14.131 for assessing the impact of the proposed rules, including consideration and implementation of the legislative policy supporting performance-based regulatory systems, and the fiscal impact on units of local government.

E. Cost to Small Businesses and Cities under Minn. Stat. § 14.127

145. Minn. Stat. § 14.127, requires the Agency to "determine if the cost of complying with a proposed rule in the first year after the rule takes effect will exceed \$25,000 for: (1) any one business that has less than 50 full-time employees; or (2) any one statutory or home rule charter city that has less than ten full-time employees." The

²⁰⁸ *Id.*

²⁰⁹ *Id.*

²¹⁰ Minn. Stat. § 14.131.

²¹¹ Ex. K-1 (transmittal letter to MMB). The record does not contain a reply from MMB's Commissioner, but it establishes that the MPCA fulfilled its obligation to engage in consultation.

Agency must make this determination before the close of the hearing record, and the Administrative Law Judge must review the determination and approve or disapprove it.²¹²

146. The proposed rule regulates and imposes compliance obligations on manufacturers, not dealers and not vehicle buyers such as small businesses or cities. The MPCA believes that no automobile manufacturer would be eligible for small business status under the statute. But even if an automobile manufacturer met the definition of a small business, the MPCA contends that compliance costs would not exceed \$25,000 for any one business.²¹³ The MPCA notes it is proposing to adopt existing standards and is structuring the rule so that reporting requirements are similar to most other Section 177 states. Consequently, it does not anticipate that there are any manufacturers, regardless of size, that would have any new, substantive costs beyond any that they are already managing.²¹⁴

147. The Administrative Law Judge finds that the MPCA has made the determinations required by Minn. Stat. § 14.127 and approves those determinations.

F. Adoption or Amendment of Local Ordinances

148. Under Minn. Stat. § 14.128, the agency must determine if a local government will be required to adopt or amend an ordinance or other regulation to comply with a proposed agency rule. The agency must make this determination before the close of the hearing record, and the Administrative Law Judge must review the determination and approve or disapprove it.²¹⁵

149. The MPCA concluded that, because the state air quality standards are not implemented at the local level, no local government will be required to adopt or amend an ordinance or other regulation to comply with the proposed rules.²¹⁶

150. The Administrative Law Judge finds that the MPCA has made the determination required by Minn. Stat. § 14.128 and approves that determination.

G. Consideration of Economic Factors

151. In addition to the evaluation of costs and parties likely to incur costs as a result of the proposed rule, as required in Minn. Stat. § 14.131, the MPCA is required by Minn. Stat. § 116.07, subd. 6 (2020), to give due consideration to:

the establishment, maintenance, operation and expansion of business, commerce, trade industry, and other economic factors and other material matters affecting the feasibility and practicability of any proposed action, including, but not limited to, the burden on a municipality of any tax which may result therefrom, and shall take or

²¹² Minn. Stat. § 14.127, subds. 1 and 2.

²¹³ Ex. D at 93.

²¹⁴ *Id.*

²¹⁵ Minn. Stat. § 14.128, subd. 1.

²¹⁶ Ex. D at 93.

provide for such action as may be reasonable, feasible, and practical under the circumstances.

152. The Administrative Law Judge concludes that the MPCA has adequately considered the economic factors associated with the proposed rule and has met the requirements of this statute by providing the required analysis regarding the possible economic impacts of the proposed rule.

H. Environmental Justice Policy

153. Presidential Executive Order 12898, issued by President Bill Clinton in 1994, directs each federal agency to make “achieving environmental justice part of its mission by identifying and addressing disproportionately high and adverse human health or environmental effects of its programs, policies, and activities on minority and low-income populations.”²¹⁷ This order builds on the Civil Rights Act of 1964, which prohibits discrimination on the basis of race, color, and national origin; all entities that receive federal funding are required to comply with the Civil Rights Act. The MPCA is a recipient of federal funds, and so has adopted a policy for environmental justice, which states:

The Minnesota Pollution Control Agency will, within its authority, strive for the fair treatment and meaningful involvement of all people regardless of race, color, national origin, or income with respect to the development, implementation, and enforcement of environmental laws, regulations, and policies.²¹⁸

154. The MPCA states that in Minnesota, Black, Indigenous, and People of Color (BIPOC) as well as lower-income individuals are exposed to higher levels of air pollution as a result of an ongoing history of structural racism and inequitable policies.²¹⁹ The MPCA notes that policies such as racial covenants, red lining, and the destruction of Black communities to build Interstates 94 and 35, as well as zoning and permitting decisions that concentrate pollution sources in communities of color and under-resourced communities continue to harm these communities.²²⁰

155. The MPCA asserts that these inequities are particularly evident in the distribution of exposure to air pollution from vehicles that have had lasting negative health effects on communities of color.²²¹ The MPCA states that in this rulemaking it is dedicated to implementing a framework to advance environmental justice and ensure equitable benefits of pollution controls and reductions in Minnesota.²²²

156. In developing the proposed rule, the MPCA states it sought meaningful involvement of communities of color and other under-resourced communities. The MPCA reached out to its Environmental Justice Advocacy Group, which is a 16-member advisory

²¹⁷ *Id.* at 84.

²¹⁸ *Id.*

²¹⁹ *Id.* at 83.

²²⁰ *Id.* at 83-84.

²²¹ *Id.* at 85.

²²² *Id.* at 84.

group representing various community groups, non-profit organizations, and environmental organizations. The MPCA shared information on the rulemaking, answered questions, took input, and asked the group to share information with their communities about commenting and public meetings on the rulemaking.²²³ The MPCA also briefed local tribal representatives at the quarterly Minnesota Tribal Environmental Council meeting about the proposed rule and sought input from them.²²⁴

157. The Administrative Law Judge concludes that the MPCA has complied with its environmental justice policy and federal law requiring such an analysis.²²⁵

VI. Rulemaking Legal Standards

158. A rulemaking proceeding under the APA must include the following inquiries: whether the agency has statutory authority to adopt the rule; whether the rule is unconstitutional or otherwise illegal; whether the agency has complied with the rule adoption procedures; whether the proposed rule grants undue discretion to government officials; whether the rule constitutes an undue delegation of authority to another entity; and whether the proposed language meets the definition of a rule.²²⁶

159. Under Minn. Stat. § 14.14, subd. 2, and Minn. R. 1400.2100, the agency must establish the need for, and reasonableness of, a proposed rule through an affirmative presentation of facts. In support of a rule, the agency may rely upon materials developed for the hearing record,²²⁷ “legislative facts” (namely, general and well-established principles that are not related to the specifics of a particular case, but which guide the development of law and policy),²²⁸ and the agency’s interpretation of related statutes.²²⁹

160. A proposed rule is reasonable if the agency can “explain on what evidence it is relying and how the evidence connects rationally with the agency’s choice of action to be taken.”²³⁰

161. By contrast, a proposed rule will be deemed arbitrary and capricious where the agency’s choice is based upon whim or devoid of articulated reasons, or if it “represents its will and not its judgment.”²³¹

162. An important corollary to these standards is that, when proposing new rules, an agency is entitled to make choices between different possible regulatory approaches,

²²³ *Id.* at 91.

²²⁴ *Id.*

²²⁵ See *id.* at 83-91 (providing the full environmental justice analysis).

²²⁶ See Minn. R. 1400.2100.

²²⁷ See *Manufactured Hous. Inst. v. Pettersen*, 347 N.W.2d 238, 240 (Minn. 1984); *Minnesota Chamber of Commerce v. Minnesota Pollution Control Agency*, 469 N.W.2d 100, 103 (Minn. Ct. App. 1991).

²²⁸ Compare generally *United States v. Gould*, 536 F.2d 216, 220 (8th Cir. 1976).

²²⁹ See *Mammenga v. Agency of Human Servs.*, 442 N.W.2d 786, 789-92 (Minn. 1989); *Manufactured Hous. Inst.*, 347 N.W.2d at 244.

²³⁰ *Manufactured Hous. Inst.*, 347 N.W.2d at 244.

²³¹ See *Mammenga*, 442 N.W.2d at 789; *St. Paul Area Chamber of Commerce v. Minn. Pub. Serv. Comm’n*, 251 N.W.2d 350, 357-58 (Minn. 1977).

so long as the alternative selected by the agency is a rational one. Thus, while reasonable minds might differ as to whether one or another particular approach represents “the best alternative,” the agency’s selection will be approved if it is one that a rational person could have made.²³²

163. The delegation of rulemaking authority is drawn from the Minnesota Legislature and is conferred upon the agency. A judge does not fashion requirements that the judge regards as best suited for the regulatory purpose. The legal review under the APA begins with this important premise.²³³

VII. General Analysis of Comments and MPCA Responses

164. This rulemaking proceeding generated significant public interest and the record contains thousands of comments, and tens of thousands of signatures on various petitions, in favor of and opposing the rule. The Administrative Law Judge has read and considered all comments submitted. This report does not discuss every comment received or issue identified, but instead includes a discussion of representative comments addressing issues of serious concern to commenters or that give rise to a genuine dispute about the reasonableness of the MPCA’s regulatory choices.

A. Discussion of Comments Favoring the Rule

165. Many commenters expressed support for adoption of the proposed rule. Among the supporters of the rule were numerous Minnesotans who wish to buy EVs and who would like to see more EV models made available for sale in Minnesota.²³⁴

²³² *Minnesota Chamber of Commerce*, 469 N.W.2d at 103; *Peterson v. Minn. Dep’t of Labor & Indus.*, 591 N.W.2d 76, 78 (Minn. Ct. App. 1999).

²³³ *See Manufactured Housing Institute, supra*, 347 N.W.2d at 244 (instructing that the state courts are to restrict the review of agency rulemaking to a “narrow area of responsibility, lest [the court] substitute its judgment for that of the agency”); *see also, In the Matter of the Proposed Rules of the Minnesota Pollution Control Agency Governing Permits for Greenhouse Gas Emissions*, Minnesota Rules Chapters 7005, 7007 and 7011, Docket No. 8-2200-22910-1 at 20, REPORT OF THE ADMINISTRATIVE LAW JUDGE (Minn. Office Admin. Hearings Nov. 9, 2012).

²³⁴ *See, e.g.*, Comments of Kevin Tholen (“My wife has range anxiety and was interested in a PHEV which would switch over to gasoline if the battery was depleted. We wanted a Toyota RAV4 Prime PHEV but were told there is a 2-year waiting list. If we want one sooner we should fly out to CA, buy it there and drive it home. Neither of these outcomes for PHEVs available in MN seem reasonable and these auto manufacturers don’t seem to be allowing free market choices for MN consumers.”); Comments of Jay Johnson (“I have recently been looking to buy the RAV4 plug-in hybrid but was disappointed that I could not find one in Minnesota to test drive. We have a trip to California planned in April and will do a test drive there.”); Comments of Gena Gerard (“I am in favor of the rule change. Our family has been searching for a plug-in hybrid in the Twin Cities, and they are almost completely unavailable to us here.”); Comments of Catherin Lexau (“My husband and I have shopped for EVs and except for prohibitively expensive cars, models that we’d like to purchase are just not available here in the Twin Cities metro. It is incredibly disappointing to see that these models are so much more available in states like California.”); Comments of Michael Shoop (submitted by Union of Concerned Scientists) (“I am sick and tired of being told by local car dealers, ‘We do not sell or service that car in Minnesota.’”); Comments of Laura Hannah (submitted by MN for Clean Cars) (“As a person who has purchased 3 EVs in the state of MN, I can confirm that the process was painful.”).

166. Environmental advocacy organizations strongly support adoption of the rule.²³⁵ Conservation Minnesota, a statewide conservation organization, contends that Minnesotans are already seeing the impacts of climate change here and that, without the rule, Minnesotans will not have access to cleaner cars in the marketplace.²³⁶ Environment Minnesota contends that; “The market simply isn’t going to fix this quickly enough . . . Rules are one way we express our values in a democracy, and if we are serious about fighting climate change, we need rules that reflect that.”²³⁷ Fresh Energy, the Minnesota Center for Environmental Advocacy (MCEA), the National Resource Defense Council (NRDC) and the Sierra Club filed a joint comment in favor of the rule. These organizations retained Shulock Consulting (Shulock) to analyze the impacts of the Clean Cars Minnesota, and Shulock’s report indicates it found the MPCA analysis of the emissions reduction benefits of the rule to be supported.²³⁸

167. In addition to submitting organizational comments, many environmental organizations also collected and submitted comments from their members and stakeholders. For example, the Sierra Club submitted comments supported by 6,630 signers, 1,674 of whom submitted individual statements.²³⁹ MCEA submitted a comment attaching submissions from 354 of its members in support of the proposed rules.²⁴⁰ Conservation Minnesota submitted 1,783 signatures from supporters on a petition in favor of the adoption of the rule.²⁴¹ Fresh Energy submitted comments it collected from 754 individuals in support of the rulemaking.²⁴² The NRDC submitted comments from 412 members and online activists favoring adopting of the rule.²⁴³

168. Religious and spiritual faith organizations, members of such communities, and their leaders, expressed support for the rule stemming from their religious beliefs or moral convictions regarding environmental stewardship.²⁴⁴

169. A number of businesses offered support for the rule. Ceres BICEP (Business for Innovative Climate and Energy Policy) Network (Ceres BICEP) is a coalition of 70 major employers and manufacturers across the United States, many of which have operations in Minnesota.²⁴⁵ Its members include McDonald’s Corporation, the Kellogg Company and General Mills, Inc., Starbucks, Aveda, Owens Corning, and REI, among others.²⁴⁶ Ceres BICEP supports adoption of the proposed rule on behalf of its members,

²³⁵ See, e.g., Comments of Minnesota Environmental Partnership, Minnesota Center for Environmental Advocacy, Conservation Minnesota, Environment Minnesota, Sierra Club, Minnesota Valley Chapter of the Izaak Walton League.

²³⁶ Comments of Conservation Minnesota.

²³⁷ Comments of Environment Minnesota.

²³⁸ Comments of Fresh Energy, MCEA, NRDC and Sierra Club.

²³⁹ Comments of Sierra Club.

²⁴⁰ Comments of MCEA.

²⁴¹ Comments of Conservation Minnesota.

²⁴² Comments of Fresh Energy.

²⁴³ Comments of NRDC.

²⁴⁴ See, e.g., Comments of Mike Hirsch, Alison Hoyer (submitted by MN 350), Charissa Verdoorn, Minnesota Interfaith Power and Light, ISAI AH, Oak Grove Presbyterian Church, Comment of Franciscans of Little Falls, Minnesota.

²⁴⁵ Comments of Ceres BICEP.

²⁴⁶ *Id.*

noting that corporate vehicle fleets are a major component of its members' emission reduction efforts and represent a significant operating cost.²⁴⁷ Ceres BICEP asserts that its members recognize that climate change represents a substantial business risk, and that deployment of LEVs and ZEVs is an important means to mitigate climate impact and reduce business costs.²⁴⁸

170. Six businesses within the Ceres BICEP coalition that have significant operations and investments in Minnesota, Clif Bar & Company, Ikea Retail U.S., JLL, Lyme, Lyft, and Uber Technologies Inc., submitted a separate statement in support of the rule, noting that clean vehicles need to be available in greater numbers and with greater predictability to provide certainty for businesses and investors to plan ahead.²⁴⁹

171. Clean Energy Economy MN (CEEM) is an industry-led nonprofit with over 40 clean energy company members that range from start-up businesses to Fortune 100 companies. CEEM supports adoption of the rule, noting that prior to the COVID-19 pandemic, nearly 62,000 Minnesotans worked in the state's clean energy industry, with clean energy jobs growing 2.5 percent faster than all other segments of the economy. CEEM contends that the sector declined during the pandemic, but that it is poised for recovery. Further, CEEM contends that that climate risk is a risk for businesses and that a movement toward low-carbon and carbon free economies is critical to showing investors, customers, employees, and stakeholders that Minnesota is "open for business."²⁵⁰

172. Health professionals and health organizations commented in favor of the rule.²⁵¹ Health Professionals for a Healthy Climate (HPHC) is a network of over 500 nurses, doctors, public health experts, and allied public health professionals from across Minnesota.²⁵² HPHC supports adoption of the proposed rule, noting that while some health impacts were considered by MPCA in proposing the rule, health professionals anticipate even greater positive health impacts because of the number of conditions impacted by air pollution that are not recognized in the sources the MPCA used.²⁵³ The MDH supports adoption of the rule noting the link between air pollution and deaths, hospitalizations, and emergency room visits, noting that adverse health impacts from air pollution disproportionately effect people living in poverty and BIPOC Minnesota residents.²⁵⁴ A joint comment submitted by the Minnesota chapter of the American Lung Association, HPHC, Health Students for a Healthy Climate, and the Minnesota Public

²⁴⁷ *Id.*

²⁴⁸ *Id.*

²⁴⁹ Comments of Ceres BICEP members Clif Bar & Company, Ikea Retail U.S., JLL, Lyme, Lyft, and Uber Technologies Inc.

²⁵⁰ Comments of CEEM.

²⁵¹ See Comments of Jenna Yeakle M.P.H. Candidate (submitted by Union of Concerned Scientists); Comments of Bruce O'Brien (submitted by Union of Concerned Scientists); Comments of Margaret Dexheimer Pharris, Ph.D., RN, MPH, FAAN.

²⁵² See Comments of HPHC.

²⁵³ *Id.*

²⁵⁴ Comments of MDH.

Health Association asserts that the “ZEV and LEV standards are not an option, but a necessity to protecting public health today and for future generations.”²⁵⁵

173. Numerous Minnesota governmental commenters expressed support for the rule. Several Minnesota cities submitted comments supporting the rule because adoption will assist them in meeting municipal climate goals.²⁵⁶ For example, the City of Minneapolis notes that state law prohibits municipalities from adopting more stringent standards than those adopted by the state, therefore, state support for local governments seeking to reduce GHG’s is necessary for municipalities to meet their goals.²⁵⁷ The City of Duluth also favors adoption of the rule, noting that Duluth’s Lincoln Park neighborhood is overburdened with localized air pollution from highway emissions and that this rule will have a positive impact on vulnerable communities such as this one.²⁵⁸ Duluth also indicated that it supports increasing consumer choices, including the choices it has as a city for its own fleet of vehicles.²⁵⁹ Representative Dean Phillips of Minnesota’s 3rd Congressional District commented in favor of the health and environmental impacts of the rule, and noted the reduced cost of ownership for EV owners and anticipated benefits to the state’s electricity grid.²⁶⁰

174. Though many commenters expressed concerns that EVs are not appropriate vehicles for out-state residents of Minnesota, and that demand for such vehicles in these areas does not exist, the record contains many comments from Minnesotans living in out-state areas who want to purchase EVs. Craig Sterle lives 13 miles south of Cloquet, wants to purchase a RAV4 Prime, and anticipates he may be able to make the 80-mile round trip between his home and Duluth on battery power alone if he can find a Phase 2 or 3 charging station in Duluth.²⁶¹ Becky Parker of Ortonville, Minnesota states that rural Minnesota is often forgotten when new technologies are adopted and notes some areas still struggle with reliable internet access; she states that rural Minnesota needs to be included in the adoption of clean cars as much as the metro and that statewide polices will make that possible.²⁶² Commenter Angela Smith is a

²⁵⁵ Comments of American Lung Association Minnesota, HPHC, Health Students for a Healthy Climate, and the Minnesota Public Health Association.

²⁵⁶ See, e.g., Comments of the Cities of Eden Prairie, Northfield (City Council and Environmental Quality Commission), St. Louis Park, Bloomington Sustainability Commission; see also Comments of Resilient Cities & Communities (noting that it supports a growing network of 40 Minnesota cities working to achieve climate goals, including by expanding infrastructure); Comments of St. Anthony Park Community Council; Comments of St. Paul’s District 10 Como Community Council.

²⁵⁷ Comments of City of Minneapolis.

²⁵⁸ Comments of the City of Duluth.

²⁵⁹ *Id.*

²⁶⁰ Comments of Representative Dean Phillips.

²⁶¹ Comments of Craig Sterle.

²⁶² Comments of Becky Parker (submitted by CURE); see also Comments of Margaret Kuchenreuther (submitted by CURE) (stating she is a professional conservation biologist and rural Minnesotan from Morris, Minnesota and she intends for her next vehicle to be an EV); Comments of Steven Baxa (submitted by Fresh Energy) (“In rural Minnesota, we have the least access to the full range of makes and models available in Minnesota . . . Clean Cars Minnesota would change that by bringing more types of cars and trucks here, giving us more options to choose from.”); Comments of Rita Chamblin (“I live 11 miles northeast of Bemidji and would like an EV for trips into town. Contrary to what my state rep says, many of us in the north country are excited about having an EV for one of our vehicles.”).

farmer in Southeast Minnesota and states she sees the impacts of climate change firsthand. She commented that her farm has experienced a greater number of flood events in recent years and that “[t]he most recent flood saw my production field under 12 feet of water for three days, completely ruining my crops (and therefore my entire income) for the year.”²⁶³ Her family has bought EVs, but they found the lack of options in Minnesota frustrating. She states: “Why should consumers in California and New York have more purchasing options than people in Minnesota?”²⁶⁴

175. Some commenters anticipated positive economic impacts for rural areas in Minnesota if the rule is adopted. Miranda Gohn of Litchfield, Minnesota expressed her belief that EVs are “an economic opportunity for our dealer franchise owners who are vital to our communities especially here in Greater Minnesota.”²⁶⁵ Commenter Doug Heuer suggested that building EV charging infrastructure in out-state Minnesota will lead to better economic opportunities there, indicating: “Think of all the green jobs for northern MN to build out that infrastructure.”²⁶⁶

176. CURE, which stands for Clean up the River Environment, explains that its staff and most of its board and membership are rural residents. CURE contends that rural communities could benefit the most from adoption of the proposed rule, as rural residents often need to drive farther to get to work and school, for shopping, and to access healthcare services. CURE maintains that these additional miles driven mean more savings for rural Minnesotans. CURE also asserts that Minnesota’s electric cooperatives could benefit from adoption of the rule, as they can use networks of EVs in a coordinated way as a distributed energy resource.²⁶⁷

B. Discussion of Comments Expressing Opposition to the Rule²⁶⁸

177. Many commenters expressed opposition to the proposed rule based upon misperceptions about the language, scope, or effect of the rule. For example, many commenters oppose the rule because they believe that that the rule will require them to purchase an electric vehicle, or that it will forbid manufacturers and dealers from selling gas-powered ICE vehicles in the future.²⁶⁹ As noted by the MPCA, the rule does not require any person to purchase an EV and the rule does not adopt any standard that

²⁶³ Comments of Angela Smith.

²⁶⁴ *Id.*

²⁶⁵ Comments of Miranda Gohn (submitted by MN for Clean Cars).

²⁶⁶ Comments of Doug Heuer (submitted by Fresh Energy).

²⁶⁷ Comments of CURE.

²⁶⁸ Note that this section of the Report also discusses some comments favoring the proposed rule where relevant to provide context and a complete picture of the rulemaking record.

²⁶⁹ Comments of Kathi Gruenhagen (“The State of Minnesota should NOT dictate what a dealership must sell and what a consumer must purchase.”); Comments of the Laurentian Chamber of Commerce (“If we choose not to burden Minnesota with this mandate no one is negatively impacted. Those who want electric vehicles can still buy them. Those who don’t want EVs are not forced to buy them and no one[’s] costs will be artificially increased. We should be given the right to choose what sort of vehicle we purchase.”); Comments of Loras Holmberg (“Government is forcing us to buy vehicles that they ‘ok.’”); Comments of Jerry Thomasson (“I totally disagree with the MPCA proposal to force electric vehicles on Minnesota citizens.”).

would prevent dealers from selling, or Minnesotans from purchasing, an ICE vehicle.²⁷⁰ The rule does not require a phase-out of ICE vehicles.²⁷¹

178. Some commenters expressed concerns about regulatory measures that are not at issue in this rulemaking. For example, some commenters are concerned that gas-fired cooking grills or motorsports vehicles will be regulated or banned.²⁷² Some commenters expressed concern that the rule would regulate farm equipment.²⁷³ The MPCA responds that the rule regulates only light- and medium-duty vehicles, and it specifically notes that the rule does not regulate farm equipment.²⁷⁴

179. Organizations representing the trucking industry and other industries, and agricultural interest groups of farmers and livestock producers, are concerned that regulations regarding emissions standards will increase transportation costs for their businesses. In particular, some of these commenters expressed concern that the rule will be expanded to include diesel-fueled vehicles in the future; they maintain that such regulations will increase costs and put them at a competitive disadvantage in the marketplace if they are forced to buy electric vehicles.²⁷⁵ As an example, the Minnesota Turkey Growers Association expressed that efforts to ban or limit diesel-fueled vehicles would endanger the food supply chain and Minnesota's ability to feed the world.²⁷⁶ The MPCA responds that this rule does not regulate heavy-duty vehicles or eliminate diesel-fueled vehicles. If, in the future, California adopts standards addressing these vehicles, those standards will not become a part of Minnesota's rule automatically because Minnesota would need to conduct a new rulemaking to address any future regulations.²⁷⁷ Further, the MPCA does not anticipate that the proposed rule will have an impact on farming operations.²⁷⁸

180. Some commenters indicated that the rule is not needed or reasonable because they do not believe that climate change is a real phenomenon.²⁷⁹ Conversely, other commenters contend that climate change is a vast and complex global problem, and that the rule is not needed and reasonable because regulating vehicle emissions in

²⁷⁰ Ex. D at 51; MPCA Rebuttal Comments.

²⁷¹ MPCA Rebuttal Comments.

²⁷² Comments of Tanya Peterson ("Hurts anyone that does Motorsports."); Comments of Darren Durst ("Unelected bureaucrats in California could decide to ban gas powered lawnmowers or gas grills and Minnesotans would have no say in the matter.").

²⁷³ See, e.g., Comments of Alyssa Lee; Comments of Janie Baker.

²⁷⁴ MPCA Rebuttal Comments.

²⁷⁵ Comments of the Minnesota Trucking Association, Minnesota Association of Wheat Growers, The Minnesota State Cattlemen's Association, Minnesota Water Well Association, Minnesota Industrial Hemp Association.

²⁷⁶ Comments of Minnesota Turkey Growers Association.

²⁷⁷ MPCA Rebuttal Comments.

²⁷⁸ Ex. D at 96.

²⁷⁹ Comments of Robb Fehrman ("The climate IS changing & always will, we humans are powerless to halt it . . . Contrary to popular belief, WE ARE NOT IN CLIMATE CRISIS!!!"); Comments of Brian Peterson ("It is not needed in Minnesota- our air is clean and Minnesota is not experiencing global warming."); Comments of Rick Swenson ("Climate change is made up and only meant to control and tax us in the future. The earth changes thru time that's what it does. Man made climate change is a hoax."); Comments of Benjamin Zycher ("The climate 'crisis' justification for the EV mandate is deeply dubious.").

Minnesota will not yield any appreciable impact on global climate problems.²⁸⁰ The MPCA does not agree that climate change is not real or not human-caused, noting that the basic science of climate change is widely accepted in the scientific community.²⁸¹ The MPCA agrees that climate change and rising global temperatures are complex problems and that the overall impact of Minnesota's emissions regulations will necessarily be small, but it contends that this does not mean Minnesota should not act now to address emissions issues.²⁸² The MPCA also notes, in response to both of these concerns, that the legislature has identified GHG emissions reduction goals for Minnesota to meet and these rules are being promulgated to meet those targets.²⁸³

181. Some commenters contend that the MPCA has overstated the reduction in PM emissions and the health-related benefits to be achieved by the rule. For example, Guy Caruso, who is the former Administrator of the U.S. Energy Information Administration, objected to the rule because MPCA initially relied on PM calculations that it ultimately restated, and he noted that the estimated reduction in PM emissions was far less than MPCA originally calculated.²⁸⁴ The MPCA responds that its transcription error related to PM, now corrected, affects the degree and not the direction of the PM-related benefits of the rule. The MPCA notes that PM reductions from the rule will have a positive impact on the health of Minnesotans, but also that the primary goal of the rulemaking is to address GHG emissions.²⁸⁵

182. Numerous commenters contended that the MPCA has not adequately considered the life-cycle emissions of EVs, including emissions generated during production, associated with charging, and connected with battery production and end-of-life disposal of EVs and their batteries.²⁸⁶ These commenters contend that factoring in these additional emissions inputs, particularly those associated with energy production for charging, means that EVs are not actually zero emission vehicles.²⁸⁷ Commenters contend that the MPCA has overstated GHG and other emissions reductions, and by so much, that the rule is not needed and reasonable.²⁸⁸ Other commenters contend that the

²⁸⁰ Comments of Amy Koch; Comments of Institute for Energy Research ("Minnesota's transportation reductions would bring global totals down by less than one-one hundredth of one percent. The emissions reductions, even in the best-case scenario, will be so trivial on the global scale as to render measurement of the policy's success impossible, in terms of the key theme of a climate crisis.").

²⁸¹ MPCA's Rebuttal Comments.

²⁸² *Id.*

²⁸³ *Id.*; Minn. Stat. § 216H.02, subd. 1.

²⁸⁴ See, e.g., Comments of Guy Caruso.

²⁸⁵ MPCA Rebuttal Comments.

²⁸⁶ See Comments of American Petroleum Institute Midwest Region; Comments of Upper Midwest Law Center; Comments of the Center of the American Experiment; Comments of ConservAmerica; Rebuttal Comments of American Fuel and Petrochemical Manufacturers and the American Petroleum Institute Midwest Region.

²⁸⁷ Comments of American Petroleum Institute Midwest Region; Comments of Phil Kugler ("The emissions to manufacture an EV is higher and the energy to propel the vehicle is just shifted to the power grid so they are not zero emission [vehicles]. They are mostly coal powered vehicles."); Comments of Ellen R. Wald (noting the use of coal to produce electricity in Minnesota and that "in Minnesota the electric grid is not always as clean as we believe.").

²⁸⁸ Comments of the Center of the American Experiment; Comments of Clean Fuels Development Coalition.

MPCA has not adequately considered the impacts of mining lithium for use in EV batteries.²⁸⁹

183. The MPCA did not address emissions generated during the manufacturing or disposal process for EVs in this rule because the rule proposes to regulate tailpipe emissions.²⁹⁰ The MPCA asserts that it did consider the upstream emissions generated by charging and found that the proposed rule would result in substantial benefits, even factoring in the emissions relating to energy generation.²⁹¹ The MPCA also notes that it used conservative, but reasonable, assumptions based on known future closures of coal plants, and it considered a worst case scenario in which the electricity used to charge EVs is generated 50 percent from coal and 50 percent from natural gas. Even in this scenario, the MPCA found a net emissions benefit from the proposed rule.²⁹² Commenters favoring the rule also noted that emissions from energy generation used to charge EVs will become cleaner as Minnesota continues its trend toward renewable energy sources,²⁹³ and some commenters explained that they have installed solar panels at their homes that they use to charge EVs without generating emissions.²⁹⁴

184. Some commenters are concerned about the impacts to Minnesota's electrical grid and whether it can bear the draw on power necessitated by EV charging.²⁹⁵ Some commenters also contend that the cost of ownership of EVs will not be as economical as forecasted by the MPCA due to increases in the cost of electricity.²⁹⁶

185. The MPCA asserts that an analysis of impacts to the electric grid are outside the scope of this rulemaking, as the PUC regulates electricity and natural gas in Minnesota. The MPCA notes that it is within the jurisdiction of the PUC to ensure that a sufficient supply of electricity exists, and the PUC is responsible for setting utility rates. The MPCA responds, however, that the PUC has conducted proceedings related to EV adoption and it found that electrification of Minnesota's transportation sector is in the public interest, particularly related to GHG emissions reductions.²⁹⁷

186. Automobile manufacturers, which are the only entities directly regulated by the rule, objected to adoption of the proposed rule. Auto Innovators represents automakers that produce and sell approximately 99 percent of the light-duty cars and

²⁸⁹ See, e.g., Comments of Jo Ann Sternberg; Comments of Mitz Law; Comments of Dawn Van Kuelen.

²⁹⁰ MPCA Preliminary Response to Comments; MPCA Rebuttal Comments.

²⁹¹ MPCA Rebuttal Comments; see also Ex. D at 77-81.

²⁹² MPCA Rebuttal Comments.

²⁹³ Comments of Bill Adamski; Comments of Nathan Moe; Tr. Vol. I at 73 (Tom Valois), 85 (Mike Brooks), 156 (Simon Horowitz); Tr. Vol. II at 320-321 (Michael Huber); 346 (Richard Blake); 402 (Benjamin Gorman)

²⁹⁴ Tr. Vol. I at 113 (Mike Lee); Tr. Vol. II (David Jungst).

²⁹⁵ Comments of American Petroleum Institute Midwest Region (stating that the proposed rule fails to take into account the cost of infrastructure upgrades to power EVs); Comments of Rebecca Olson (“[H]ow are we to power millions of electric cars and expect our power grid to charge every car?”); Comments of Barbara DeVries (“Another great concern is that our current power grid is not equipped to supply energy to the proposed charging stations. In Minnesota we already struggle with power outages during the coldest days of winter and the hottest days of summer when electricity usage is highest.”).

²⁹⁶ See Comments of the Upper Midwest Law Center.

²⁹⁷ MPCA Rebuttal Comments.

trucks sold in Minnesota. It states that its members are committed to the goal of net zero carbon transportation, and ZEVs and EVs are critical to meeting this goal. Auto Innovators states that automobile manufacturers have made, or have committed to making, investments of more than \$250 billion in ZEVs though 2023 alone, and that the auto industry is accelerating its path to electrification with aggressive goals.²⁹⁸ Auto Innovators states that automakers offer more than 50 ZEV models now and that number will increase to 130 ZEV models within the next five years.²⁹⁹

187. Despite this commitment to the electrification of transportation, Auto Innovators opposes adoption of the proposed rule. Auto Innovators disputes that the ZEV portion of the rule will spur increased EV adoption, noting that EVs have not gained market share in a number of Section 177 states. Auto Innovators counters assumptions made by the MPCA in the SONAR. Specifically, Auto Innovators objects to the MPCA's assumption that costs borne by manufacturers will be passed along to consumers. Auto Innovators contends that due to the high cost of batteries and consumer demands for longer travel ranges, a portion of the increased costs have been covered by federal and state purchase incentives, while any remaining portions consumers are unwilling to pay have been absorbed by manufacturers. Auto Innovators also disputes the MPCA's contention that automobile manufacturers will not face additional research and development costs or increased staff time to comply with the regulations.³⁰⁰ Auto Innovators takes issue with the MPCA's approach to the ZEV portion of the rule. It notes that Minnesota's increasing targets would require manufacturers to make available approximately 17,000 ZEVs per year by MY 2025, a 450% increase over current availability. Auto Innovators contends that California has increased EV sales, but that it did so by investing millions of dollars in incentives and infrastructure development.³⁰¹

188. Auto Innovators objects to adoption of the proposed rule because it believes complementary incentives and supports are necessary to spur demand for EVs in Minnesota. Auto Innovators maintains that the rule should be accompanied by a suite of measures that includes incentives and education to drive sales, and that the proposed rule lacks these elements. Auto Innovators recommends a variety of strategies to build a true EV market in Minnesota and that the state commit \$500 million to such programs. Auto Innovators also recommended that the MPCA delay this rulemaking an additional year to allow time to assess the regulatory impact of changes California may make to its standards and to put complementary programs in place prior to adoption of the rule.³⁰²

189. Auto Innovators is not alone in noting the need for additional incentives to support EV sales. The Northeast States for Coordinated Air Use Management (NESCAUM), is the nonprofit association of state air quality agencies in Connecticut, Maine, Massachusetts, New Hampshire, New Jersey, New York, Rhode Island, and Vermont. Seven of NESCAUM's eight member states have adopted California's clean air

²⁹⁸ Comments of Auto Innovators.

²⁹⁹ Rebuttal Comments of Auto Innovators.

³⁰⁰ Comments of Auto Innovators.

³⁰¹ *Id.*

³⁰² *Id.*

standards and it advises states regarding adoption of the LEV and ZEV standards.³⁰³ NESCAUM states that Section 177 states have adopted a variety of programs to assist dealers in marketing and selling EVs, such as point-of-sale EV incentive programs, dealer workshops and training, and awards for EV dealers.³⁰⁴ Consumer Reports filed a comment noting that 67 percent of Minnesotans think that the state should offer incentives to make it easier for consumers to purchase and charge EVs.³⁰⁵ Minnesota consumers commenting in support of the rule referenced available tax incentives that made their EV purchases more affordable and articulated support for additional incentives.³⁰⁶ Fifty-eight Minnesota legislators filed a comment in support of the rule, agreeing that purchase and dealer incentives, dealer training, and investments in infrastructure are worthy ideas, and they asserted that legislation establishing supportive measures is pending or that these supports can be put in place during the two-year window before the rule is fully effective.³⁰⁷

190. With respect to its assumptions about manufacturer costs, the MPCA responds that it engaged with Auto Innovators during the development of the proposed rule, and that Auto Innovators did not provide evidence of direct, incremental costs that manufacturers could expect to experience. The MPCA also notes that Auto Innovators' comments filed in this matter contain no such evidence. The MPCA maintains that its assumptions are relevant in the absence of specific information to the contrary. Even if manufacturers face increased costs, the MPCA notes that Auto Innovators itself states that such companies are investing \$250 billion into the EV market by 2023, and that Auto Innovators has not attributed any of those costs to compliance with the proposed rule in Minnesota. Additionally, the MPCA references a study authored by McKinsey & Company in March of 2019, stating that EVs are not as profitable as ICE vehicles today, but that EVs have the potential to reach cost parity with, and become equally or more profitable than, ICE vehicles by around 2025.³⁰⁸

191. With respect to complementary supports for the EV market, the MPCA recognizes that a ZEV mandate alone cannot be the only tool used to spur EV sales. It states that the ZEV standard is part of a portfolio of options that will be used.³⁰⁹ In its SONAR, the MPCA contended that a variety of activities can increase EV sales, but that studies have not conclusively determined which policies and initiatives are the most effective.³¹⁰ The MPCA maintains that an "all of the above" approach is likely to produce the fastest and most robust results, and that adopting the ZEV standard is part of that

³⁰³ Comments of NESCAUM.

³⁰⁴ *Id.*

³⁰⁵ Comments of Consumer Reports.

³⁰⁶ Comments of Tom Bothwell (submitted by Fresh Energy) ("Tax incentives should be an immediate tool."); Comments of Michael Noble (submitted by Fresh Energy) (noting that the federal tax incentive for his PHEV made the purchase price comparable to that of the gasoline-powered version of his vehicle); Comments of Jack Sewpersaud (contending that short-term incentives must be provided to ensure the price of EVs is not cost prohibitive for consumers).

³⁰⁷ Comments of 58 Members of the Minnesota Senate and House of Representatives.

³⁰⁸ MPCA Rebuttal Comments.

³⁰⁹ *Id.*

³¹⁰ Ex. D at 44.

strategy.³¹¹ The MPCA details other steps undertaken by Minnesota state agencies to support EV deployment in Minnesota, including investments in charging infrastructure, EV fleet charging grants, support for heavy-duty electrification, state government EV fleet purchasing, a MnPASS incentive offered by MnDOT, public utility programs that offer incentives for EV charging, and educational efforts through Drive Electric Minnesota.³¹² The MPCA notes that, to date, the Minnesota Legislature has not provided funding for purchase incentives or a directive to the MPCA to develop an incentive.³¹³ The MPCA recognizes that more efforts are needed and it is committed to working with the Minnesota Legislature to develop EV-supportive policies.³¹⁴ The MPCA also contends that manufacturers and dealers play a role in supporting EV sales as well, through advertising and dealer education.³¹⁵

192. Manufacturers Tesla and Rivian are not represented by Auto Innovators and these companies support the rule. Tesla states that adoption of a ZEV standard will result in more ZEVs on Minnesota roads and reduced tailpipe emissions, and it notes that EV adoption is viewed as one reason for optimism in the effort to reduce global GHG emissions.³¹⁶ Rivian is an independent manufacturer of “Electric Adventure Vehicles,” and it intends to begin delivery of all-electric trucks, SUVs, and last-mile delivery vans during the summer of 2021. Rivian supports adoption of the rule, noting in its rebuttal comments that “[t]he entire point of regulation is to influence behavior and outcomes. If all agencies were to only implement regulations that supported ‘business as usual’ behavior, agencies could not affect positive outcomes via regulation in a meaningful manner.”³¹⁷

193. Automobile dealers are not directly regulated by the rule, but numerous commenters expressed concerns about the impact of the rule on dealers.³¹⁸ In particular, MADA opposes the rule. MADA is a trade association representing 348 franchised new car dealers, which make up 98 percent of the market in Minnesota. These dealers directly employ over 20,000 Minnesotans and had total sales in 2019 of \$15.9 billion, generating over \$1 billion in motor vehicle sales tax to support Minnesota’s highway and transit infrastructure.³¹⁹

194. MADA maintains that dealers will be harmed by the proposed rule. According to MADA, dealers will be required to make substantial financial investments to sell EVs, but the EV market in Minnesota is not strong enough to allow dealers to sell the

³¹¹ *Id.*

³¹² *Id.* at 44-46.

³¹³ *Id.* at 67.

³¹⁴ MPCA Rebuttal Comments.

³¹⁵ *Id.*

³¹⁶ Comments of Tesla.

³¹⁷ Comments of Rivian; Rebuttal Comments of Rivian. Note that though both Tesla and Rivian support adoption of the proposed rule, each provided comments on Minnesota’s approach to ZEV crediting, which will directly impact their interests, as discussed further below.

³¹⁸ See Comments of Fargo Moorhead West Fargo Chamber of Commerce/Downtown Moorhead, Inc.; Comments of the Winona Chamber of Commerce; Comments of the Economic Development Authority for the City of Marshall.

³¹⁹ Comments of MADA.

number of EVs manufacturers will be required to deliver for sale here.³²⁰ MADA also contends that, without making a significant investment in EVs, some dealers may not be authorized by manufacturers to sell EVs, leaving dealers that are authorized to absorb the capacity required by the ZEV quota.³²¹ Additionally, MADA maintains that the LEV standard will make vehicles more expensive, making Minnesota car dealers less competitive, particularly to buyers in border states.³²² MADA asserts that Minnesota dealers will be unable to trade for cars in states that have not adopted the LEV and ZEV standards, limiting the cars Minnesota dealers can get for customers and increasing costs.³²³

195. MADA submitted statements of car dealers expressing they anticipate negative impacts on their businesses from adoption of the proposed rule. Among the concerns they articulated are the cost of floor plan financing used for dealers to purchase cars to make available for sale on their lots and concerns that they will be unable to sell EVs and will ultimately be required to sell them at a loss.³²⁴ These dealers note that manufacturers may not force them to choose certain inventory, but that when a dealer submits a supplemental order for popular vehicles to meet demand, the manufacturer can condition delivery of those additional vehicles on the dealer's acceptance of less desirable models.³²⁵ If a vehicle remains on a dealer's lot for more than six months, the dealer could face "curtailment" and be subject to paying significant amounts for principal and interest on the vehicles.³²⁶ These auto dealers also expressed concerns about the impact of the rule on cross-border sales transactions and trades, and offered the opinion that they will be disadvantaged if the rule is adopted.³²⁷

196. Steve Whitaker, the owner of Whitaker Buick GMC in Forest Lake, Minnesota, attested to the dealership's costs in anticipation of selling the electric Hummer.³²⁸ He represents that it will cost the dealership \$560,000 to prepare to sell the Hummer, including installation of chargers and equipment to service EVs, expansion of the service area by an additional 50 feet to accommodate required space between service stalls, and the cost of an electric Hummer for customers to test drive.³²⁹ He states that his dealership embraces selling EVs, but that he does not believe that the proposed rule is right for Minnesota due to the cost, cold weather and range issues, and the lack of state-wide charging stations.³³⁰ Chester Lockwood is the owner of Lockwood Motors in

³²⁰ *Id.*

³²¹ *Id.*

³²² *Id.*

³²³ *Id.*

³²⁴ *Id.* (attaching Affidavit (Aff.) of Douglas Erickson (Erickson Aff.), Aff. of Timothy Ciccaralli (Ciccarelli Aff.), Aff. of Gregory House).

³²⁵ *See id.* (Erickson Aff., Ciccarelli Aff.).

³²⁶ *Id.*

³²⁷ *Id.* at Erickson Aff; Ciccarelli Aff.; *see also* Comments of Case Muscatell (expressing concerns about consumer demand and cross-border sales of cars to residents of other states, and indicating that his family may move their Subaru dealership to a state with a friendlier business environment).

³²⁸ Comments of MADA (Aff. of Steve Whitaker).

³²⁹ *Id.*

³³⁰ *Id.*

Marshall, Minnesota, which sells Chevrolet, Cadillac, Chrysler, Jeep and Ram vehicles.³³¹ Lockwood Motors sold the Chevrolet Volt when it was offered and now sells the Bolt, neither of which were profitable for the dealership.³³² Lockwood Motors will not sell Cadillac EVs because it anticipates that it will not be able to recoup the anticipated \$200,000 cost of preparing the dealership to sell EVs.³³³

197. It should be noted that opposition among automobile dealers was not universal. Paul Blomquist, the owner of C & M Ford, Chrysler, Dodge, Jeep, and Ram of Hallock and Roseau County Ford, expressed support for the rule, noting that his customers are requesting EV options and that he “can’t wait” to sell them.³³⁴ He noted that business and public opinion are changing and that Minnesota should lead through these challenges instead of following, though he echoed other comments in expressing that complementary supports from the government and manufacturers are necessary to support dealers as they supply these vehicles to customers.³³⁵ Mike Lee, who is a third-generation car dealer in Maine, commented on his experience as a dealer in a cold-weather Section 177 state, and explained that he would not have access to the volume of EVs he has if not for Maine’s adoption of California’s standards.³³⁶ He states that his challenge has been getting as many cars as his dealership needs and that demand often outstrips supply.³³⁷

198. CARB, the California agency that sets emissions standards, commented that the California standards have not prevented new car and truck dealerships in California from meeting customer demands, they are able to offer a full range of vehicle options, and based upon its examination of profitability issues in connection with setting standards for MY 2017, it did not expect that dealer profitability to suffer due to the rule.³³⁸ NESCAUM’s comments addressed whether dealers of EVs have experienced cars sitting on lots that they are not able to sell. NESCAUM notes that EVs have been similar to other types of cars, with some makes and models selling better than others. NESCAUM contends that dealer engagement is an important factor in whether EVs sell well.³³⁹ Additionally, some commenters posited that Minnesota dealers may see positive impacts from the rule as buyers from nearby states may seek to purchase EVs from the nearest dealer in Minnesota.³⁴⁰ Residents of other states also commented in favor of the rule,

³³¹ Comments of MADA (Aff. of Chester Lockwood).

³³² *Id.*

³³³ *Id.*; see also Comments of Aaron Plafcan (“I do work for a Chevrolet dealership and I am one of the Bolt salesman. . . . Some of you on here speak about dealerships not wanting to stock EV’s or not having inventory. It is partly on the dealership and mostly on the manufacturer. The manufacturer sends most of the EV inventory to big EV areas such as LA, Atlanta, Washington, Oregon etc. The cost that dealers incur from the manufacturer to make sure you have proper equipment, sales staff that’s trained, [s]ervice technicians trained to work on them is about 25,000-50,000 depending on the requirements. That’s a lot of investment that dealerships need to take a hard look at to see if they will get a return on.”).

³³⁴ Comments of Paul Blomquist.

³³⁵ *Id.*

³³⁶ Tr. Vol. II at 292 (Mike Lee).

³³⁷ *Id.*

³³⁸ Comments of CARB.

³³⁹ Comments of NESCAUM.

³⁴⁰ Comments of Jane Stock (submitted by MN for Clean Cars) (“Is it not possible . . . that car buyers from Grand Forks and Fargo might come to Fergus Falls to purchase electric vehicles?”); Comments of David

noting their plans to purchase EVs and that they will do so in Minnesota if vehicles become available here under the rule.³⁴¹

199. The MPCA responds to the concerns of dealers by noting that consumer demand for EVs in Minnesota exists, as detailed by the many commenters who wish to purchase EVs in Minnesota, but were unable to do so, and many of whom ultimately bought from dealers in other states.³⁴² The MPCA notes that dealer education plays a role in EV demand, referencing commenters who indicated that they sought EVs at Minnesota dealerships, but found that dealer employees did not know about EVs and were not motivated to sell them.³⁴³ The MPCA further points out that automakers already intend to increase the number of EVs on the market, which will be placed with dealers to sell, independent of this rulemaking.³⁴⁴ The MPCA also notes that dealers are not regulated under the rule, the rule does not require any particular dealer in Minnesota to carry EVs or to stock a certain number of EVs, and because dealers are not regulated, there are no direct costs of compliance for dealers under the rule.³⁴⁵

200. Some commenters believe that the proposed rule is inconsistent with Minnesota's commitment to biofuels. The Minnesota Bio-Fuels Association contends that the MPCA did not adequately consider biofuels under both the LEV and ZEV standards as a means to address GHGs.³⁴⁶ The Minnesota Soybean Growers Association expressed its belief that the proposed rule "sets Minnesota on a path where electric cars are considered the only answer to GHG reduction goals."³⁴⁷ The Minnesota Corn Growers Association supports enactment of supportive policies and programs to promote biofuels, noting that homegrown biofuels can reduce carbon emissions, and that increasing the

Leppik (submitted by Fresh Energy) ("If Minnesota becomes the closest place that Wisconsin and Chicago car buyers can find the car they want, then this is where they'll need to come."); Comments of Martha Wittrock ("If MN was the first Midwest state to enact ZEV rules such as what is proposed in Clean Cars MN, not only would Minnesotans have the same choices that others in the US have, but we'd also be the first state in the area with those choices and availability. Just think of how many cars our dealerships will sell to our neighbors in surrounding states who don't have those choices."); *see also* Comments of Lisa Schreifels ("Electric vehicles are so much easier to find in the 14 states that have adopted this rule. We are losing state jobs and revenue when buyers are shopping in other states."); Tr. Vol. II at 320 (Michael Huber) (commenting that dealers along Minnesota's border will sell more EVs as Wisconsin shoppers come to Minnesota to make purchases, noting that he went to Oregon to purchase his EV).

³⁴¹ Comments of Austin Musil submitted by CURE ("I live in eastern South Dakota, and I support Minnesota's Clean Cars standards. . . Clean cars would benefit me as well as [I]m hoping to have an EV truck in the future. . . I would be able to drive a reasonable distance to the nearest Minnesota car dealership and purchase more efficient vehicles and EVs!"); Comments of Sally Sorenson (submitted by CURE) (South Dakota resident expressing interest in purchasing an EV in Minnesota); Comments of Houston Taylor (submitted by Sierra Club) ("As a Wisconsinite, I spend a lot of my recreational time in Minnesota & I love the example they set for WI policy. I will come to MN to buy an EV."); Comments of Stephanie Larsen (submitted by Sierra Club) ("I'm from Western Wisconsin, and I really want my next vehicle to be electric. If dealers in WI don't have access to the car I want and dealers in Minnesota do, you can bet I'm crossing the border to buy my car.")

³⁴² MPCA Rebuttal Comments.

³⁴³ *Id.*

³⁴⁴ *Id.*

³⁴⁵ *Id.*

³⁴⁶ Comments of the Minnesota Bio-Fuels Association.

³⁴⁷ Comments of Minnesota Soybean Growers Association.

amount of ethanol in gasoline from 10 to 15 percent could decrease carbon emissions annually by 332,000 tons.³⁴⁸ Commenter Darren Durst believes that the rule will “hit the ethanol and biodiesel markets hard. This damage wouldn’t just be felt by the farmers. Every rural town and community that depends on the success of the farmer would feel the pain.”³⁴⁹ Commenter Glen Mathiason states he is a former 20-year County Commissioner, and he believes Minnesota should “[u]se any blend from E15 to E85 to help solve [e]mission problems.”³⁵⁰ The Minnesota Farm Bureau Federation acknowledges that the rule does not explicitly impact the use of biofuels in Minnesota, but it has “significant concerns about the long implications this could have,” and it “strongly encourages the use of policies and programs to increase the use of biofuels as the leading way to reduce greenhouse gasses.”³⁵¹ Also related to biofuels, Auto Innovators contends that the MPCA has not properly accounted for the use of E15 in Minnesota in its analysis.³⁵²

201. The MPCA responds that increasing the use of biofuels remains an important component of the state’s response to climate change, and that the 2019 Pathways Report cited biofuels as one of the methods Minnesota could use to reduce GHG’s from transportation. The MPCA points out that its SONAR addresses biofuels, noting that this rule does not prevent the state from taking other actions to support or promote biofuels. Yet, the MPCA notes that issues related to biofuels are outside the scope of this rulemaking. Regarding E15, the MPCA notes that it analyzed emissions benefits of the proposed rule assuming that ICE vehicles would run on a 10 percent ethanol-gasoline blend; it asserts this is a reasonable assumption given that E10 is commonly available in the midwestern U.S. The MPCA notes that the state may expand the use of E15, but that the ethanol-gasoline blend would not have a large impact on the MPCA’s estimates.³⁵³

202. Many commenters, particularly commenters from rural areas of Minnesota, expressed concern about the range of EVs and the reduction of battery capacity in cold temperatures.³⁵⁴ For example, commenter Alyssa Lee noted that she is a small business

³⁴⁸ Comments of Minnesota Corn Growers Association.

³⁴⁹ Comments of Darren Durst.

³⁵⁰ Comments of Glen Mathiason.

³⁵¹ Comments of Minnesota Farm Bureau Federation.

³⁵² Comments of Auto Innovators.

³⁵³ MPCA Rebuttal Comments.

³⁵⁴ Comments of Mike Ullmer (noting that with reduced battery capacity in cold temperatures, “the average daily drive to work and back could be no longer than 128 miles under ideal winter conditions. I was trained to watch the fuel gauge when driving in winter, 1/3 tank to destination, 1/3 tank return from destination, 1/3 tank reserve. In this scenario one would be pushing into the reserve every day on the way home from work.”); Comments of Connie Nunemaker (submitted by Fresh Energy) (stating concerns about the lack of charging infrastructure in or near Bemidji, Minnesota, the reduction in range for EVs in cold temperatures, and the lack of cell phone coverage in her area, leading to a greater likelihood of becoming stranded without assistance); Comments of Deb Stevens (“While my commute is only 20 minutes on a low traffic day, during the winter or road construction season my commute has often lasted 1-2 hours, I have this horrible vision of my electric car running out of charge in the middle of a snow storm.”); Comments of Rick Swenson (“I cannot imagine any electric vehicle will travel very far when the temperature is -20 for a week straight. Being stranded on the side of the road with a dead battery and my wife and child is not acceptable.”); Comments of Ellen R. Wald (noting that Californians do not require the same driving range as Minnesotans

owner and stated: “I often travel hundreds of miles to provide a service. Often going to remote locations, and often times needing four-wheel drive and stopping to fuel up at least once. Having to rely on an electric vehicle would be very concerning in my circumstance, and for many other people that live in northern Minnesota.”³⁵⁵

203. Deb Whalen of Minnesota Agri-Women stated:

Most rural residents must travel farther for basic needs, such as education, health care services and groceries. Banking, voting, and most forms of entertainment are not just around the corner for us – it can often require a drive of an hour or more. This issue is particularly problematic for Minnesota given the hours [and] far distances that Minnesota residents are forced to drive from various parts of the state to get to work or for other requirements. The cold winter weather our state experiences annually renders the electric vehicle conditions pretty much unfeasible. Bad weather, including flash floods, high winds, and snow make these journeys more difficult or impossible. The range of electric vehicles make these challenges even greater. . . . Rural residents need safe, reliable transportation to get their work done and protect their families from harm. The thought of cold weather sapping battery life and stranding individuals on the side of a state or county road is enough to give most rural residents pause. Poor cell service in rural areas could mean having to wait hours for help to arrive.³⁵⁶

204. The MPCA responds that other states that experience cold winter temperatures have adopted the ZEV standard, including Vermont and Maine. The MPCA also notes that cold weather decreases the efficiency of ICE vehicles as well. Further, the MPCA acknowledges that EVs may not be right for all consumers and that current EVs have some limitations, though it maintains that new EVs coming to the market include SUVs and pickup trucks, and that some have longer ranges.³⁵⁷ As discussed in detail above, many commenters from rural areas of Minnesota commented favorably on the rule, and indicated they wanted to be able to purchase EVs in their area.

205. In response to concerns about operational issues in cold weather, some EV owners shared their experiences driving EVs in the winter in Minnesota.³⁵⁸ Tesla notes that some cold-weather impacts can be mitigated by taking simple actions, such as leaving the car plugged in and charging overnight. Tesla also contends that some EVs

and that, according to the 2010 census, 95 percent of Californians lived in cities while only 73 percent of Minnesotans were urban dwellers).

³⁵⁵ Comments of Alyssa Lee.

³⁵⁶ Comments of Deb Whalen.

³⁵⁷ MPCA Rebuttal Comments.

³⁵⁸ Comments of Kevin Pape (states that he currently has a PHEV and that the “number of miles I get from the electric battery has NOT changed substantially from summer to winter.”); Tr. Vol. I at 89 (Stuart Henry) (commented that he has never had a problem starting his EV even on the coldest days when it has been outside), 113 (Colin Lee) (he has driven over 150,000 miles in EVs and has never run entirely out of charge or had an issue starting the car in the cold).

estimate battery range during longer road trips, and that this technology is improving with newer EVs. Tesla asserts it recently introduced an “on-route warm up” feature that engages the battery to begin warming before the car reaches a Tesla Supercharger site, reducing average charging times by 25 percent. Rivian detailed the performance of its vehicles in cold temperatures, noting it tests vehicles “in cold climates including Minnesota winters with overnight ‘cold soaking’ at -40 Fahrenheit.” Rivian notes that cold weather operation will affect vehicle range and increase energy consumption, but that some cold weather performance calculations are included in Rivian’s driving ranges of 250 to 400-plus miles of range per charge.³⁵⁹

206. Also related to range issues, numerous commenters indicated opposition to the proposed rule because Minnesota currently lacks adequate charging infrastructure to support widespread usage of EVs.³⁶⁰ Many supporters of the rule also had concerns about the availability of charging stations and urged the MPCA to do more to develop the network of chargers.³⁶¹ Tesla notes that investment in EV charging tends to follow the curve of EV sales and that charging businesses tend to manage their exposure by not getting too far ahead of charging need. Tesla states that its V3 Superchargers have a 250kW charge rate, and that when combined with other changes to increase throughput, the stations can serve twice as many vehicles per day as the previous Supercharger technology. Tesla’s newest chargers can provide up to 200 miles of range in 15 minutes.³⁶²

207. The MPCA states that the development of charging infrastructure in Minnesota is outside the scope of this rulemaking, but it notes that it and other state agencies are working to expand charging infrastructure.³⁶³ In the SONAR, the MPCA details that it has dedicated 15 percent of the funds it received through a nation-wide settlement with Volkswagen to building out Minnesota’s EV charging network; this is the

³⁵⁹ Comments of Rivian.

³⁶⁰ Comments of Ray Phelps-Bowman (“[D]emand is constrained by the lack of robust charging infrastructure in the state. . . . The expensive cars are supported by an extensive, dependable charging network. The moderately priced electric cars are not. The Clean Cars Minnesota rule is going at the issue backward. The state needs a comprehensive network of strategically placed, dependable chargers.”); Comments of Dawn Van Keulen (“It will take years for the infrastructure to exist all over rural Minnesota (we were promised high-speed internet access and many are still waiting, as an example)” and further stating “We in rural MN may not have access to charging stations everywhere. This will especially be a problem during winter driving.”); Comments of Tim Ellis (“Without requiring charging stations to be available at every public parking lot (like handicap slots) then electric vehicles will not be feasible.”).

³⁶¹ Comments of Lois Braun (submitted by MN 350) (advocating for additional charging infrastructure, and recounting a trip in an EV during which she found one charging station was not working and another was not fast enough); Comments of Emily DeGrazia (submitted by Fresh Energy) (commenting that she lives outside the Twin Cities, drives a used EV, and has encountered difficulty finding chargers or that chargers have not been operational when she needs to use them, and she believes that the lack of infrastructure is a barrier to entry for EVs); Comments of Bruce Anderson (describing that he bought a Tesla because he was unable to find any other EVs after visiting every dealer in St. Cloud, Minnesota; he easily drove the Tesla to Oregon and back, but would be unable to make a trip to the Canadian border here in Minnesota due to the lack of chargers); Comments of Dave Jungst (noting that he purchased a 2020 Bolt in Glenwood, Minnesota; he advocates for installation of charging stations at Minnesota Department of Natural Resources and MnDOT locations, other state agency offices, and in parks).

³⁶² Comments of Tesla.

³⁶³ MPCA Rebuttal Comments.

entire amount of the settlement funds that can be used on EV charging.³⁶⁴ The MPCA has awarded \$1.4 million to build out 1,110 miles of EV fast chargers along Minnesota's highway corridors, and will dedicate an additional \$3.525 million to expand the network of charging infrastructure by 2,500 miles through the early 2020s.³⁶⁵

208. Many commenters expressed concerns about the up-front cost of EVs compared to ICE vehicles and increased costs for LEV-certified vehicles. John Harris commented in opposition to the rule that “[t]he staggering cost to the average Minnesota[n] would be overwhelming especially for a person of color as myself.”³⁶⁶ Commenter Loren Hanson stated that the rule will “result in higher costs for owning and operating a vehicle, which as a senior on a fixed income, [he] already struggle[s] with the affordability of owning a vehicle.”³⁶⁷ Marcus Luniewski believes that: “This will disproportionately affect the middle and lower class. The rich will be able to afford these changes; the poor will not.”³⁶⁸ Drive Away California Cars contended that Minnesotan's will need to pay approximately \$1,139 per vehicle if the rule is adopted.³⁶⁹ Similarly, the Economic Development Authority in and for the City of Marshall contends that the estimated price of all vehicles will increase by a minimum of \$1,139 if the rule is adopted.³⁷⁰

209. Some commenters explained their own EV shopping experiences to rebut the contention that EVs are too expensive, or that they are significantly more expensive than ICE vehicles.³⁷¹ Tesla noted that it has “hinted” that it will make a \$25,000 EV.³⁷² Commenters also provided information about the costs of operation, noting that they spend less to fuel their vehicles and save money on maintenance.³⁷³ Consumer Reports

³⁶⁴ Ex. D at 45.

³⁶⁵ *Id.*

³⁶⁶ Comments of John Harris.

³⁶⁷ Comments of Loren Hanson.

³⁶⁸ Comments of Markus Luniewski.

³⁶⁹ Comments of Drive Away California Cars (also representing that 15,772 individuals from 926 communities in Minnesota signed a petition indicating that California's rules are wrong for Minnesota).

³⁷⁰ Comments of Economic Development Authority in and for the City of Marshall. Regarding this comment and the one immediately preceding it, the MPCA did not find the cost of every vehicle in Minnesota would increase by \$1,139. The SONAR details that the average up-front price for an LEV-certified vehicle may be \$900 to \$1,200 more, depending on the vehicle size and type. Ex. D at 71. The MPCA then estimated that the average new LEV-certified vehicle in Minnesota would be approximately \$1,139 more expensive than a SAFE-certified vehicle, because more light-duty trucks are sold in Minnesota than passenger cars. *Id.* Therefore, this is an average, not a per vehicle cost applicable to every vehicle, and it is based on the higher number of sales of more expensive light-duty trucks versus passenger cars. Fresh Energy, the MCEA, NRDC and Sierra Club assert that the MPCA overstated the potential average increase and their research estimated that the potential cost increase is 20 percent less, or \$922. Comments of Fresh Energy, MCEA, NRDC and Sierra Club.

³⁷¹ Tr. Vol. I at 120-21 (Bill Middlecamp) (pushing back on the assertion that the average price of an EV is \$55,000, noting that he has purchased an EV and PHEV together for about that amount), 163, 167 (Aaron Hurd) (noting that he purchased a 2019 Hyundai Ioniq for \$20,379, after receiving a tax credit and before tax); 205 (Lydia McAnerney) (purchased a 2020 Nissan LEAF for \$11,500 after incentives and a trade in); Tr. Vol. II at 382 (Clint Faust) (in 2015, he purchased a used 2012 Nissan LEAF for approximately \$7,950).

³⁷² Tr. Vol. I at 210 (Thad Kurowski on behalf of Tesla).

³⁷³ Comments of Gary Schettl (“My family has already saved \$20,000 in fuel by driving our all-electric cars over 250,000 miles.”); Tr. Vol. I at 205 (Lydia McAnerney) (commenting on the cost to charge her Nissan LEAF, and stating “I love knowing I paid less for electricity these past four months to charge my car than I

found that the average EV driver spends 60% less to power their vehicle than an owner of a gas-powered ICE vehicle, and that the typical driver will save \$6,000 to \$10,000 over the life of the vehicle as compared to a conventional automobile.³⁷⁴ Further, the Shulock report submitted by Fresh Energy, MCEA, NRDC, and the Sierra Club opines that low income customers are likely to benefit from the rule because fuel costs consume a greater proportion of their income and because they are likely to buy more used cars. Shulock notes that much of the up-front cost of new technology is absorbed by a vehicle's initial owner, while the fuel savings benefits persist over the lifetime of the vehicle.³⁷⁵

210. The MPCA acknowledges that LEV-certified vehicles may have a higher up-front purchase price than non-LEV vehicles because manufacturers may incur costs and pass on to consumers. The MPCA asserts, however, that the reduced cost to purchase fuel, along with other reduced costs, will make the total cost of ownership of LEV-certified vehicles less than comparable non-LEV vehicles. The MPCA also contends that there are clear consumer cost savings under the ZEV rule because the costs of fueling and maintenance are greatly reduced, but it also offers the reminder that no one will be required to purchase a ZEV vehicle.³⁷⁶

211. As with commenters favoring the rule, commenters opposed to the rule submitted collected comments. The Center of the American Experiment submitted approximately 300 postcards in opposition to the rule.³⁷⁷ MADA submitted the names of over 14,000 Minnesotans opposed to the rule, some of whom offered individual comments.³⁷⁸ A petition opposed to adoption of the rule was submitted with approximately 9,700 signatures.³⁷⁹

VIII. Rule by Rule Analysis

212. The MPCA's proposed rule contains four rule parts that define the scope of the rule and incorporate California's rules by reference, define key terms, address the LEV standard, and deal with the ZEV standard, including the early-action and one-time credit banks.

used to spend on one tank of gasoline for my plug-in Prius."); Tr. Vol. II at 85 (Mike Brooks) (stating that after 38,000 miles on his EV, "our only service or maintenance has been rotation of the tires and adding windshield washer fluid); see also Tr. Vol II at 293 (Mike Lee) (commenting as an auto dealer on the maintenance needs of EVs, and noting "[m]ost fully electric cars require almost zero maintenance. Tires, brakes, windshield wipers. There is no oil, no radiator, no transmission, no gears, no spark plugs. And best of all no gasoline. While the upfront costs may be a little higher, our customers have consistently found they are cheaper to operate.").

³⁷⁴ Comments of Consumer Reports.

³⁷⁵ Comments of Fresh Energy, MCEA, NRDC and Sierra Club.

³⁷⁶ MPCA Rebuttal Comments.

³⁷⁷ Comments of the Center of the American Experiment (attaching "No New California Car Mandates!" postcards).

³⁷⁸ Rebuttal Comments of MADA.

³⁷⁹ See Petition and attached signatures, dated Mar. 15, 2021.

213. This Report focuses its most extensive analysis on the portions of the proposed rules as to which there is a genuine dispute as to the reasonableness of the MPCA's regulatory choice or that otherwise require closer examination.

214. The portions of the rule generating the greatest weight of comments were the subparts adopting California's emissions standards by reference and the mechanism for manufacturers to be credited for ZEVs made available in Minnesota. For the most part, commenters expressed concerns about the policy choices reflected in these proposed subparts, rather than challenging or commenting on the specific language of the rule.

A. Minn. R. 7023.0150 (Scope and Incorporation by Reference)

215. This proposed rule part has four subparts.³⁸⁰ In subpart 1, the MPCA adopts the LEV and ZEV emissions standards. Subpart 2 incorporates California's LEV and ZEV rules, as amended, by reference. Subpart 3 conforms the incorporated rules for use in Minnesota by replacing references specific to California with applicable references to Minnesota. Subpart 4 sets the effective date for the proposed rules based upon publication of a notice in the *State Register*.³⁸¹

216. Numerous commenters who are opposed to the rule expressed that the environment was an important issue for them, but these commenters articulated concerns about whether adoption of California's emissions standards was the appropriate method for addressing climate issues or expressed their belief that Minnesota's air is already clean, making adoption of the standards unnecessary.³⁸² Some commenters urged adoption of rules specific to Minnesota, rather than incorporation of California's rules.³⁸³

217. The MPCA has articulated that Minnesota is not on track to meet its legislatively set GHG reduction goals, and because transportation is the largest source of

³⁸⁰ See Ex. C.

³⁸¹ Subpart 4 is discussed in the section of this Report concerning the MPCA's legal authority to adopt the proposed rules. Therefore, this section of the report focuses on subparts 1-3 of the proposed rule.

³⁸² Comments of Kat Rene ("Many of us in opposition to this rule are not against clean air, but we are against more rules and mandates that don't actually solve a problem, especially those that originate from California."); Comments of Deb Stevens ("I want MN to have clean air. I mean, I have to breathe it. Unfortunately, I have misgivings about this specific plan."); Comments of Randy Gaffney ("I am not against cleaner air and a cleaner environment, but I am against an administrative rule.").

³⁸³ Comments of Dan Loveridge ("Don't we have qualified people at the MPCA that can write standards that are specifically tailored to Minnesota?"); Comments of Kathi Gruenhagen ("[T]hey need to make these rules Minnesota rules. They should not be lazy and merely copy and paste the California rules and state to just insert Minnesota where it says California."); Comments of James Bachleda ("I recommend shaping an emissions bill that's more suitable for our population and needs."); Comments of Margaret Miller ("We should come up with our own policies that take into account the unique[] needs of our state and its climate."); Comments of Ron Bergemann ("Minnesota's residents are smart enough to make our own rules to protect our resources. It would be a terrible idea to bind ourselves to rules made by a different state with a very different environment and population density."); Comments of Sam Seller ("[C]reate Minnesota standards that can replace CA Emissions as the gold standard for the United States."); Comments of Jim Anderson ("We are not California and don't need their standards here. We can develop our own as we build infrastructure to handle the need and as the vehicle technology improves to the point that it is a viable alternative to gas and diesel.").

GHGs in the state, it is reasonable to address transportation-related emissions.³⁸⁴ As the MPCA notes, federal law prohibits Minnesota from adopting its own, unique emissions standards and requires that Minnesota either follow federal standards or adopt those promulgated by California.³⁸⁵ The MPCA maintains that adoption of more stringent emissions standards is necessary for Minnesota to meet its GHG reduction goals, and adoption of the only more stringent standard available to it is reasonable.³⁸⁶

218. Some commenters objected to the rule's adoption of California's standards "as amended," arguing that this language is vague, that adoption of another state's standards through incorporation by reference is not allowed by Minnesota law, and that the MPCA is unlawfully ceding its regulatory authority to California.³⁸⁷ Commenters expressed concern that, by adopting California's standards, Minnesota will be unable to change its approach in the future.³⁸⁸

219. The MPCA proposes to adopt California's standard as amended to ensure that the Minnesota rules meet the CAA's identity requirement.³⁸⁹ Historically, California makes only minor, housekeeping updates to existing standards and adopts new, more stringent standards through major updates.³⁹⁰ This is consistent with California's role in establishing the multi-state alternative to the federal standards. New standards adopted by California would not automatically be included in Minnesota's rules, and a decision to adopt a new standard or revert back to the federal standards would need to be made on a case-by-case basis.³⁹¹ The MPCA retains its authority to review new standards and determine whether they should be adopted.³⁹² Therefore, the MPCA has not unlawfully ceded its rulemaking authority to California.

220. Additionally, the Minnesota Legislature has established the standards under which a source outside a rule may be incorporated by reference. Under Minn. Stat. § 14.07, subd. 4, an agency may incorporate by reference into its rules the text from Minnesota or federal law, or other publications and documents which are determined by the revisor of statutes to be conveniently available to the public. If the revisor of statutes certifies that the form of a rule is approved, that approval constitutes the revisor's finding that the publication or other document is conveniently available to the public.³⁹³ In this matter, the revisor has approved the rule language proposed by the MPCA, including its

³⁸⁴ Ex. D at 37.

³⁸⁵ MPCA Rebuttal Comments.

³⁸⁶ *Id.*

³⁸⁷ See Comments of MADA; Comments of 26 Members of the Minnesota Senate; see also Minn. Stat. § 14.07, subd. 4 (2020); Minn. R. 1400.2100(F).

³⁸⁸ Comments of Travis Sonsalla ("Minnesotans will be giving up control to California for deciding how environment and vehicles should be legislated. We won't be able to have any say in what our state should be doing, California will, and we can only follow along."); Comments of Mary Efta ("These LEV and ZEV standards are likely to get more strict each year, especially if we have to follow California's rules. Minnesota then has NO flexibility.").

³⁸⁹ Ex. D. at 40-41.

³⁹⁰ *Id.* at 41.

³⁹¹ *Id.*

³⁹² It should be noted that the Minnesota Legislature retains its authority to review the actions of the MPCA, to direct the agency to adopt different rules, or to set emissions standards through legislation.

³⁹³ Minn. Stat. § 14.07, subd. 4.

proposed incorporation by reference.³⁹⁴ The proposed rule language itself complies with the requirements of Minn. Stat. § 14.07, because it states that the California rules are incorporated by reference and the rules are not subject to frequent change, and it identifies the location at which the California standards are available online for public access.³⁹⁵ Though the California standards are not a federal law, federal law identifies California's rules as the available alternative to the federal standard.

221. Some commenters contend the proposed rule is not needed or reasonable because the marketplace will meet Minnesota's demand for EVs without regulation by the government.³⁹⁶ Commenters also contend that the MPCA has not demonstrated that EVs are not available in Minnesota in sufficient numbers to meet demand now.³⁹⁷ In particular, some commenters objected to the MPCA's use of information from the website www.cars.com to survey the number of available EVs.³⁹⁸ General Motors submitted a comment noting that its EVs have been available in Minnesota since 2012, and it states that it has 37 EV-certified dealers with over 100 Bolt EVs available as of February 2021.³⁹⁹ The Upper Midwest Law Center maintains that a survey of vehicle registrations shows that there is very little demand for the EV models not currently offered in Minnesota.⁴⁰⁰

222. The MPCA contends that EVs have not been available at Minnesota dealerships in sufficient numbers and with a full range of models because manufacturers primarily deliver EVs to states that have adopted California's standards.⁴⁰¹ The MPCA notes that its review of available vehicles at www.cars.com was not intended to serve as a definitive survey of the number of EVs available in Minnesota; instead the MPCA sought to use a publicly-available source of information to undertake a rough comparison of vehicle availability across jurisdictions.⁴⁰² The MPCA further notes that demand for EVs

³⁹⁴ See Ex. C.

³⁹⁵ *Id.*

³⁹⁶ Comments of Amy Koch ("The more effectual approach is to let the market work – allowing consumer demand [to] drive the shift from gas to electric instead of a top-down state mandate that harms our state's families and businesses."); Comments of Brad Greskowiak ("Market demand will bring us to where we need to be. There is no reason to impose undue burden and regulation."); Comments of Bill Nieters ("If Minnesota residents truly wanted to purchase electric vehicles the dealers would have lots full of them. If we wanted to purchase them the government would not have to force the rest of the population to cough up tax credits so the elites can drive in their \$100,000 Tesla while taking \$7500 in tax money for doing so."); Comments of Randy Gaffney ("If Minnesota residents demand EVs, then vehicle manufacturers will manufacture and make those vehicles available to Minnesota residents. This is a simply matter of demand driving supply."); Comments of Ryan Schmotter ("There is obviously a lack of demand for EV's, or car manufacturers and dealers would have them available, as I think they are still in the business to make money.").

³⁹⁷ See, e.g., Comments of MADA (noting a recent survey of Minnesota Chevrolet dealers found EV inventory sitting on dealer lots for in excess of 275 days); Rebuttal Comments of MADA.

³⁹⁸ Comments of MADA; Tr. Vol. II at 298-99 (Amber Backhaus on behalf of MADA) (noting that MADA found more than two times as many EVs on dealer lots than advertised on www.cars.com, and describing the experience of a Minnesota dealer who was unable to sell an EV and ultimately sold it at auction; "If the current models of EVs were selling within 60 days, our dealers would be stocking more of them . . . dealers aren't going to buy more if they can't sell what they already have.").

³⁹⁹ Comments of General Motors.

⁴⁰⁰ Comments of the Upper Midwest Law Center.

⁴⁰¹ Ex. D at 49; MPCA Rebuttal Comments.

⁴⁰² MPCA Second Initial Response to Public Comments; see also Ex. D at 48-49.

exists as demonstrated by comments from consumers in this rulemaking expressing a desire to buy EVs and frustration with their options at Minnesota dealers.⁴⁰³

223. Consumer Reports filed a comment detailing a survey of Minnesotans it conducted to gauge their level of interest in purchasing EVs. The study showed that 55 percent of Minnesota drivers agree or strongly agree that the state should require manufacturers to offer PHEV options, while 20 percent disagreed or strongly disagreed. Despite access and exposure barriers, Consumer Reports found that 59 percent of prospective car buyers in Minnesota have some interest in EVs, and 30 percent would consider buying one within the next two years.⁴⁰⁴ Commenter Ken Pearson noted: “It’s also important to understand that it is not a lack of ‘demand’ that results in many EVs not being available here. . . . The fact that sales can’t occur when the product is not available does not mean there’s no demand.”⁴⁰⁵

224. Supporting the MPCA’s position, the record also contains numerous comments from Minnesotans who have had difficulty finding EVs in Minnesota, some whom ultimately decided to purchase EVs outside the state.⁴⁰⁶

225. For example, Jonna Korpi, a commenter from Northeast Minnesota, asked about EVs at a Toyota dealership in her area and was told that Minnesota “was not a high priority on the list to get all-electric vehicles from Toyota, even though demand was high,” and that the dealership had taken deposits vehicles that were ultimately returned to

⁴⁰³ MPCA Rebuttal Comments.

⁴⁰⁴ Comments of Consumer Reports.

⁴⁰⁵ Comments of Ken Pearson.

⁴⁰⁶ Comments of Paul Bastyr (stating that it was difficult to find an EV that met his needs and budget in the metro area and ultimately he bought and shipped an EV from the East Coast); Comments of Jennifer A. O’Brien (stating it was a “huge hassle” to find an EV in Minnesota in her price range and that “after much research and hunting, [she] was able to find a reasonably priced car in *New York City*.”); Comments of Susan Sochakci (submitted by MN for Clean Cars) (“At this point we expect to purchase a car out of state.”); Comments of Michael Noble (submitted by Fresh Energy) (describing searching for a PHEV as “six months of hassle” and ultimately receiving a car delivered to Minnesota from a dealer in Normal, Illinois); Comments of Katherine Rogers (submitted by Fresh Energy) (purchased a PHEV in Northern Virginia and commented “I am now ready to buy a second full EV and will travel again out of state if I must.”); Comments of Nancy Cruise (submitted by Fresh Energy) (had an EV shipped from California); Comments of Patricia Ryan (submitted by Fresh Energy) (“I had to go to Iowa to buy my Honda Clarity. All the Honda dealers in MN said that Honda would not send them any!!”); Comments of Neal Lesmeister (submitted by Fresh Energy) (indicating that he tried to buy a PHEV in Minnesota for three years and ultimately drove for four days to Connecticut to purchase one because he could not order one or afford to have it delivered); Comments of David Rudolph (submitted by Fresh Energy) (purchased an EV out of state and indicates: “We are missing out on more opportunities like this to keep revenue in the state if we do not act.”); Comments of Nikolai Andrei Langlois (submitted by Fresh Energy) (commenting that he could not find an EV at local dealers, so he purchased an EV in Rochester, New York that was shipped to him in Golden Valley, Minnesota); Tr. Vol. I at 95 (Gary Schettl) (purchased a used EV in Las Vegas because he was unable to find it in Minnesota); 164 (Aaron Hurd) (“I was forced to purchase this car from a dealership from out of state. In my case that was Maryland. That means that the State of Minnesota lost the opportunity to have the money I spent stay in our community and create jobs and support local industry. I’m certain that I’m among hundreds, if not thousands, of people every year who are forced to take their money out of the state of Minnesota to buy the cars that they want.”); Tr. Vol. II at 340 (Dr. Karen Hulstrand) (she was not able to find the car in Minnesota, but a dealer in St. Louis, Missouri was willing to drive a car 600 miles to Minnesota for delivery to her).

customers because the dealership was unable to get the vehicles from Toyota.⁴⁰⁷ Commenter Eric Enberg started a farm and purchased a used EV to make deliveries. He described finding the EV as very inconvenient, noting: “No local car dealers offered them and so I took an airport van from Duluth to MSP airport, the light rail to downtown Minneapolis, and then two metro transit buses to get within walking distance of the only used EV dealer I could find in the state.” Mr. Enberg plans to buy another EV soon and indicates: “I really don’t want another, thoroughly inconvenient, shopping experience when I’m prepared to drop \$40,000 on a vehicle. Our business needs this rule.”⁴⁰⁸ John Krenn has been trying to buy an EV or PHEV over the past year. He has been frustrated by his inability to find a vehicle, and he states: “The salespeople tell me these vehicles cannot be purchased by Minnesota dealers because sales are limited to California and other clean car states. I do not understand why the manufacturers are doing this as they are losing profitable sales to Tesla. I would prefer to buy from a traditional manufacturer, but the lack of choice offered by Minnesota may force me to buy a Tesla.”⁴⁰⁹ John and Beverly Larkin state that they have discussed purchasing an EV with dealers on two occasions and were told by dealership employees that the manufacturer was “not allowing them to order EV cars for sale within the state of Minnesota and were at the mercy of dealerships in CARB states to sell them EV cars” to be sold at Minnesota dealerships.⁴¹⁰

226. The Administrative Law Judge determines that this rule part is needed and reasonable. Under federal law, Minnesota has only two choices: continue to follow federal standards or adopt the more stringent California standards. Based upon the record, the MPCA has articulated the need for the proposed rule and that it has made a reasonable choice from the available policy alternatives. This rule part is approved.

B. Minn. R. 7023.0200 (Definitions)

227. In this proposed rule part, the MPCA adopts definitions to aid it in regulating under the rule. In particular, this rule part defines the first effective model year as the first model year for which the standards are effective after publication in the *State Register*. Additionally, this rule part defines terms related to exceptions to coverage under the rule, including for an “authorized emergency vehicle,” “military tactical vehicle,” and for new and used vehicles.⁴¹¹

228. The MPCA explains that some definitions used in California are incorporated by reference to ensure identicality. The MPCA has spelled out the terms of other definitions to increase clarity under the rule and has used the same or similar definitions for some of these terms as have been adopted in other states. For example, the definitions of “military tactical vehicle,” “motor vehicle manufacturer,” “new motor vehicle,” and “used motor vehicle” are based on definitions used in other states and help define vehicles that are, or are not, covered by the rule’s standards. For the definition of

⁴⁰⁷ Comments of Jonna Korpi.

⁴⁰⁸ Comments of Eric Enberg (submitted by Fresh Energy).

⁴⁰⁹ Comments of John Krenn.

⁴¹⁰ Comments of John and Beverly Larkin.

⁴¹¹ Ex. C.

“authorized emergency vehicle” the MPCA used the existing definition of that term under Minnesota law.⁴¹²

229. The MPCA notes that its definition for “first effective model year” is needed to address when the rule will become effective and to ensure compliance with the CAA’s two-year transition window before the standards fully apply to manufacturers.⁴¹³

230. This proposed rule is necessary to articulate definitions used under the rule and to facilitate implementation of California’s standards in Minnesota. The MPCA has shown that this rule part is needed and reasonable, and it is approved.

C. Minn. R. 7023.0250 (Low-Emission Vehicle Standards)

231. This rule part requires vehicles delivered for sale or lease in Minnesota as of the first effective model year to be certified to meet the LEV standards.⁴¹⁴ The rule applies to new motor vehicles that are passenger cars, light-duty trucks, medium-duty passenger vehicles, and medium-duty vehicles; new light- or medium-duty motor vehicle engines; and motor vehicles with a new motor vehicle engine.⁴¹⁵ The rule contains exceptions for certain vehicles, discussed further below.

232. The MPCA maintains that it is reasonable to adopt the LEV standard. The MPCA notes that while EV availability is progressing, many Minnesotans will not purchase EVs because they do not want to, or because available vehicles will not meet their needs.⁴¹⁶ The MPCA contends that it is necessary to reduce emissions from passenger cars and light-duty trucks and medium duty vehicles to accomplish emissions goals in the near term.⁴¹⁷ The MPCA states that the vehicle types to be regulated by the LEV standard make up 74% of GHG emissions from surface transportation in Minnesota.⁴¹⁸ As of the first effective model year, only vehicles compliant with this rule could be registered with DVS. The MPCA states that it inquired of Section 177 states about compliance issues; these states reported having few instances in which individuals tried to register non-LEV certified vehicles.⁴¹⁹

233. The MPCA notes that manufacturers have flexibility under the rule because they are permitted to meet fleet-wide standards, such that larger vehicles like SUVs are not required to meet the same standards as small cars.⁴²⁰ Further, the MPCA states that the LEV standards it proposes to adopt are the same used by the federal government until 2020, manufacturers have been planning to meet these standards since 2012, and as of January 2017, manufacturers were achieving the standards. The MPCA notes that

⁴¹² Ex. D at 55; see Minn. Stat. § 169.011 (2020).

⁴¹³ Ex. D at 55.

⁴¹⁴ Ex. C.

⁴¹⁵ *Id.*

⁴¹⁶ Ex. D at 41.

⁴¹⁷ *Id.*

⁴¹⁸ *Id.* at 55.

⁴¹⁹ *Id.* at 56.

⁴²⁰ Ex. D at 41.

the LEV standards adopted by California are its only available option to ensure more stringent standards exist to meet environmental goals.⁴²¹

234. The MPCA proposed certain exceptions to the rule, which it maintains are permissible deviations from the identity requirement because exceptions are considered an enforcement mechanism, rather than a standard.⁴²² The MPCA states that the exceptions it seeks to adopt are the same as those used in other states and provide necessary flexibility to manufacturers, purchasers, dealers and the state.⁴²³

235. Among the exceptions, the rule does not regulate used vehicles. Sales between dealers are excepted because vehicles sold to a final purchaser would still be required to comply. The rule does not regulate vehicles sold to be wrecked or dismantled, new vehicles sold exclusively for off-highway use, and rental vehicles certified under federal law with a final destination in another state, because these vehicles would not be driven in Minnesota enough to substantively impact air quality or GHG emissions, and the MPCA does not seek to regulate the industries associated with these types of vehicles.⁴²⁴

236. In response to concerns of dealers regarding cross-border sales to non-LEV states, the proposed rule provides an exception for vehicles to be sold for registration out-of-state. The MPCA notes that, in the future, if there is a difference in cost between LEV and non-LEV certified vehicles, this exception allows Minnesota dealers to stock non-LEV vehicles for sale to neighboring states, reducing concerns about lost sales opportunities for Minnesota dealers.⁴²⁵

237. The rule does not regulate authorized emergency vehicles or military tactical vehicles so that operators of critical safety-oriented vehicle fleets could purchase whatever type of vehicles is necessary to accomplish their duties.⁴²⁶

238. The rule exempts motor vehicles transferred through inheritance or by court decree, and vehicles that are purchased out-of-state to replace a vehicle that has become inoperable or is stolen while the owner is out-of-state.⁴²⁷ The MPCA asserts that these are reasonable exceptions to avoid imposing an undue burden on Minnesotans who receive a vehicle due to circumstances beyond their control.⁴²⁸

⁴²¹ *Id.* at 41-42.

⁴²² *Id.*; *Motor & Equipment Mfrs. Ass'n v. E.P.A.*, 627 F.2d 1095, 1112-1113 (2d Cir. 1979) (recognizing the distinction between standards, which regulate emissions, and "enforcement mechanisms," which do not directly relate to air quality, such as certification or maintenance requirements, that facilitate enforcement of the standard); *American Auto. Mfrs. Ass'n v. Cahill*, 152 F.3d 196, 200 (2d Cir. 1998) ("We view 'standards relating to the control of emissions' as describing regulatory measures intended to lower the level of auto emissions, while 'enforcement mechanisms' describe regulatory devices intended to ensure that the 'standards' are effective. For example, the LEV Program is clearly a 'standard,' whereas periodic testing and maintenance requirements are 'enforcement mechanisms.'").

⁴²³ Ex. D at 56.

⁴²⁴ *Id.*; Ex. C.

⁴²⁵ Ex. C; Ex. D at 57.

⁴²⁶ Ex. D. at 57.

⁴²⁷ Ex. C.

⁴²⁸ Ex. D at 57.

239. Finally, the LEV standard exempts vehicles purchased out-of-state by non-Minnesota residents who subsequently move to Minnesota.⁴²⁹ The MPCA asserts that it is reasonable to provide this exception to avoid unduly burdening people moving to Minnesota who are not currently bound by Minnesota law and may not yet know they are moving here or be familiar with Minnesota's laws.⁴³⁰

240. The rule requires manufacturers to comply on a fleet-wide basis, establishes record retention and reporting obligations, and requires that manufacturers affix labels of LEV compliance consistent with California's standards.⁴³¹ The MPCA asserts that these provisions are reasonable and require manufacturers to provide Minnesota-specific data and information on actions taken in Minnesota, so that the MPCA can ensure compliance with Minnesota's rule.

241. Auto Innovators sought clarification from the MPCA regarding whether the MPCA intended to adopt different standards than those used in California regarding fleet-wide LEV compliance, environmental performance labels (EPL), and the NMOG + NOX fleet-average standards.⁴³² The MPCA confirmed that it does not intend to adopt Minnesota-specific standards regarding these issues and that the rule applies California's standards.⁴³³ The MPCA did not believe that a change in the rule language was necessary to address these issues.⁴³⁴

242. The MPCA has shown that this rule part is needed and reasonable and it is approved.

D. Minn. R. 7023.0300 (Zero-Emission Vehicle Standards)

242. In proposed section 7023.0300, subpart 1, the MPCA proposes to require manufacturers who make vehicles available in Minnesota for sale or lease to supply ZEVs in the percentage required under California's regulations. Subpart 2 requires manufacturers to establish an account in the California ZEV credit system no later than March 1 of the first effective model year of the rule.

243. Subpart 3 of this section would require manufacturers to make up deficits in the number of vehicles they supply by submitting ZEV credits to the credit bank. The MPCA notes that manufacturers may purchase credits in order to have a sufficient number of credits to meet their obligations under this subpart.⁴³⁵

244. Proposed subparts 4 and 5 establish credit banks for manufacturers related to the vehicles to be supplied in Minnesota. Subpart 4 will provide manufacturers with early-action credits for vehicles delivered in Minnesota prior to the effective model year

⁴²⁹ Ex. C.

⁴³⁰ Ex. D at 57.

⁴³¹ *Id.*

⁴³² Comments of Auto Innovators.

⁴³³ MPCA Rebuttal Comments.

⁴³⁴ *Id.*

⁴³⁵ Ex. D at 51.

under the rule. Beginning with MY 2022 and ending at the beginning of the first effective model year, manufacturers will be able to earn credits for vehicles delivered to Minnesota in advance of the rule. In subpart 5, the MPCA proposes to grant manufacturers a one-time allotment of ZEV credits equivalent to the first effective model year's ZEV credit requirements for that manufacturer.

245. The MPCA states that this rule adopts identical standards as those promulgated by California, consistent with the CAA, and uses the same reporting requirements and dates as those used in California and the other Section 177 states.⁴³⁶ It also notes that Section 177 states use the central credit tracking system maintained by California, and that using this central system will ease implementation and enforcement for the state and manufacturers.⁴³⁷

246. The MPCA determined the rule should include an initial credit bank for manufacturers. The MPCA also sought to allow manufacturers to build their credit bank before the rule's terms apply to them and to allow manufacturers time to purchase credits in the event they intend to use that method to comply with the rule's requirements.⁴³⁸ The early-action credit bank is a voluntary system to incentivize manufacturers to make more EVs available in Minnesota sooner, increasing EV adoption and decreasing emissions.⁴³⁹ Rivian's comments articulate the importance of early-action credits, as it states that the volume of electric trucks and SUVs it will deliver to Minnesota for sale "will largely depend upon adoption of Clean Cars coupled with the incentive to earn early-action credits by selling ZEVs in Minnesota."⁴⁴⁰

247. The one-time credit allotment awards manufacturers a one-time infusion of the number of credits the MPCA estimates the manufacturer will need to comply with the rule. The MPCA estimated that manufacturers would need approximately 55,000 credits in MY 2025.⁴⁴¹ In devising the credit banking system, the MPCA sought to balance competing needs. Manufacturers will need an initial bank of credits to allow them time to ramp up sales in Minnesota, but adopting a credit bank with too many credits would result in a standard that does not require any action by manufacturers in Minnesota, defeating the purpose of the rule.⁴⁴² The MPCA maintains that the credit banking system will enable the MPCA to ensure that the standards adopted under the rule are effective. The MPCA contends that its approach is needed and reasonable.

248. An array of individual and organizational commenters oppose adoption of the rule with the one-time credit allowance for the first effective model year. These commenters assert that manufacturers will be able to comply with the ZEV standard using only early-action credits, and that the additional one-time allotment decreases the rule's effectiveness by awarding credits that are not associated with the delivery of actual

⁴³⁶ *Id.* at 57-58.

⁴³⁷ *Id.* at 58.

⁴³⁸ *Id.*

⁴³⁹ *Id.* at 58-59.

⁴⁴⁰ Comments of Rivian.

⁴⁴¹ Ex. D at 58-59.

⁴⁴² *Id.* at 58.

vehicles to Minnesota.⁴⁴³ HPHC comments that because the rulemaking matter was delayed, the first effective model year will be 2025, offering manufacturers three years to build credits through the early action mechanism and providing them with an additional “free year” over what the MPCA originally estimated for the effective date.⁴⁴⁴ Fresh Energy, MCEA, NRDC, and the Sierra Club, support revising the rule to exclude the one-time allotment, contending that the “additional credit award is excessive and could lead to significant reductions in the benefits of the program, particularly in the early years for those automakers who do not wish to deliver products into Minnesota.”⁴⁴⁵ These environmental organizations also contend that the one-time allotment will be inflated due to the manufacturers MY 2025 compliance obligation.⁴⁴⁶ They note that the MPCA could have conditioned the use of one-time allotment credits to the first years of compliance, but that the MPCA did not add this condition to the rule.⁴⁴⁷

249. The MPCA states that the one-time credit allotment responds to manufacturer concerns about flexibility and compliance. Manufacturers advised the MPCA that they try to maintain around one-year worth of credits, or between six months and two years of credits, to manage the risk of future sales declines.⁴⁴⁸ The MPCA determined that offering one year worth of credits provides manufacturers with the buffer necessary to manage risk, but because the allotment is only one year of credits, manufacturers must continue to deliver vehicles for sale in Minnesota to avoid using up that bank entirely.⁴⁴⁹ The MPCA asserts that it was reasonable for it to listen to concerns of entities that will be regulated by the rule and to compromise in a manner that meets the dual goals of achieving environmental benefits and regulated-party compliance. Therefore, the MPCA continues to assert that the one-time credit allotment portion of the proposed rule is needed and reasonable.⁴⁵⁰

250. Auto Innovators agrees with the MPCA’s adoption of an initial credit bank, but it disagrees with the manner in which the MPCA intends to award credits. Auto Innovators objects because the rule does not award credits proportionally, unlike the credit banking systems adopted for all of the other Section 177 states.⁴⁵¹ Auto Innovators proposes proportional crediting of the one-time credit allotment with usage caps instead of the MPCA’s proposed system.⁴⁵² Auto Innovators contends that the proposed credit banking system violates the CAA’s identity requirements.⁴⁵³

⁴⁴³ See e.g., Comments of Gail Loverud; Comments of Kirsten Welge; Comments of Ceres BICEP; Comments of Tesla; Comments of St. Anthony Park Community Council/District 12.

⁴⁴⁴ Comments of HPHC.

⁴⁴⁵ Comments of Fresh Energy, MCEA, NRDC, and Sierra Club.

⁴⁴⁶ *Id.*

⁴⁴⁷ *Id.*

⁴⁴⁸ Ex. D at 61.

⁴⁴⁹ *Id.* at 62.

⁴⁵⁰ MPCA Rebuttal Comments.

⁴⁵¹ Comments of Auto Innovators.

⁴⁵² *Id.* Auto Innovators notes that Colorado and Virginia, two recent states adopting California’s standards, followed its recommended approach. Rebuttal Comments of Auto Innovators.

⁴⁵³ Comments of Auto Innovators.

251. The MPCA declined to adopt a proportional crediting system. The MPCA determined that a proportional system would require depositing in Minnesota's ZEV credit bank a number of ZEV credits based on the proportion of California vehicle sales compared to Minnesota vehicle sales. The MPCA explored this option and determined a proportional credit bank was not a reasonable solution. According to the MPCA, using the proportional credit system would likely result in over 200,000 credits in the initial credit bank by the first effective model year when the rule goes into effect. This number of credits is equivalent to providing sufficient credits to cover all the ZEV credit compliance requirements for at least four years of implementation, and possibly more. The MPCA believes that granting that number of credits would substantially reduce the incentive for manufacturers to bring EVs to Minnesota soon, which would not meet the MPCA's emissions reduction goals. In addition, the MPCA contends that other Section 177 states using a proportional bank of credits adopted the ZEV standard over a decade ago when there were both far fewer EVs available to sell and when California's ZEV credit bank was much smaller. The MPCA also determined that a proportional bank would allow manufacturers to receive double credits for vehicles sold previously in California, essentially providing for double-counting of past action for no added environmental benefit.⁴⁵⁴

252. The MPCA asserts that the credit banking system is an enforcement mechanism, not an emissions standard, and therefore identity is not required. The Administrative Law Judge agrees that the initial credit bank is not a standard that regulates emissions, but instead is an enforcement mechanism that ensures compliance with the rule.⁴⁵⁵ Though the MPCA acknowledges other states have adopted proportional crediting, it asserts that adopting proportional credits under this rule would diminish the requirements imposed and the environmental benefits to be achieved. Therefore, the MPCA continues to assert that its ZEV credit bank system is needed and reasonable.⁴⁵⁶ The MPCA has articulated a reasonable basis for structuring the initial credit bank as proposed in the rule.

253. The Minnesota Bio-Fuels Association proposes that the MPCA modify the ZEV credit bank to allow crediting for vehicles fueled with biofuels, as follows:

- i. E30+ plug in hybrid with 60 mi range – full ZEV credit
- ii. E30+ plug in hybrid with 150 mi range – 4 x ZEV Credits
- iii. Ultra clean solid oxide ethanol PHEV – full ZEV credit
- iv. Gasoline plug in hybrid with 60 mi range – half ZEV credit.⁴⁵⁷

254. The MPCA responds that it is unable to alter the number of credits awarded for particular vehicles because this portion of the rule is governed by the CAA's identity requirements. The MPCA notes that the credit counting structure is different from its adoption of an initial credit bank. For awards of early-action credits and crediting once the

⁴⁵⁴ Ex. D at 59.

⁴⁵⁵ *Motor & Equipment Mfrs.*, 627 F.2d at 1112-1113; *American Auto. Mfrs. Ass'n*, 152 F.3d at 200.

⁴⁵⁶ *Id.* at 60; MPCA Rebuttal Comments.

⁴⁵⁷ Comments of the Minnesota Bio-Fuels Association.

rule is fully applicable to manufacturers, the MPCA will use the same method to count credits as that used in California and the other Section 177 states.⁴⁵⁸

255. The MPCA has established that this proposed rule part is needed and reasonable. This rule part is approved.

Based upon the Findings of Fact and the contents of the rulemaking record, the Administrative Law Judge makes the following:

CONCLUSIONS

1. The Administrative Law Judge has authority and jurisdiction to review these rules under Minn. Stat. §§ 14.14, .15, .50, and Minn. R. 1400.2100.

2. The MPCA gave notice to interested persons in this matter and fulfilled its additional notice requirements.

3. The MPCA fulfilled the procedural requirements of Minn. Stat. § 14.14 and all other procedural requirements of law or rule.

4. The MPCA demonstrated it has statutory authority to adopt the proposed rules, and it fulfilled all other substantive requirements of law or rule within the meaning of Minn. Stat. §§ 14.05, subd. 1, 14.50(i), (ii).

5. The Notice of Hearing, the proposed rules, and the SONAR complied with Minn. Stat. § 14.131, Minn. R. 1400.2080 (2019).

6. The Agency has demonstrated the need for and reasonableness of its proposed rules by an affirmative presentation of facts in the record, as required by Minn. Stat. §§ 14.14 and 14.50(iii).

7. The record does not establish a basis for disapproval of the rule under Minn. R. 1400.2100.

8. As part of the public comment process, a number of stakeholders urged the MPCA to adopt revisions to the proposed rule. In each instance, MPCA's rationale in declining to make the requested revisions to its rules was well grounded in this record and reasonable.

9. A finding or conclusion of need and reasonableness with regard to any particular rule does not preclude, and should not discourage, the MPCA from further modification of the proposed rules – provided that the rule finally adopted is not “substantially different” (under Minn. Stat. § 14.05, subd. 2) and is based upon facts in the rulemaking record.

⁴⁵⁸ MPCA Rebuttal Comments.

Based upon the foregoing Conclusions, the Administrative Law Judge makes the following:

RECOMMENDATION

IT IS HEREBY RECOMMENDED that the proposed rules be **ADOPTED**.

Dated: May 7, 2021


JESSICA A. PALMER-DENIG
Administrative Law Judge

NOTICE

This Report must be available for review to all affected individuals upon request for at least five working days before the agency takes any further action on the rules. The Agency may then adopt the final rules or modify or withdraw its proposed rules. If the Agency makes any changes in the rules, it must submit the rules to the Chief Administrative Law Judge for a review of the changes prior to final adoption. Upon adoption of final rules, the Agency must submit a copy of the Order Adopting Rules to the Chief Administrative Law Judge. After the rules' adoption, the Office of Administrative Hearings will file certified copies of the rules with the Secretary of State. At that time, the Agency must give notice to all persons who requested to be informed when the rules are adopted and filed with the Secretary of State.