Institute for Youth in Policy

Policy Media Department | Brief

5214F Diamond Heights Blvd #3055
San Francisco, CA 94109
+1 (509) 565-0545
eic@yipinstitute.org
www.yipinstitute.org

Fuel Efficiency Standards

Policy Leads: Zaina Nasir[#1] Rishya Vemireddy[#2]

Policy Analysts: Jaslene Szeto[#3], Orlyola Tantchou[#4], Maiya Olsen[#5]

[#]*Team Name, Institute for Youth in Policy*

[1]zaina@yipinstitute.org
[2]rishya@yipinstitute.org

Abstract **— This brief examines recent changes to U.S. Corporate Average Fuel Economy (CAFE) standards and their implications for vehicle affordability, household fuel costs, and transportation emissions. It evaluates the tradeoffs between reducing regulatory burdens on consumers and manufacturers and maintaining long-term fuel-efficiency and emissions goals, and outlines policy options.**

Keywords **— CAFE standards; fuel efficiency; transportation emissions; clean transportation; climate policy**

I. Executive Summary

President Donald Trump has recently introduced a proposal to reset and weaken the changes to CAFE (Corporate Average Fuel Economy) Standards made by the Biden Administration that imposed stricter fuel efficiency requirements for gasoline-powered vehicles. Congressional legislation has also rolled back regulations on tailpipe emissions, noncompliance fines for automakers, and electric vehicle incentives that offered customers up to $7,500 toward the purchase of one of these vehicles.These effects are particularly problematic given the international effort to lower carbon emissions in response to the climate crisis.

The decision aimed to lower vehicle costs for American consumers, which have been rising due to the costs associated with higher fuel efficiency standards. It was also meant to protect American manufacturers that increased investment in electric vehicles to meet previous CAFE standards.

To maintain emission reductions and continue supporting the automobile industry in its transition to cleaner transportation, there could be long-term goals for fuel efficiency standards, with specific targets to provide automakers with greater legislative certainty, so they can start to invest in hybrid and electric vehicles, without their actions being compromised by changes across policy across administrations.Tax credits and rebates for lower-income buyers of electric vehicles could also be used. Lastly, more should be done to electrify public transportation and public transportation infrastructure.

II. Overview

Fuel efficiency regulation in the United States developed largely in response to concerns about energy consumption and dependence on petroleum. In 1975, Congress established the Corporate Average Fuel Economy (CAFE) program through the Energy Policy and Conservation Act, requiring the National Highway Traffic Safety Administration (NHTSA) to establish fuel-economy standards for passenger cars and light trucks. CAFE standards regulate how far vehicles must travel on a gallon of fuel and require manufacturers to meet an average level of fuel economy across their fleets. Since its creation, the program has been periodically

changed as vehicle technology, energy needs, economic conditions, and environmental concerns have developed.

Fuel efficiency and vehicle emissions have also created differences between federal and state regulations. California established stricter vehicle emissions requirements because of its significant air pollution problems, and federal law allows the state to receive waivers to enforce standards that are more stringent than federal requirements. Other states can adopt California's standards under Section 177 of the Clean Air Act, meaning that manufacturers may have to meet different requirements depending on where their vehicles are sold. These differences have contributed to repeated disagreements over how much authority states should have to regulate vehicles and whether manufacturers should instead follow one consistent national standard.

The federal government has also repeatedly changed its approach to CAFE standards. During the Biden Administration, NHTSA increased the stringency of fuel-economy requirements, including standards for model years 2024–2026 that increased fuel-efficiency requirements by 8% annually for model years 2024 and 2025 and 10% for 2026. In 2024, NHTSA finalized additional standards for model years 2027–2031, requiring fuel economy to increase by 2% annually for passenger cars and for light trucks beginning in 2029. These rules were presented by the administration as a way to reduce fuel consumption and emissions while lowering long-term fuel costs for consumers.

The Trump Administration has since moved to reconsider the previous approach to fuel-economy regulation. In June 2025, NHTSA issued a final rule titled “Resetting the Corporate Average Fuel Economy Program,” arguing that the previous administration had interpreted CAFE authority too broadly and that the program should focus on its statutory requirements for fuel economy. The administration has emphasized vehicle affordability, manufacturing costs, and consumer choice, while the policy change has raised broader questions about fuel consumption, emissions, technological investment, and regulatory consistency.

III. Impact on Communities

Changes to fuel efficiency can affect household and local economies. When vehicles are less fuel efficient, drivers generally will generally need to purchase more gasoline to travel the same distance. This can increase transportation costs for households, leaving less money available for local business, restaurants, and other community spendings. The effects can be significant for people who rely heavily on personal vehicles for transportation to work or school.

Fuel efficiency likewise affects future generations because transportation is a major source of greenhouse gas emissions. Less-efficient vehicles use more fuel and can produce more emissions over their lifetimes, contributing to climate change and worsening air quality. Poorer air quality significantly affects communities near busy roads, and the long term effects of climate change can create additional economic and environmental challenges for future generations.
Stronger fuel efficiency standards encourage new innovation in the transportation industry. When automakers are required to improve the efficiency of their vehicles, they have greater incentives to develop technologies such as hybrids, electric vehicles, and more efficient gasoline engines. These standards can help move the marker toward cleaner transportation and encourage continued investment in new technologies. Weakening these requirements may reduce the incentive for automakers to make similar

investments, potentially slowing the transition toward cleaner transportation.

Changes in fuel efficiency policy can also affect local employment and manufacturing. Automakers must make long-term decisions about which vehicles to produce and where to direct manufacturing resources based on government regulations and consumer demand. Stable fuel efficiency standards can help companies make these changes, while frequent changes in policy can make long term investment more difficult.

IV. Policy Problem

To justify the December 2025 reset of the CAFE standards, the Trump administration argued that the previous Biden-era standards increased vehicle costs and put too much pressure on automakers to produce electric vehicles. According to the administration, the reset could save families $109 billion over five years and lower the average cost of new vehicles. However, while these changes may make vehicles more affordable upfront, they also raise concerns about the long-term effects of weaker fuel efficiency requirements.

One big concern about this reset is the environmental and economic impact of less-efficient vehicles. With weaker standards, automakers have less incentive to develop fuel-efficient gas and hybrid vehicles, which could make larger gas vehicles more common. These vehicles mostly require more fuel, which would increase household gasoline consumption and potentially increase overall oil demand. This higher fuel consumption can also contribute to greater transportation-related greenhouse gas emissions. At the same time, reducing pressure on automakers to invest in cleaner tech could slow innovation in the U.S. auto industry and make American manufacturers less competitive with international companies that continue investing in electric and other efficient technologies.

The CAFE reset also creates a broader concern about the future of U.S. climate and transportation policy. The change is part of a larger shift away from policies established by the previous administrations that encouraged electric vehicles and other cleaner technologies. If major fuel-efficiency standards can be significantly reversed when a new administration takes office, businesses may be less willing to make long-term investments in clean transportation technology because of uncertainty about future regulations. Similar changes could create challenges for future climate initiatives, making it harder to maintain consistent, long-term sustainability strategies. Ultimately, the policy problem comes down to finding a balance between vehicle affordability and consumer choice, while also addressing fuel efficiency, emissions reduction, energy security, and investment in cleaner transportation.

V. Policy Options

A more durable policy response would be to establish a predictable, long-term federal fuel-efficiency framework rather than allowing standards to shift substantially between administrations. Congress could set a gradual efficiency trajectory with periodic reviews based on technological progress, vehicle affordability, and market conditions. Importantly, the framework should remain technology-neutral, allowing manufacturers to comply through more efficient internal-combustion vehicles, hybrids, plug-in hybrids, or electric vehicles. This would preserve emissions-reduction goals while giving automakers greater regulatory certainty and flexibility in investment decisions.

A second option is to pair efficiency standards with targeted financial incentives. Federal and state governments could provide consumer rebates, expand charging infrastructure, and

support domestic investment in cleaner vehicle technologies. Targeting assistance toward lower- and middle-income households would also address concerns that stricter standards can increase upfront vehicle costs. Combining regulation with incentives would therefore make the transition more economically feasible while maintaining pressure to reduce fuel consumption and transportation emissions.

Finally, state and local governments can partially offset weaker federal standards through complementary transportation policies. States can expand clean-vehicle incentives and charging networks, while municipalities can electrify public and government fleets, strengthen public transit, and invest in cycling and other low-emission transportation infrastructure. Greater coordination among states could also create stronger and more consistent regional markets for efficient vehicles, helping sustain emissions reductions despite a less stringent federal regulatory environment.

VI. Conclusions

Recent actions on fuel efficiency standards have highlighted the tension between high vehicle purchasing costs and long-term fuel economy goals. While the changes to CAFE standards have lowered upfront costs for vehicles, it will not only inevitably contribute to greenhouse gas emissions and air quality but discourage automakers from pursuing EV technology. Policy solutions should incorporate balanced, long-lasting frameworks that allow Americans to have access to affordable vehicles, prioritizes the health of the environment and maintains America's competitiveness in clean transportation across the global market.

VII. Acknowledgement

The Institute for Youth in Policy wishes to acknowledge Sarah Hutchison for editing this policy brief.

VIII. References

[1] Akyurt, Engin. "Pumping Gas at Gas Pump." *Unsplash*, March 4, 2024. https://unsplash.com/photos/a-gas-pump-is-connected-to-a-car-at-a-gas-station-H4GGjhkhwF0.

[2] Associated Press. 2025. "Trump's Gas Mileage Rollback: What It Means for Drivers and the Environment." Associated Press. https://apnews.com/article/trump-gas-mileage-fuel-economy-facts-7a9ef0226a4049db7fa5ffca9f6bcc51.

[3] Ceres. 2025. "Weakened Federal Fuel Economy Standards Will Drive Up Costs for American Businesses and Consumers." Ceres. https://www.ceres.org/resources/news/weakened-federal-fuel-economy-standards-will-drive-up-costs-for-american-businesses-and-consumers/.

[4] Environmental Protection Agency. 2026. "Automotive Trends." Environmental Protection Agency. https://www.epa.gov/automotive-trends.

[5] Environmental Protection Agency. 2026. "Regulations for Greenhouse Gas Emissions from Passenger Cars and Trucks." Environmental Protection Agency. https://www.epa.gov/regulations-emissions-vehicles-and-engines/regulations-greenhouse-gas-emissions-passenger-cars-and.

[6] Reuters. 2025. "U.S. Moves to Repeal Biden Administration Vehicle Fuel Economy Standards." Reuters. January 29, 2025. https://www.reuters.com/world/us/us-moves-repeal-biden-administration-vehicle-fuel-economy-standards-2025-01-29/.

[7] Union of Concerned Scientists. 2025. "A Brief History of U.S. Fuel Efficiency." Union of Concerned Scientists. https://www.ucs.org/resources/brief-history-us-fuel-efficiency.

[8] U.S. Department of Transportation. 2026. "Corporate Average Fuel Economy (CAFE) Standards." U.S. Department of Transportation. https://www.transportation.gov/mission/sustainability/corporate-average-fuel-economy-cafe-standards.