



June 11, 2021

Senator Tom Daschle
Chairman,
High-Octane Low-Carbon Alliance
901 K Street, NW, Suite 900
Washington, DC 20001

Dear Senator Daschle,

The Alliance for Automotive Innovation appreciates your outreach and our recent conversation regarding the auto industry's ongoing commitment to innovation and technology advancement. As a singular voice for the auto industry, Auto Innovators represents the views of 38 members, including automakers that produce nearly 99 percent of the new light-duty vehicles sold in the United States, tier one suppliers, and technology and mobility companies.

Our members are committed to the goals of net zero carbon transportation and expanding vehicle electrification, and automakers are investing \$250 billion by 2023 in electric vehicle technologies. We believe that our country needs a bold and comprehensive strategy as we transition to electric vehicles to support our nation's automotive manufacturing sector and workforce, increase consumer adoption, ensure the necessary conditions for success are in place at the federal and state level, and realize long-term climate and environmental goals.

The reality is that new light-duty vehicles sales in the United States last year were comprised of about 94 percent petroleum-fueled vehicles (internal combustion engines), nearly four percent hybrids, and two percent electric vehicles, including plug-in hybrids, battery electric, and fuel cells. Thus, it is important in the transition to a lower carbon economy that we consider the following points:

1. **Gasoline will continue to play a vital role in transportation for years to come, and there are important improvements that can be made to reduce carbon, increase vehicle fuel efficiency, and lower emissions supported directly by high octane, low carbon fuels.**

With nearly 290 million light-duty cars and trucks in the United States, nearly 99 percent of those vehicles operate on gasoline or diesel fuel. In addition, the average age of a vehicle in the U.S. is now roughly 12 years, which underscores that a large portion of the car parc will continue to rely on liquid fuels for years to come. Even as some states look to fully electrify vehicle sales in the next 15 years, these policymakers also recognize that it could take another 10 or more years after that to fully transition away from internal combustion engines. Of course, such a scenario assumes a smooth transition to vehicle electrification, with adequate market support and customer adoption.

Even so, as automakers invest significantly in the transition to expanded vehicle electrification, the auto industry is also continuing to invest in vehicle improvements that increase fuel economy and reduce greenhouse gases in internal combustion engine vehicles. Many of the technologies being used to make these improvements can be enhanced or complemented with the use of high octane, low carbon liquid fuels. These fuels would simultaneously support vehicle performance, including fuel economy, and further reduce greenhouse gas emissions during vehicle use. Such benefits would be realized by new and existing internal combustion engines and therefore should be encouraged as additional solutions as soon as possible to maximize environmental benefits across the fleet. Given the timespan over which combustion technology will continue to be sought by new car shoppers, and the timespan that those vehicles will remain in the field, low carbon liquid fuels are an increasingly important technology pathway to help achieve carbon reductions while the electric vehicle market continues to grow.

2. **Supportive measures, like Low Carbon Fuels Standards, should be encouraged as a way to promote higher octane and lower carbon liquid fuels and reduce the overall carbon intensity of existing fuels.**

Market-based policies, like Low Carbon Fuels Standards (LCFS), first adopted by California, are a persuasive and important way to further reduce transportation related carbon emissions. The LCFS requires fuels to lower their carbon content and provides a carbon trading mechanism to promote cost-effective and smart fuel-based solutions. In addition, the LCFS can be an important source of revenue that can be used to advance development of more renewable fuels, as well as support the transition to electrification through purchase incentives and charging and hydrogen refueling investments. Auto Innovators has advocated for an expansion of the LCFS at the state level and

believes that a federal clean fuels policy should be part of the nation's comprehensive strategy to reduce carbon emissions and advance vehicle electrification.

3. **Use of high octane, low carbon liquid fuels supports ongoing efforts to improve air quality and can provide an important bridge in reducing emissions in low-income communities during the transition to expanded vehicle electrification.**

While today's vehicles emit near zero levels of tailpipe and evaporative emissions and are further reducing these emissions under the Environmental Protection Agency's Tier 3 standards, more can be done to support lower emissions and air toxics exposure, especially in disadvantaged communities. High octane, low carbon liquid fuels provide the benefit of lower aromatics, and therefore lower exposure to toxics, when combusted in a vehicle. High octane, low carbon liquid fuels provide a solution to further enhance the on-vehicle technologies and will promote cleaner air for all communities.

In summary, Auto Innovators believes there is, and should be, an ongoing role for cost-effective solutions that further reduce greenhouse gas emissions, promote vehicle technology improvements, and lead to cleaner air. While vehicle electrification is a primary focus at this time, petroleum use will continue for years to come. As such, there are potential climate and air quality benefits that can be optimized through the encouragement and rollout of high octane, low carbon liquid fuels.

Auto Innovators thanks you for your role in promoting smart, cost-effective fuel-based solutions, and we look forward to continued dialogue.

Sincerely,

A handwritten signature in black ink, appearing to read 'J. Rege', written in a cursive style.

Julia M. Rege
Vice President, Energy & Environment