

AV TEST Initiative Expansion Announcement Remarks

James Owens, NHTSA Deputy Administrator

Monday, January 11, 2021 | Washington, DC

AS PREPARED FOR DELIVERY

Hello, I'm James Owens, Deputy Administrator of NHTSA. I hope you are all safe and well, and I thank you for joining us this afternoon for an exciting announcement. Before I start, I want to thank the Secretary of Transportation Elaine L. Chao for her principled leadership over the past four years.

In the summer, the U.S. Department of Transportation and NHTSA launched the Automated Vehicle Transparency and Engagement for Safe Testing, or AV TEST, Initiative, as a pilot program.

And in September, we unveiled the AV TEST online tracking tool. It's a first-of-its-kind, transparent way for the public to learn about the on-road testing of automated driving systems in their communities.

And today, I am pleased to announce that we're expanding the program by opening it to all stakeholders.

We've seen tremendous interest in the AV TEST Initiative. The pilot began with nine states and nine companies. And now, with this expansion, we have 26 companies, 23 States and local governments, as well as three associations that have joined. For a full list of all participants, please visit [NHTSA.gov/AVTEST](https://www.nhtsa.gov/AVTEST).

This is the first platform connecting the public, manufacturers, developers, operators, and all levels of government to voluntarily share information about the on-road testing and development of prototype automated driving systems, also known as ADS.

We encourage everyone working in the ADS space, including city and state governments, to join us in this initiative.

The AV TEST Initiative is one of several programs underway at NHTSA to help address safety and innovation in the rapidly changing world of transportation.

The auto industry is undergoing a technological revolution, and tens of billions of dollars have been invested in automation research and development that hold the potential one day to fundamentally change the way we drive and dramatically reduce vehicle-related deaths and injuries.

But in a heavily regulated industry, these exciting developments carry with them a significant challenge: How do we protect public safety and also provide sufficient breathing space for groundbreaking innovation to grow so that we can all one day realize its potential safety benefits?

One way we do this is reminding the public that there are no fully self-driving vehicles available for sale to the public today. Any vehicle the public can buy today cannot drive itself and requires an active, attentive, and fully engaged driver ready to act at any time.

What companies are testing are vehicles equipped with developmental, limited demonstration, or early-stage deployment versions of ADS. And they're doing so on public roads in limited areas and for limited use.

Some of these vehicles operate on public roads under a program that allows NHTSA to grant exemptions for research or demonstration purposes.

The AV TEST Initiative is a prime example of NHTSA's approach to emerging vehicle technologies. The U.S. Department of Transportation has stressed the importance of ensuring America's continued global leadership in emerging technologies, and NHTSA has taken careful steps to protect the traveling public while removing counterproductive regulatory barriers to innovative technologies.

Safety is the foundation of everything we do. NHTSA and many others have worked tirelessly to make our nation's roads safer. State and local governments advocated for tougher impaired and distracted driving laws, while automakers invested in new safety technologies.

And it's paying off. In 2019, the traffic fatality rate had fallen to 1.1 fatalities per 100 million vehicle miles traveled—less than a quarter of what it had been when NHTSA was created in 1970, despite there being many more vehicles on our roads.

But we still have a long way to go. Last year, 36,096 lives were lost on our Nation's roadways. They were parents, children, siblings, friends, and colleagues, and we all suffer for having lost them.

And this is why the women and men at NHTSA will continue in our mission to advance highway safety, and why we—like so many others—are intrigued by the potential safety benefits of automation and other advanced vehicle technologies. If vehicles can avoid crashes or reduce the severity of those that do occur, then we may see many fewer lives lost on our roads every year.

NHTSA ensures safety in innovation in multiple ways, including through our enforcement authority, through the promotion of best practices among industry, through public education, and through regulatory actions, when appropriate.

All vehicles and equipment are subject to the same standard: They may not present an unreasonable risk to safety. NHTSA exercises its broad enforcement authority to investigate possible defects, and Federal law requires the recall and repair of defective vehicles or equipment.

The structure of NHTSA's legal authorities carves out space for innovation. Automakers are able to test new equipment and technologies, and to incorporate them into their vehicles so long as they (a) meet Federal Motor Vehicle Safety Standards and (b) do not pose an unreasonable risk to safety.

This breathing room for innovation has led to the development of many new lifesaving technologies, such as seat belts and electronic stability control.

As manufacturers develop novel technologies, NHTSA's own research team will engage with the developer and begin to evaluate the safety improvement potential of their innovation. That research in turn informs the Agency's determination as to whether it would be appropriate to establish a regulatory performance standard or even mandate the new technology.

NHTSA's regulatory authorities, laid out in the National Traffic and Motor Vehicle Safety Act, require that any standard the Agency sets must meet a clear safety need, be feasible, and be accompanied by clear test procedures that are objective, repeatable, and reproducible.

These statutory requirements result in a rulemaking process that is long and deliberate, and for good reason:

NHTSA is a data-driven, science-based agency. Before most regulation is crafted, the Agency first collects data and conducts substantial research to measure the scope of the issue and to determine where the greatest safety benefit lies. Data and sound science are essential to ensuring that standards actually improve safety instead of merely providing a false sense of security, and avoids unintended consequences that could introduce risks or cause harm.

Federal law requires that NHTSA's rulemaking process is a transparent one; the Agency does not write rules without significant public input. We make our research available for public scrutiny, so the public can see the foundation of our proposals and help identify potential information gaps.

NHTSA receives comments from a diverse audience, including the general public, local law enforcement, industry, safety advocates, and cities and States. These voices, combined with the diligence and expertise at NHTSA, result in an improved final product, one that is scientifically sound, repeatable, and designed to ensure real safety benefits.

Intuition is not science, and it is not enough. As the regulatory process makes clear, NHTSA must rely on sound science and solid data before proposing and establishing regulatory standards. And to do so responsibly means not only that the technology being evaluated must exist, but it must be sufficiently mature to enable the Agency to evaluate it and decide if regulations are prudent. So, to put it simply, appropriate regulations must necessarily follow technological maturity.

NHTSA has not yet issued new performance standards for ADS because this technology is still far from its endpoint. To regulate technologies before they are market ready could stifle their development, and thus, their lifesaving potential. Worse still, regulating without a full understanding of the technology could risk regulating the wrong aspects of performance and potentially lead to unexpected negative safety consequences in other ways.

The Agency must understand not only the potential benefits of technology, but also the potential for unintended consequences.

Just about every major safety invention, from seat belts to electronic stability control, was pioneered by industry and later adopted by NHTSA, not the other way around. Once the technologies were proven, NHTSA moved quickly to require or otherwise encourage their adoption, but regulatory mandates governing these technologies only came about after industry had developed them and proven their value.

While all vehicles and equipment must comply with FMVSS, NHTSA does have the authority to grant exemptions on a limited basis.

Issuing exemptions allows NHTSA to assess a technology and gather data. NHTSA is granting limited exemptions to allow for the testing or demonstration of ADS vehicles that do not comply with Federal standards – while protecting the safety of the public. These are primarily seen with low-speed shuttle demonstration projects in several cities.

In early 2020, NHTSA granted the first-ever exemption allowing for full deployment of an ADS vehicle to Nuro, a California robotics company. This authorizes Nuro to deploy up to 5,000 low-speed, occupant-less vehicles over two years, which will be used for deliveries for restaurants, grocery stores, and other businesses. As a condition of the exemption, NHTSA has set in place mandatory reporting of

information about the vehicles' operations, and is requiring outreach to the communities where the vehicles will be deployed.

NHTSA's performance-based regulations are a powerful instrument for enhancing vehicle safety, but they are not the only tools available for the task.

To continue to support innovation and improvements to safety when rulemaking is not available, NHTSA uses its convening authority to tap into competitive market forces and encourage automakers to research and develop advanced safety features, and employs its enforcement authority to ensure the safety of the public as these innovations are deployed.

For example, NHTSA's New Car Assessment Program, our 5-Star Safety Ratings, recognizes excellence in safety performance, empowering American families with comparative safety information that allows them to choose vehicles that provide better crash protection. The program also recognizes high-performance advanced safety features that can help drivers avoid crashes altogether. NHTSA is currently working to update the program by adding information about newer and more advanced technologies.

Because this voluntary process is transparent, it taps into competitive forces generated by consumer demand to encourage automakers to make significant improvements to safety or else fall behind their competitors in the eyes of American families.

This is the same philosophy behind the AV TEST Initiative. By partnering on a voluntary basis, we've been able to create this initiative and unveil it to the public very quickly. When it comes to technology, time is of the essence. We all share a common goal in helping the public understand what's going on in their neighborhoods. We also want to facilitate conversation among stakeholders, including various levels of government and developers, to promote information sharing, coordination, and best practices.

We live in an exciting era, in which significant investment and progress is being made in advanced technologies that have the potential to radically improve safety and change the driving experience. As exciting as the prospects for these advances may be, it is important to remember that these technologies are immature and still developing. As they do, we will continue to look for ways to meet the challenges and leverage the opportunities these new technologies present. We will also continue to work to ensure the safety of the public as they are developed, tested, and deployed.

The AV TEST Initiative will be a powerful tool to help achieve our common goals. We are so grateful to have so many of you join us in this important endeavor.

NHTSA remains steadfast in our commitment to the American people – and to our mission to save lives.

Thank you very much.