

NTSB: Collision avoidance systems should be standard in cars (Update)

June 8 2015, byJoan Lowy

Automakers should immediately include as standard equipment in all new cars and commercial trucks systems that automatically brake or warn drivers to avoid rear-end collisions, the National Transportation Safety Board said in a report released Monday.

The systems could prevent or mitigate more than 80 percent of the rearend collisions that cause about 1,700 deaths and a half-million injuries annually, the report said. There are about 1.7 million rear-end crashes each year in the U.S.

Some of the collision-avoidance systems issue a warning to drivers that a collision is imminent, but do not automatically brake. The board recommended manufacturers begin by making a warning system standard, and then add automatic emergency braking after the National Highway Traffic Safety Administration completes standards for them.

The board has recommended adoption of collision-avoidance systems or other steps to encourage their use a dozen times over the past 20 years, but the report called progress "very limited." Only four of 684 passenger vehicle models in 2014 included automatic braking systems as a standard feature: the Mercedes-Benz G Class 4X4, an SUV; the Subaru Forester and Outback, also SUVs, and the Subaru Legacy, a mid-sized sedan.

When the systems are offered as options they are typically on high-end vehicles like Cadillac, Infiniti and Lexus models and are often bundled with non-safety features like heated seats or faux leather interiors,



making the overall package more expensive.

"You don't pay extra for your seatbelt," NTSB Chairman Christopher Hart said in a statement. "And you shouldn't have to pay extra for technology that can help prevent a collision."

But the Alliance of Automobile Manufacturers said collision avoidance systems should remain optional.

"There are almost two dozen driver assists on sale now, and some consumers may prefer a 360 degree camera view or parking assist," Gloria Bergquist, vice president of the Alliance, said in an email. "Automakers see automatic braking as helpful to consumers, but consumers should decide what they want and need."

The board also recommended that federal regulators develop tests and standards to rate the performance of each vehicle's collision-avoidance system and to incorporate those results into an expanded government safety rating system.

"Slow and insufficient action on the part of the (highway traffic administration) to develop performance standards for these technologies and require them in passenger and commercial vehicles, as well as a lack of incentives for manufacturers, has contributed to the ongoing and unacceptable frequency of rear-end crashes," the report said.

A complete collision avoidance system works by monitoring the environment around the vehicle either with light detection, radar, cameras or a fusion of several technologies. When it detects a conflict, it begins by alerting the driver through visual or audible warning cues and preparing the brakes in anticipation of braking. If the conflict persists, the systems apply the braking or add additional braking force if the driver has already begun braking, but not hard enough.



The effectiveness of the systems depends heavily on the accuracy and timeliness of detection of the conflict, which can fluctuate depending on the quality of the installed sensors, cameras and target detection algorithms used.

The traffic safety administration is investigating complaints that the autonomous braking systems on newer Jeep Grand Cherokees can come on for no reason, increasing the risk of rear-end crashes.

The traffic safety administration sets safety standards for cars and trucks and orders recalls for defective vehicles, while the safety board investigates accidents and makes safety recommendations.

© 2015 The Associated Press. All rights reserved.

Citation: NTSB: Collision avoidance systems should be standard in cars (Update) (2015, June 8) retrieved 28 April 2024 from <u>https://phys.org/news/2015-06-ntsb-collision-standard-cars.html</u>

This document is subject to copyright. Apart from any fair dealing for the purpose of private study or research, no part may be reproduced without the written permission. The content is provided for information purposes only.