# NHTSA Heavy Vehicle Research/Rulemaking Report TRB Truck and Bus Safety Committee Meeting January 11, 2017

### Truck Tractor and Large Bus Stability Control

- Received petition after final rule asking for changes to the performance tests to accommodate long-wheelbase truck tractors – currently addressing this petition
- Docket for this rule is NHTSA-2015-0056 at www.regulations.gov

#### Heavy Vehicle Speed Limiters

- Proposed rule posted online (NPRM) device on new vehicles to limit maximum speed on heavy vehicles; Combined NHTSA and FMCSA effort
- Press release:
   <a href="http://www.nhtsa.gov/About+NHTSA/Press+Releases/nhtsa-large-vehicles-speed-limiters-08262016">http://www.nhtsa.gov/About+NHTSA/Press+Releases/nhtsa-large-vehicles-speed-limiters-08262016</a>
- Docket for this rule is NHTSA-2016-0087 at www.regulations.gov
- Automatic Emergency Braking (AEB) Systems and Advanced Crash Avoidance Technology
  - Received petitions asking for AEB technology on heavy vehicles;
     Granted petition
  - AEB Systems Research posted on docket: NHTSA-2015-0024 at www.regulations.gov
  - Field Operational Test (FOT) supports NHTSA AEB rulemaking activities - 150 trucks instrumented, 7 fleets participated, over 3 million miles of data.
    - Advanced Crash Avoidance Technology Field Operational Test Final Report is available on NHTSA website as DOT HS 812280, published on June 2016.
    - http://www.nhtsa.gov/DOT/NHTSA/NVS/Crash
       Avoidance/Technical
       Publications/2016/812280 FieldStudyHeavy-VehicleCAS.PDF
  - New study on newer generation AEB systems began in November
     2016
    - Project awarded to Virginia Tech Transportation Institute (VTTI)
    - 30 month FOT study looking at systems from Bendix, WABCO, and Detroit Assurance

 150 vehicles instrumented, approximately 1 year of data collection

## Heavy Vehicle V2V Research

- Note: Light Vehicle V2V Notice of Proposed Rulemaking (NPRM) was released on December 13, 2016.
- Heavy Truck Trailer Basic Safety Message Development Study
  - Planning to test and demonstrate concepts for automatically determining trailer specifications in 2017
- Heavy Vehicle V2V Retrofit Feasibility
  - Project awarded to University of Michigan Transportation Institute (UMTRI) in December 2016
  - Determining applicability of retrofit V2V systems on heavy vehicles and costs
- Heavy Vehicle Cybersecurity
  - Project on determining cybersecurity risks specific to heavy vehicles with UMTRI is nearing completion
  - Final Report available in the first half of 2017
- Recently Released Final Reports available on NHTSA website: <a href="https://www.nhtsa.gov/research-data/crash-avoidance#10061">https://www.nhtsa.gov/research-data/crash-avoidance#10061</a>
  - DOT HS 812 300 Summary of NHTSA Heavy-Vehicle V2V Safety Communications Research
  - DOT HS 812 336 Driver Acceptance of Collision Warning Applications Based on Heavy-Truck V2V
  - DOT HS 812 327 Commercial Connected Vehicle Test Procedure Development and Test Results - Emergency Electronic Brake Light
- NHTSA V2V Research Docket for related reports: NHTSA-2015-0060 at <u>www.regulations.gov</u>

#### • Human Factors Research

- Visual-Manual NHTSA Driver Distraction Guidelines for Portable and Aftermarket Devices released in November 2016
  - https://www.nhtsa.gov/press-releases/us-dot-proposesguidelines-address-driver-distraction-caused-mobile-devicesvehicles

#### Automated Vehicles

 DOT's Federal Automated Vehicles Policy released in September 2016; Provides guidance to all stakeholders such as leaders in industry, state governments, safety advocates and the traveling public.

- https://www.transportation.gov/AV
- Two public meetings held in the Fall of 2016 and more public outreach planned in the future.