Overview: Federal Automated Vehicles Policy
(US DOT/NHTSA)

Stephen A. Ridella
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613,501


(DOT HS 812 069 - Published in Jan, 2015)
### Most Recent US Fatality Data (2013-2015)

<table>
<thead>
<tr>
<th>Category</th>
<th>2013</th>
<th>2014</th>
<th>2015</th>
<th>% change (14-15)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Passenger Vehicle Occupants</td>
<td>21,132</td>
<td>21,050</td>
<td>22,241</td>
<td>+6.6%</td>
</tr>
<tr>
<td>Large Truck and Bus Occupants</td>
<td>691</td>
<td>656</td>
<td>667</td>
<td>+1.7%</td>
</tr>
<tr>
<td>Motorcyclists</td>
<td>4,668</td>
<td>4,594</td>
<td>4,976</td>
<td>+8.3%</td>
</tr>
<tr>
<td>Pedestrians</td>
<td>4,735</td>
<td>4,910</td>
<td>5,376</td>
<td>+9.5%</td>
</tr>
<tr>
<td>Pedalcyclists</td>
<td>743</td>
<td>729</td>
<td>818</td>
<td>+12.2%</td>
</tr>
<tr>
<td><strong>Total</strong>*</td>
<td><strong>32,719</strong></td>
<td><strong>32,744</strong></td>
<td><strong>35,092</strong></td>
<td><strong>+7.2%</strong></td>
</tr>
</tbody>
</table>

9,874 passenger vehicle occupants unrestrained
10,265 killed in drunk driving crashes
January 2016 USDOT/NHTSA Announcement:

- Accelerate Vehicle Safety Innovations:
  - Focus on:
    - Vehicle Guidance
    - Model State Policy
    - Current regulatory tools
    - Identify potential new tools and authorities
Review of Federal Motor Vehicle Safety Standards for automated vehicles,
Public Input:

- Public Meetings
  - April 8 (USDOT, Washington, DC)
  - April 27 (Stanford, CA)
- Participation
  - In-person attendance
  - Technical remarks by attendees
  - Written comments
- Many additional stakeholder meetings
- Agency sought input on several topic areas
Result:

- **Federal Automated Vehicles (FAV) Policy**
  - Released September 2016
  www.transportation.gov/av

- 60-day public comment period
  - Request for Comments (RFC) published on Sept 23, 2016
  - Docket No. NHTSA-2016-0090 (Document No. 2016-22993)
  - Comment period closes November 22, 2016
FAV Policy - Main Sections

- Vehicle Performance Guidance for Automated Vehicles
- Model State Policy
- NHTSA’s Current Regulatory Tools
- New Tools and Authorities

Levels of Automation

- Adopts SAE International definitions (SAE J3016)
FAV Policy: Vehicle Guidance - 15 Safety Areas

- Data Recording and Sharing
- Privacy
- System Safety
- Vehicle Cybersecurity
- Human-Machine Interface
- Crashworthiness
- Consumer Education and Training
- Registration and certification
- Post-Crash Behavior
- Federal, State, and Local Laws
- Ethical Considerations
- Operational Design Domain (ODD)
- Object and Event Detection and Response (OEDR)
- Fall Back Minimum Risk Condition
- Validation Methods

Crosscutting Areas

System Specific Areas
FAV Policy – Safety Assessment Letter

• Outlines how manufacturers/other entities meet the 15 safety areas
• Additional letters if hardware or software changes materially change one or more of the 15 areas
• Letter is voluntary
  – HAVs (SAE L3-L5)
  – L2
FAV – Next Steps

• FAV Policy Document is a first step, significant additional public input and work tasks ahead!

• Many next steps envisioned, including:
  – Request for Comments RFC (published)
  – Public workshops/ other stakeholder engagement
  – Work plans for certain areas in vehicle guidance and state model policy sections
  – Education/outreach
  – Notice and Comment on potential changes to regulatory tools and authorities
For More Information

USDOT Public Website for FAV Guidance:
www.transportation.gov/av