Status of the review of the General Safety and Pedestrian Safety Regulations

Reporting on new technologies and the way forward

83rd session of GRRF

Directorate-General for Internal Market, Industry, Entrepreneurship and SMEs

Automotive and Mobility Industries Unit
Regulation (EC) No 661/2009

• Main type-approval requirements for the General Safety of motor vehicles, trailers, components and separate technical units.
• Contains detailed implementing measures that are EU or UNECE Regulations for defined vehicle categories
• Phase-in mostly completed since 11/2014.
  • Electrical Safety, Electronic Stability Control, Advanced Emergency Braking on trucks and buses, Tyre Pressure Monitoring, Driver Safety-Belt Reminder, ISOFIX, ...
Regulation (EC) No 78/2009

- **Pedestrian Safety Requirements**, child/adult headform impacts on bonnet, as well as legform impact on front bumper.
- Based on old Directive 2003/102/EC, but with more stringent requirements and mandatory **Brake Assist System** (BAS).
- Still **being phased in**, specifically for heavy M1 passenger cars (SUVs) and N1 light commercial vehicles (vans) since 2011 to **2019**.
Reporting obligations on safety

- Including monitoring and assessment of new advanced safety features, their cost effectiveness and feasibility for possible inclusion in a future revision of the regulations on general vehicle safety and on the protection of pedestrians and other vulnerable road users.
What we have done for the reporting

- Commission has undertaken a **preliminary study** with TRL (published March 2015):
  - Review of possible considerations for legislation.
  - New safety features that meet CARS 2020 criteria and the Road Safety 2011-2020 policy orientations.
  - Indicative cost-benefits analysis of 55 possible measures that could be introduced in the EU
- Outcome was '**short list**' for GSR and PSR reporting and thus the way forward in the EU.
General Safety Regulation Reporting on the Way Forward

• Instead of identifying safety problem in the field and working towards a solution, **list of available and feasible measures** was assessed.

• List of measures has been limited to those that are most likely to be **cost effective**.

• In depth cost effectiveness and impact on competitiveness is being checked at this moment, as the basis for **Impact Assessment**.

• Stakeholder engagements, public consultations.
Stakeholders that have been consulted (from 2014 onwards)

- ACEA / OICA (car industry)
- CLEPA (supplier industry)
- FIA (motorist interests)
- ETSC (transport safety)
- Euro NCAP (consumer testing)
- Transport & Environment
- Transport for London
- ...
19 Measures included in the Report

- Autonomous Emergency Braking
- Emergency Braking Display
- Intelligent Speed Adaptation
- Lane Keeping Assist
- Driver Distraction/Drowsiness Monitoring
- Safety-Belt Reminder (all seats)
- Frontal Impact Crash Updates
- Side Impact Crash Updates
- Rear Impact Crash Introduction
- Alcohol Interlock Device Installation
- Crash Event Data Recorder
- Tyre Pressure Monitoring
- Truck Front End Design Program
- Truck Rear Underrun Protection
- Truck Lateral Protection
- Bus Fire Safety Program
- Pedestrian/Cyclist Detection
- Head impact on A-pillar/windscreen
- Reversing Detection
Combined Key Active Safety Measures – 1/9/2020

For new vehicles: Plus 2-year period

- Automatic Emergency Braking System
  - $M_1$, $N_1$
- Lane Keep Assistance
  - $M_1$, $N_1$
- Driver Drowsiness and Distraction Monitoring
  - $M$, $N$
- Intelligent Speed Adaptation
  - $M$, $N$
Focus on AEBS

- Automatic Emergency Braking System

- For new types of vehicle:
  - 1/9/2020 moving obstacle
  - 1/9/2022 stationary obstacle
  - 1/9/2024 pedestrian detection
  - 1/9/2026 cyclist detection

- For new vehicles: **Plus 2-year** period

- \(N_1\) (non \(M_1\) derived) vehicles: **2-year offset**
Further Focus on Pedestrian Safety

- Automatic Emergency Braking System

- For new types of vehicle:
  - 1/9/2024 pedestrian detection
  - 1/9/2026 cyclist detection

- For new vehicles: **Plus 2-year** period
- $N_1$ (non $M_1$ derived) vehicles: **2-year offset**
General Safety Measures – 1/9/2020
For new vehicles: Plus 2-year period

- Safety Belt Reminders
  - $M_1, N_1$ – on all seats / $M_2, M_3, N_2, N_3$ – front seats only
- Emergency Braking Display
  - $M, N$
- Alcohol Interlock Devices Interface
  - $M, N$
- Crash Event Data Recorder
  - $M_1, N_1$
- Tyre Pressure Monitoring
  - $M, N, O_3, O_4$
General Safety Measures – 1/9/2020
For new vehicles: Plus 2-year period

• Frontal Crash Program Update
  • M₁, N₁

• Side Crash Program Update
  • M₁, N₁

• Rear Crash Testing Introduction
  • M₁, N₁
Truck, trailer and Bus specific

– 1/9/2020

For new vehicles: Plus 2-year period

• Front End Blind Spot Cameras and Detection
  • $M_2, M_3, N_2, N_3$

• Upgrading Lateral Protection (elimination of exemptions)
  • $N_2, N_3, O_3, O_4$

• Upgrading Rear Underrun Protection
  • $N_2, N_3, O_3, O_4$

• Upgrading Front Underrun Protection
  • $N_2, N_3$

• Fire Safety for Buses
  • $M_2, M_3$
Pedestrian Safety – 1/9/2020
For new vehicles: Plus 2-year period

- Reversing camera/detection
  - M, N, O₃, O₄
Pedestrian Safety M1, N1 – 1/9/2024

For new vehicles: Plus 2-year period
N₁ (non M₁ derived): 2-year offset

- Automatic Emergency Braking System
  - Pedestrian detection
  - Cyclist detection (note: from 1/9/2026)
- A-Pillar and Windscreen Head Impact Test
Truck and Bus Front End Design

- 1/9/2028

For new types of vehicle only

- Direct Vision Requirements
  - $M_2$, $M_3$, $N_2$, $N_3$

General Safety Regulation Revision
Future Commission Proposal

- Proposal for revision is to follow end of 2017.
- To contain the measures identified to be cost effective.
- Process to be started once implications of the Impact Assessment are clear.
- Again, stakeholder engagements, public consultations, etc.
- After Commission adoption, to be discussed in the European Parliament and the Council.
Way forward of the General Safety and Pedestrian Safety Regulations

• Currently carrying out an **in depth cost and effectiveness analysis**, forming the basis for Impact Assessment for Commission Proposal to amend GSR and PSR, expected end of 2017.

• Looking at **combining/bundling technologies** (while not double counting costs and benefits).

• Assessing the **impact on competitiveness**.

• **Stakeholder consultations** are ongoing (event was 28-29/11 in London, now individually).
Status of the Commission Report

Saving Lives: Boosting Car Safety in the EU

Reporting on the monitoring and assessment of advanced vehicle safety features, their cost effectiveness and feasibility for the review of the regulations on general vehicle safety and on the protection of pedestrians and other vulnerable road users

• **Adopted** by the **European Commission** on 12/12/2017.

For further information

http://ec.europa.eu/growth/sectors/automotive

- Status of EU legislation, links to Regulations and other useful information.

https://circabc.europa.eu/w/browse/b2bc6bdb-7e39-48cd-9f16-079703cd82e6

- Studies carried out by the Automotive and Mobility industries unit of DG GROW
European Commission
Directorate-General
for
Internal Market, Industry, Entrepreneurship and SMEs
Automotive and Mobility Industries Unit

Thanks for your attention