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### **Economic Commission for Europe**

**Inland Transport Committee** 

World Forum for Harmonization of Vehicle Regulations

181st session

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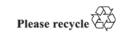
Revised programme of Work of the World Forum for Harmonization of Vehicle Regulations (WP.29) and its Subsidiary Bodies

Note by the Secretariat\*

The text reproduced below was prepared by the Secretariat for consideration by the World Forum. It takes into account the results and decisions taken at 179th session (ECE/TRANS/WP.29/1149) and its 180th session (ECE/TRANS/WP.29/1151) and the proposed agenda for its 181st session (ECE/TRANS/WP.29/1152 and Add.1) and updates also the information on the work of the six subsidiary Working Parties to WP.29.

GE.20-08005(E)







<sup>\*</sup> In accordance with the programme of work of the Inland Transport Committee for 2020 as outlined in proposed programme budget for 2020 (A/74/6 (part V sect. 20) para 20.37), the World Forum will develop, harmonize and update UN Regulations in order to enhance the performance of vehicles. The present document is submitted in conformity with that mandate.

## Programme of Work of the World Forum for Harmonization of Vehicle Regulations and its Subsidiary Bodies

#### Main topics of work of the World Forum for Harmonization of Vehicle Regulations and its subsidiary bodies

The World Forum for Harmonization of Vehicle Regulations has aligned its work to the Agenda 2030 incorporating into its regulatory framework the technological innovations of vehicles to make them safer and more environmentally sound and thus contributing to the implementation of SDGs 3, 7, 9, 11 and 13.

The Inland Transport Committee (ITC), at its eighty-first annual session in 2019 adopted the ITC Strategy until 2030, invited its subsidiary bodies to take follow-up actions aligning their work with the strategy. In June 2019, the ITC Chair invited all Chairs of Working Parties or Administrative Committees to support in the implementation of the ITC Strategy by proposing a concrete plan aligning the work of their Working Party or Administrative Committee with the ITC strategy.

For the implementation of the ITC strategy ITC identified that, apart from the regular work, the subsidiary bodies need to undertake the following tasks in the Strategy (only those relevant to WP.29 are displayed):

- (a) Amendments to the legal instruments with geographical and procedural barriers by 2025 (all WPs/SCs and ACs)
- (b) Review of relationship of the existing legal instruments and recommendations by 2022 (all WPs/SCs and ACs to review the legal instruments in the context of different clusters, namely safety, cross-border efficiency, environment and connectivity)
- (c) Identification of additional necessary legal instruments (Based on the review, all WPs/SCs and ACs to identify gaps of the legal instruments fully meet the needs for safety, cross-border efficiency, environment and connectivity)

...

- (e) Exploring possible new legal instruments from 2020 (all WPs/SCs and ACs based on the above item c)
- (f) Further expand global participation in, and cooperation between, WP.1 and WP.29
  - (g) Update DETA and host it at ECE from 2022 onwards (WP.29)

..

- (j) Identify, foster and facilitate the introduction of new technologies in the rail, road, road-based mobility, inland waterway, logistics, intermodal transport until 2030 (all WPs/SCs and ACs)
- (k) Enhance support to automated vehicles from 2019, including continuation of amendments to the existing legal instruments and standards, and possible development of new agreement(s), both if necessary (WP.1 and WP.29)
- (l) New training standards and competency criteria from 2022 (all WPs/SCs and ACs with legal instruments)

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(q) New tools and activities from 2019, e.g. - THE PEP; further development of local pollutant module of ForFITS; reviews on green transport and mobility (WP. 5, WP.29)

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In conclusion and considering ITC's special priority of global interest, Road Safety, the top priorities for the work of the World Forum for Harmonization of Vehicle Regulations are related to vehicle safety, including the field of automated vehicles paving the way for a

regulatory framework supporting the introduction of these emerging technologies towards future autonomous vehicles, and to environmental protection and climate change mitigation. A detailed list of UN Regulations, UN GTRs, UN Rules and Resolutions for discussion at the upcoming sessions of WP.29 is shown in Table 1.

#### 1. Further development and implementation of the three Vehicle Agreements

- 1.1. **1958 Agreement**: Following the adoption and entry into force of Revision 3 of the 1958 Agreement on 14 September 2017, the requirements for International Whole Vehicle Type Approval (IWVTA) are to be further developed within UN Regulation No. 0. and DETA to be established.
- 1.2. **1997 Agreement**: Amendments to the agreement entered into force on 13 November 2019 introducing elements related to the performance and quality of periodic technical inspections. These endeavours were underpinned by resolution R.E.6 covering skills and training for inspectors, requirements for testing equipment and supervision of test centres. Two additional rules were established covering vehicles with gaseous fuels and electric or Hybrid electric propulsion systems. Access to information necessary for performance of periodic technical inspection of modern vehicles needs to be addressed.
- 1.3. **1998 Agreement**: Following the establishment of Special resolution S.R.3, the implementation of the agreement will be followed with a more strategic approach by identifying key elements that define elements the work will focus on.

#### 2. Horizontal activities

2.1. Performance requirements outside test conditions (ECE/TRANS/WP.29/1126, para. 21) and whole life compliance are elements to be considered in all areas of work both in WP.29 and in all GRs.

#### 3. Main topics of the Subsidiary Bodies

- 3.1. At the 178th, 179th and 180th session of WP.29, all GRs were invited to perform a review of their activities and to identify top priorities of their work. The outcome of this review provided the basis for the establishment of the Programme of Work of the World Forum for Harmonization of Vehicle Regulations (WP.29) and its Subsidiary Bodies for the year 2020 and beyond (ECE/TRANS/WP.29/1145, para. 7 and ECE/TRANS/WP.29/1149, para.). There was common agreement that in addition to the work on top priorities, existing UN Regulations, UN GTRs and UN Rules would need to be updated for keeping pace with technical progress on a continuous basis. GRs identified the following main priorities of work for 2020:
- 3.1.1. GRBP main topics are the work on real driving Additional Sound Emission provision (ASEP) for Quiet Road Transport Vehicles (QRTV), Reverse Warning System (RWS), revision of sound limit values, sound measurement uncertainties as well as wet grip for tyres in a worn state. A detailed list of priority activities of GRBP is presented in Table 2.
- 3.1.2. GRE is continuing the work on simplification of the lighting regulations following the establishment of the UN Regulations Nos. 148,149 and 150 as well as Resolution R.E.5 on the common specification of light source categories. Once the first stage of simplification is finalized, in the second stage, GRE will focus on introducing technology neutral requirements, also taking into account work to avoid glare and to ensure good visibility for dipped beam headlamps. A detailed list of priority activities of GRE is presented in Table 3.
- 3.1.3. GRPE main area of work is related to a new UN GTR and a new UN Regulation on Global Real Driving Emissions (GRDE), Determination of Electrified Vehicle Power (DEVP), in-vehicle battery durability, sub-23 nm exhaust particles and particulates stemming from brake emissions. A detailed list of priority activities of GRPE is presented in Table 4.
- 3.1.4. GRVA is establishing further elements for the UN vehicle regulatory framework towards automated driving. This includes Functional Requirements for automated / autonomous vehicles, New assessment / Test methods, Cyber security and (Over-the-Air) Software updates and Data Storage System for Automated Driving vehicles (DSSAD). A detailed list of priority activities of GRVA is presented in Table 5.

- 3.1.5. GRSG work will focus on Event Data Recorder (EDR) with a new UN Regulation and UN GTR, on augmented reality in the driver's field of vision and vehicle connectivity elements related to virtual keys. A detailed list of activities of GRSG is presented in Table 6.
- 3.1.6. GRSP focuses its work on a UN Regulation for transposition of UN GTR No.20 for electric vehicle safety as well as on transposition of UN GTR No. 7 on head restraints into UN Regulation No.17, update of UN crash regulations and on child restraint systems. A detailed list of priority activities of GRSP is presented in Table 7.

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Subject			Document symbol ECE/TRANS/WP.29/	Documentation availability
0.	Inte	lligent Transport Systems (ITS)		
1.0.	Auto	omated/Autonomous Driving		
1.0.1.		nework document on mated/autonomous vehicles.		
1.0.2.		ctional Requirements for automated / autonomous vehicles		
1.0.3.	New	assessment / Test method		
1.0.4.		er security and (Over-the-Air) ware updates		
1.0.5.	Ever	nt Data Recorder (EDR)		
1.0.6.		a Storage System for Automated ing vehicles (DSSAD)		
1.1.	1958	3 Agreement	For document symbol availability, please (1152)	
1.1.1.	Proposal for amendments to UN Regulations to be considered at the June 2020 session			
	UN regulation No.:			
	14	(Safety-belt anchorages);		
	16	(Safety-belts);		
	22	(Protective helmets);		
	30	(Tyres for passenger cars and their trailers);		
	41	(Noise emissions of motorcycles);		
	42	(Front and rear protection devices);		
	44	(Child restraint systems);		
	78	(Motorcycle braking);		
	79	(Steering equipment);		
	83	(Emissions of M1 and N1 vehicles);		
	94	(Frontal collision);		
	95	(Lateral collision);		
	101	(CO2 emission/fuel consumption);		
	108	(Retreaded tyres for passenger cars and their trailers);		
	109	(Retreaded tyres for commercial vehicles and their trailers);		
	117	(Tyre rolling resistance, rolling noise and wet grip).		

129 (Enhanced Child Restraint Systems);

137 (Frontal impact with focus on restraint systems);

Document symbol Documentation
Subject ECE/TRANS/WP.29/... availability

138 (Quiet road transport vehicles);

140 (ESC);

152 (AEBS);

1.1.2. Proposal for new UN Regulations to be considered at the June 2020 session

Proposal for a new UN Regulation on Worldwide harmonized Light vehicles Test Procedure;

Proposal for a new UN Regulation on uniform provisions concerning the approval of vehicles with regards to cyber security and cyber security management system;

Proposal for a new UN Regulation on uniform provisions concerning the approval of vehicles with regards to software update and software update management system;

Proposal for a new UN Regulation on uniform provisions concerning the approval of vehicles with regards to Automated Lane Keeping System;

1.1.3. Status of the Agreement and of the annexed UN Regulations, including the latest situation report

343/Rev.28

- 1.1.4. Development of an International Whole Vehicle Type Approval (IWVTA) system,
- 1.1.5. Consideration of amendments to the 1958 Agreement.
- 1.1.6. Development of an electronic database for the exchange of type approval documentation (DETA)

#### 1.2. 1998 Agreement (Global)

1.2.1. Consideration of draft UN GTRs and amendments to them to be considered at the June 2020 session

UN GTR Nos.:

- 3 (Motorcycle braking)
- 6 (Safety glazing)
- 16 (Tyres)
- 19 (Evaporative Test emission procedures for the Worldwide harmonized Light vehicles Test Procedures (EVAP WLTP))
- 1.2.2. Consideration of Mutual Resolutions

Nil

For document symbols and its availability, please refer to the agenda (1152)

Subject Document symbol Documentation
ECE/TRANS/WP.29/... availability

1.2.3. Guidance for the development of UN GTRs:

Ni

- 1.2.4. Progress on the development of new UN GTRs and of amendments to established UN GTRs
- 1.2.5. Consideration of draft UN GTRs and amendments to them to be considered at the November 2020 session

(1154)

UN GTR Nos.:

- 7 (Head restraints)
- 1.2.6. Consideration of new Mutual Resolutions
- 1.2.7. Guidance for the development of UN GTRs:

Nil

- 1.2.8. Progress on the development of new UN GTRs and of amendments to established UN GTRs
  - 1 (Doors locks and door retention components)
  - 2 (Worldwide Motorcycle emission Test Cycle (WMTC))
  - 3 (Motorcycle braking)
  - 4 (Worldwide Heavy-Duty vehicle emission test Cycle (WHDC))
  - 5 (On-Board Diagnostic Systems (OBD))
  - 6 (Safety glazing)
  - 7 (Head restraints)
  - 8 (Electronic stability control systems (ESC))
  - 9 (Pedestrian safety)
  - 10 (Off-cycle emissions (OCE))
  - 11 (Agricultural and forestry tractors and non-road mobile machinery emission test procedures)
  - 12 (Motorcycle Controls, Tell-tales and Indicators)
  - 13 (Hydrogen and Fuel Cell Vehicles (HFCV) Phase 2)
  - 14 (Pole Side Impact (PSI)
  - (Worldwide harmonized Light vehicle Test Procedures (WLTP) – Phase 2)
  - 16 (Tyres)

Subject			Document symbol ECE/TRANS/WP.29/	Documentation availability
	17	(Crankcase and evaporative emissions for two- or three-wheeled motor vehicles)		
	18	(On-board diagnostics for two- or three-wheeled motor vehicles)		
	19	(EVAPorative emission test procedure for the Worldwide harmonized Light vehicle Test Procedure (WLTP EVAP))		
	20	(Electric Vehicles Safety (EVS))		
		ft UN GTR on Quiet Road Transport icles (QRTV)		
		ft UN GTR on Global Real Driving ssions (GRDE)		
	elec	ft UN GTR on determination of trified vehicle power (Electric cles and the environment)		
1.2.9.		hange of views on items for new Global Technical Regulations		
	Har	monization of side impact		
	Spe	cifications for the 3-D H point machine		
	Eve	nt Data Recorder (EDR)		
1.3.	199′	7 Agreement (Inspections)	For document symbol availability, please (1152)	
1.3.1.	Futu	are development of the Agreement	,	
1.3.2.	Con	sideration of new UN Rules		
	Nil			
1.3.3.	Up	date of existing UN Rules		
	Nil			
1.3.4.	Am	endments to Resolution R.E.6		

ECE/TRANS/WP.29/2020/1/Rev.1

Table 2
Subjects under consideration by the Working Party on Noise and Tyres (GRBP)

			GRBP				
Priority/ recurrent	Title	Tasks / Deliverables	References	Allocations / IWGs	Timeline	Chair/Initiator	Comments
Priority	Real Driving Additional sound emission Provision (ASEP)	Real driving sound emissions and the extended work of IWG ASEP such as manipulation-safe active components and software, anti- tampering, ASEP NORESS	R 51, R 41	IWG ASEP	GRBP January 2021 with UN-R51-04 (latest)	Chair: Germany secretariat: OICA	M1, N1 L3 and their NORESS
Priority	Wet Grip on Worn Tyres (WGWT)	Additional prescriptions regarding performances on Wet Grip of Worn Tyres to be added in R 117.	R 177	IIWG WT	C1: GRBP January. 2021	Co- Chairs: France & European Commission Secretariat: ETRTO	C2, C3 to be considered
Priority	Uncertainties	Assessment of measurement uncertainties and track alignment	R51 R117 R41	IWG -MU	GRBP January 2021 official document R 51 & R 117	Chair: Norway Secretariat: OICA	R 51: Noise R117: Noise Other regulations: Deadline to be defined
Priority	Reverse Warning System (RWS)	Harmonisation of Reverse Warning Systems (Components and vehicles) with the aim of lower sound emissions on a high safety level. Camera Monitor systems as an alternative to RWS	New Regulation	TF-RWS	GRBP September, 2020	Chair: Japan Secretariat OICA	M2, N2, M3, N3
Priority	TPMS	Tyre Pressure Monitoring System (TPMS)	R 141 R 142	TF TPMS	GRBP January 2021	Chair EC Secretariat: R 141 CLEPA R 142: ?	Linked to work done by EC

			GRBP				
Priority/ recurrent	Title	Tasks / Deliverables	References	Allocations / IWGs	Timeline	Chair/Initiator	Comments
Potential	New wet grip test  New traction definition	Introduction of new Wet Grip test method for C1 tyres (ISO TC31 WG12) Introduction of new Traction definition for C2 and C3 tyres	R 117	GRBP	GRBP September 2020 (ETRTO)	ETRTO	C1 C2, C3
Potential	Noise limits	Revision of limit values Phase 3 (considering new technologies and tyre noise related to UN-R51-03)	R 51	TF?	Article 11 of EU Regulation 540/2014, for the EC study on sound level limits, that should be published by 1/7/2021	to be decided in sept 2020?	M, N
	Type definition	Consideration on tolerances for type defining parameters and Selection scheme for a representative vehicle	R51 R41				

### Subjects under consideration by the Working Party on Noise and Tyres (GRBP)

Subject			Document symbol ECE/TRANS/WP.29/	Documentation availability		
2.1.	195	8 Agreement	For document symbols and its availability, please refer to the agenda of			
2.1.1. Proposal for draft amendments to existing UN Regulations (1958 Agreement):			the sixty-ninth session (GRBP/2020/1)			
Part 1	l – No	vise:				
	41	(Noise of motorcycles);				
	51	(Noise of M and N categories of vehicles);				
	138	(Quiet road transport vehicles);				
Part 2	2 – Ty	res:				
	30	(Tyres for passenger cars and their trailers);				
	108	(Retreaded tyres for passenger cars and their trailers)				
	109	(Retreaded tyres for commercial vehicles and their trailers);				
	117	(Tyres - Rolling resistance, rolling noise and wet grip);				
2.2.	199	8 Agreement (Global)	For document symb			
	16	(Tyres), if needed.	availability, please in the sixty-ninth sessi	refer to the agenda of on (GRBP/2020/1)		

Table 3
Subjects under consideration by the Working Party on Lighting and Light-Signalling (GRE)

			GRE				
Priority	Title	Tasks / Deliverables	References	Allocations / IWGs	Timeline	Initiator	Comments
Priority	Simplification Stage 2	Simplify and update the technical requirements of the new Regulations Nos. 148, 149, 150, as well as the installation Regulations Nos. 48, 53, 74, 86 to become future proof and technology neutral, with performance-based and objective test requirements	New simplified UN Regulations Nos. 148, 149 and 150 and amendments to UN Regulations Nos. 48, 53, 74, 86	GRE, IWG-SLR	[2022]	IWG-SLR (GRE)	Ongoing
Priority	Installation New Series of Amendments for Regulation No. 48 (R53, R74, R86)	Many proposals merged; various amendments, improvements and clarifications including visibility and glare (headlamps, headlamp levelling, direction indicators, daytime running lamps, rear position lamps, etc.)	UN Regulation No. 48 [ECE/TRANS/WP.29/GRE/2020/8]	GRE, IWG-SLR, SIG-R.48	2020	Various CP's	To be finalized
Priority	EMC issues (e.g. for electrical vehicles)	Further development of EMC requirements (e.g. for EV's)	UN Regulation No. 10	TF-EMC	[2021]		Ongoing
Priority	['Unique Identifier']	Suitable application of the 'Unique Identifier' ('UI') for the lighting Regulations	SLR-37-01	GRE IWG-SLR	[2020]	IWG-SLR (request WP.29)	Ongoing

## Subjects under consideration by the Working Party on Lighting and Light-Signalling (GRE)

Subject			Document symbol ECE/TRANS/WP.29/	Documentation availability		
3.1.	1958	8 Agreement	For document symb			
3.1.1.		oosal for draft amendments to existing Regulations (1958 Agreement):	availability, please refer to the agenda of the eighty-third session (GRE/2020/1)			
	48	(Installation of lighting and light-signalling devices);				
	53	(Installation of lighting and light signalling devices for L <sub>3</sub> vehicles);				
	65	(Special warning lamps);				
	86	(Installation of lighting and light- signalling devices for agricultural tractors);				
	98	(Headlamps with gas-discharge light sources);				
	123 (Adaptive front lighting systems (AFS));					
	148	Light-Signalling Devices (LSD)				
	149	Road Illumination devices (RID)				
	150	Retro-Reflective Devices (RRD)				
3.1.2.	Prop	oosal for draft new UN Regulations:				
	Nil					
3.2.	1998	8 Agreement (Global)				
	Poss	sibility to develop further UN GTRs				
3.3.	1997	7 Agreement (Inspections)				
	Nil					
3.4.	ame	posal for draft recommendations or indments to existing ommendations				
3.5.	Mise	cellaneous items	For document symb			
	Amendments to the Convention on Road Traffic (Vienna 1968)		availability, please of the eighty-first so (GRE/2020/1)			
		elopment of an international whole cle type approval (IWVTA)	, , , , ,			
	Dec: 2020	ade of action for road safety 2011– );				
	Obse	olete transitional provisions				
	Dire	ection for future GRE work				

Table 4
Subjects under consideration by the Working Party on Pollution and Energy (GRPE)

		GRF	PE			
Priority	Justification/Background information	References	Allocations /IWGs/TFs	Timeline	Chair /sponsor(s)	Comments
Improvement of exhaust emissions requirements to ensure	Revise technical requirements to allow technological progress, ensure technological neutrality by	UNR on RDE	IWG on RDE	June 2020	EC-JP-KR	Adopted in GRPE June 2020
real drive performance on the road	introducing consistent and long- lasting performance-based emissions measures, at type	UN GTR on RDE	IWG on RDE	Jan 2021 (Phase 1) [tbd] (Phase 2)	EC-JP-KR	
	approval, in use and potentially over the lifetime of the vehicle.	08 Series to UN Regulation No. 83	GRPE	Jan 2021	EC	
		Amendment to UN Regulation No. 49 to reflect latest regulatory evolution	GRPE	June 2021	EC	
New propulsion energy	Develop technical regulation to ensure environmentally-friendly and level-playing market introduction of new form of propulsion energy, such as hydrogen and electricity.	UN GTR on DEVP	IWG on EVE	June 2020	US-CAN	Adopted in GRPE June 2020
		UN GTR on in Vehicle Battery durability	IWG on EVE	June 2021	US-CAN, China, EC, Japan	
		Heavy Duty Hybrids	GRPE	[2022]	[tbd]	
Particulate emissions : Provisions to limit airborne particulates from different sources	Sub-23 nm exhaust particles for light- and heavy-duty applications, in the laboratory and on the road	Amendments to UN GTR No. 15 and UN GTR No. 4	IWG on PMP	June 2021	EC	Light duty laboratory adopted in GRPE June 2020 - still on- going for PEMS-PN and heavy duty application
	Brake emissions	New UN GTR	IWG on PMP	Jan 2022	EC	
	Tyre wear emissions	tbd	IWG on PMP / GRPE	[June 2023]	[EC]	

#### Subjects under consideration by the Working Party on Pollution and Energy (GRPE)

Subject

Document symbol Documentation ECE/TRANS/WP.29/... Documentation availability

4.1. 1958 Agreement

4.1.1 Proposal for draft amendments to existing UN Regulations (1958 Agreement):

For document symbols and its availability, please refer to the agenda of the eighty's session (GRPE/2020/1)

- 24 (Visible pollutants, measurement of power of C.I. engines (Diesel smoke));
- 40 (Emission of gaseous pollutants by motorcycles);
- 47 (Emission of gaseous pollutants of mopeds)
- 49 (Emissions of compression ignition and positive ignition (LPG and CNG) engines);
- 68 (Measurement of the maximum speed, including electric vehicles);
- 83 (Emissions of  $M_1$  and  $N_1$  vehicles);
- 85 (Measurement of the net power);
- 96 (Diesel emission (agricultural tractors));
- 103 (Replacement pollution control devices);
- 115 (LPG and CNG retrofit systems);
- 120 (Net power of tractors and non-road mobile machinery);
- 132 (Retrofit Emissions Control devices (REC));
- 133 (Recyclability of motor vehicles);
- 143 (Heavy duty dual-fuel engine retrofit systems)
- 4.1.2. Proposal for draft new UN Regulations

Nil

#### 4.2. 1998 Agreement (Global)

- 2 (Worldwide motorcycle emissions test cycle (WMTC));
- 4 (Worldwide harmonized Heavy-Duty Certification Procedure (WHDC));
- 5 (Worldwide harmonized Heavy duty on-board diagnostic systems (WWH-OBD));
- 10 (Off-Cycle Emissions (OCE));
- 11 (Non-road mobile machinery engines);
- 15 (Worldwide harmonized Light Vehicle Test Procedure (WLTP));
- 17 (Crankcase and evaporative emissions of L-category vehicles);
- 18 (On-Board Diagnostic (OBD) systems for L-category vehicles);

For document symbols and its availability, please refer to the agenda of the eighty's session (GRPE/2020/1)

Document symbol Documentation
Subject ECE/TRANS/WP.29/... availability

4.2.1. Proposal for developing new UN Global Technical Regulations

Vehicles Interior Air Quality (VIAQ)

#### 4.3. 1997 Agreement (Inspections)

Ni

# 4.4. Proposal for draft recommendations or amendments to existing recommendations

Nil

#### 4.5. Miscellaneous items

World-wide harmonized Light vehicles Test Procedure (WLTP)

Heavy Duty Hybrids (HDH)

Particle Measurement Programme (PMP)

Gaseous Fuelled Vehicles (GFV)

Environmental and Propulsion Performance Requirements (EPPR) for Lcategory vehicles

Electric Vehicles and the Environment (EVE)

Vehicle Propulsion System Definitions (VPSD)

Fuel Quality (FQ)

International Whole Vehicle Type Approval (IWVTA)

Exchange of information on national and international requirements on emissions

Vehicles Interior Air Quality (VIAQ)

Global Real Driving Emissions (RDE)

For document symbols and its availability, please refer to the agenda of the eighty's session (GRPE/2020/1)

 $\begin{tabular}{ll} Table 5 \\ Subjects under consideration by the Working Party on Automated / Autonomous and Connected Vehicles (GRVA)* \end{tabular}$ 

		GRVA		
Category	Item	Activities in 2020	Top three priorities for 2021	Initiator
ADAS	AEBS	X		EU
	ACSF	X		OICA / AVERE
Automated Vehicles	ALKS	X		Germany / Japan
	FRAV	X	X	Framework doc.
	VMAD	X	X	Framework doc.
	DSSAD	X		Framework doc.
Connectivity	Cyber Security	X	X	Framework doc.
	(OTA) software updates	X		Framework doc.
Braking	MVC	X		Sweden / OICA
	Motocycle braking	X		Italy / IMMA

## Subjects under consideration by the Working Party on Automated / Autonomous and Connected Vehicles (GRVA)

Subject			Document symbol ECE/TRANS/WP.29/	Documentation availability	
5.1.	1958 Agreement		For document symbols and its		
5.1.1.	Proposal for draft amendments to existing UN Regulations (1958 Agreement):		availability, please of the fifth and sixt (GRVA/2020/2 and		
	13 a	and 13-H (Braking);			
	<ul><li>78 (Motorcycle braking);</li><li>79 (Steering equipment);</li><li>89 (Speed limitation devices);</li></ul>				
	90	(Replacement brake linings);			
	139	(Brake Assist Systems);			
	140	(Electronic Stability Control);			
	152	AEBS for $M_1$ and $N_1$ )			
5.1.2.	Prop	oosal for draft new UN Regulations:			

<sup>\*</sup> List of priorities still under discussion by the GR.

Document symbol Documentation
Subject ECE/TRANS/WP.29/... availability

Automated Lane Keeping Systems. (ALKS)

Data Storage System for Automated Driving (DSSAD).

Cyber security and (over-the-air) software updates.

#### 5.1.3. Vehicle automation

Remote Control Manoeuvring (RCM)

Automated Controlled Steering Function (ACSF)

Automated Lane Keeping Systems (ALKS)

Validation Methods for Automated Driving (VMAD)

Functional Requirements for Automated and Autonomous Vehicles (FRAV)

Longitudinal control (Adaptive Cruise Control, preventing braking);

Transition demand (Human Machine Interface (HMI));

Driver Availability Recognition;

Information to the driver (HMI);

Electronic System Compliance (Complex Electronics Development);

Periodic Technical Inspection/ Roadworthiness Provisions;

Cyber Security;

Software (incl. Over-the-Air) updates;

Data Storage System for Automated Driving (DSSAD);

Night Vision;

Rear crossing alert;

Door-open blind spot detection;

Around view monitoring

#### 5.2. 1998 Agreement (Global)

3 (Motorcycle braking);

For document symbols and its availability, please refer to the agenda of the fifth session (GRVA/2020/1)

#### 5.3. 1997 Agreement (Inspections)

Nil

# 5.4. Proposal for draft recommendations or amendments to existing recommendations:

Nil

#### 5.5. Miscellaneous items

Intelligent Transport Systems (ITS)

For document symbols and its availability, please refer to the agenda

Subject	Document symbol Documentation ECE/TRANS/WP.29/ availability
Intelligent Transport Systems/Automated Driving (AD)	of the fifth session (GRVA/2020/1 and GRVA/2020/28)
Connected, automated and autonomous vehicles	S
Functional Requirements for automated / autonomous vehicles	/
New assessment / Test method	
Cyber security and (Over-the-Air) Software updates	
Data Storage System for Automated Driving vehicles (DSSAD)	i
Horizontal regulation on automated and autonomous vehicles and associated recommendations	
System safety	
Artificial Intelligence technologies for wheeled vehicles	г
Driver availability recognition	
Vehicle cybersecurity and data protection	1
Rear crossing traffic alerting	
Night Vision system	
360-degree vision monitor	
International Whole Vehicle Type Approval (IWVTA)	2
Modular Vehicle Combinations (MVC)	
Exchange of views on innovations and relevant national activities	i

Table 6 **Subjects under consideration by the Working Party on General Safety Provisions (GRSG)** 

	GRSG									
Priority/ recurrent	Title	Tasks / Deliverables	References	Allocations / IWGs	Timeline	Initiator	Comments			
Priority	Event Data Recorder	Establish new performance requirements for EDR suitable for potential new UN R and/or UN GTR	ECE/TRANS/WP.29/2019/34/ Rev.	IWG on EDR/DSSAD	2020	WP.29	IWG reporting both to GRSG and GRVA			
Priority	Field of View Assistant (FoVA)	Verify and address as necessary "Augmented Reality" related aspects in relation with existing UN Regulations / UN GTRs / UN Rules	- UN R- 125 - GRSG-117-27  Field of View Assistant (FOVA) increases driver awareness but constitute obstacle to the prescribed driver's field of vision (e.g. head-up displays) . If GRSG deems there is a safety benefit, Reg. 125 should be amended to modify requirements on FoVA.			OICA				
Priority	Security	Virtual keys	UN R 116 GRSG-117-31 Amend the definition of keys taking into account innovative vehicle alarms systems (virtual key).			OICA				
recurrent	Consolidated Resolution on the construction of vehicles	Update to technical progress Inclusion of automated vehicles (classification)	R.E.3 GRSG-117-06			WP.29 France				

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	GRSG						
Priority/ recurrent	Title	Tasks / Deliverables	References	Allocations / IWGs	Timeline	Initiator	Comments
recurrent	Safety glazing	Update to technical progress	UN R 43 / UNGTR 6	Panoramic Sunroof Glazing (PSG)	April 2020	Korea WP.29	
recurrent	Anti-theft and alarm systems	Update to technical progress	UN R 116			WP.29	Splitting into three new UN R for compatibility with IWVTA
recurrent	Burning behaviour of materials	Update to technical progress	UN R 118	Behaviour of M <sub>2</sub> and M <sub>3</sub> category vehicles' general construction in case of fire events (BMFE		France WP.29	
recurrent	Blind Spot Information Systems	Update to technical progress	UN R 151	Awareness of Vulnerable Road Users proximity (VRU-Proxi)	April 2021	Japan, EC WP.29	

## Subjects under consideration by the Working Party on General Safety Provisions $(\mbox{GRSG})$

Subject		Document symbol Documentation ECE/TRANS/WP.29/ availability
6.1.	1958 Agreement	For document symbols and its availability, please refer to the agenda for the 118th session (GRSG/2020/1)
6.1.1.	Proposal for draft amendments to existing UN Regulations (1958 Agreement):	
	43 (Safety glazing);	
	46 (Devices for indirect vision);	
	55 (Mechanical couplings);	
	58 (Rear underrun protective devices);	
	60 (Driver operated controls (mopeds/motorcycles));	
	67 (LPG vehicles);	
	93 (Front underrun protection);	
	107 (M <sub>2</sub> and M <sub>3</sub> vehicles);	
	110 (CNG and LNG vehicles);	
	116 (Anti-theft and alarm systems);	
	118 (Burning behaviour of materials);	
	125 (Forwardfield of Vision for Drivers);	
	144 (Accident Emergency Call Systems (AECS))	
6.1.2.	Proposal for draft new UN Regulations:	
	Advanced Driver Assistance Systems for blind spot monitoring.	
6.2.	1998 Agreement (Global)	For document symbols and its availability, please refer to the agenda for the 118th session (GRSG/2020/1
	Possibility to develop further UN GTRs	
	6 (Safety glazing)	
6.3.	1997 Agreement (Inspections)	
	Nil	
6.4.	Proposal for draft recommendations or amendments to existing recommendations:	
	Nil	
6.5.	Miscellaneous items	For document symbols and its availability, please refer to the agenda for the 118th session (GRSG/2020/1
	International Whole Vehicle Type Approval (IWVTA)	
	Consolidated Resolution on the Construction of Vehicles (R.E.3)	
	Event Data Recorder	

ECE/TRANS/WP.29/2020/1/Rev.1

Table 7 Subjects under consideration by the Working Party on Passive Safety (GRSP)  $\mbox{\ensuremath{^*}}$ 

			GRSP				
Priority/ recurrent	Title	Tasks / Deliverables	References	Allocations / IWGs	Timeline	Initiator	Comments
			Short term				
Priority	Child restraint systems	Amendment of scope  Harmonization and improvement of test tools	ECE/TRANS/WP.29/GRSP/2019/28	EC	Finalise in GRSP 66 <sup>th</sup> meeting, WP.29 June 2020	EC	To be finalised
Priority	Update of UN crash regulations following revised EU GSR	Depending on GRSP 66 <sup>th</sup> meeting outcome if further work is needed or is transmitted to WP.29 June 2020	ECE/TRANS/WP.29/GRSP/2019/29 ECE/TRANS/WP.29/GRSP/2019/30 ECE/TRANS/WP.29/GRSP/2019/37 ECE/TRANS/WP.29/GRSP/2019/38 GRSP-66-09	TF - EU GSR Revision	Finalise in GRSP 66 <sup>th</sup> meeting at the latest, WP.29 June 2020	EC	To be finalised
Priority	Head restraints	Transposition of GTR7 in UN R17	ECE/TRANS/WP.29/GRSP/2019/27 New consolidated working document for 67 <sup>th</sup> session of GRSP	Ad hoc group on R17	Finalise in GRSP 67 <sup>th</sup> meeting at the latest, WP.29 November 2020	EC	To be finalised
Priority	Electric vehicles safety	Transposition of GTR20 in UN R94, R95, R100, [R136] R137 [and R146], [possibly in R12 (t.b.c.)]	N/A	Ad hoc group on R100	Finalise in GRSP 67 <sup>th</sup> meeting at the latest, WP.29 November 2020	JPN, EC	Side meetings of EVS IWG Phase 2
			Medium term	1	l		-
Priority	Deployable pedestrian protection systems	Inclusion in GTR9	ECE/TRANS/WP.29/AC.3/45 ECE/TRANS/WP.29/AC.3/45/Rev.1	IWG-DPPS	06/2020	KOR	Ongoing
Priority	Head impact zone enlargement	Inclusion in GTR9	N/A	T.b.d.	WP.29 June 2021	EC, JPN	To be started

<sup>\*</sup> List of priorities still under discussion by the GR.

			GRSP				
Priority/ recurrent	Title	Tasks / Deliverables	References	Allocations / IWGs	Timeline	Initiator	Comments
Priority	Deployable pedestrian protection systems and head impact zone enlargement	Transposition in UN R127	N/A	N/A	WP.29 June 2021	EC, JPN	To be started
Priority	Hydrogen safety material compatibility and new tank concepts	Inclusion in GTR13 'phase 2'	ECE/TRANS/WP.29/AC.3/49	IWG-HFCV	WP.29 November 2021	JPN, KOR, EC	Ongoing
Priority	Hydrogen safety material compatibility and new tank concepts	Transposition in UN R134 [and R146]	N/A	T.b.d.		EC, JPN	To be started if agreed by GRSP
Priority	Electric vehicles safety	GTR20 Phase 2		IWG-EVS		US, EC, CN, JP	Ongoing
Priority	Children in buses	New reg	2019/22 and GRSP-66-06	IWG-STCBC	WP29 March 2023	SP	Ongoing
			Long term				I
Priority	Helmets	07 series of amdt Phase 2 of IWG	2019/25 and GRSP-66-22	IWG PH (mandate to be proposed)	2022 ?	FR IT	To be started if agreed by GRSP

#### Subjects under consideration by the Working Party on Passive Safety (GRSP)

Document symbol Documentation ECE/TRANS/WP.29/... Subject availability 7.1. 1958 Agreement For document symbols and its availability, please refer to the agenda 7.1.1. Proposal for draft amendments to existing for the sixty-seventh session UN Regulations (1958 Agreement): (GRSP/2020/1) 21 (Interior fittings); 22 (Protective helmets); (Strength of seats and their anchorages (buses)); 94 (Frontal collision); (Lateral collision) 100 (Electric power trained vehicles); 127 (Pedestrian safety); 129 (Enhanced child restraint systems) 134 (Hydrogen and fuel cell vehicles (HFCV)) 137 Frontal impact with focus on restraint systems 7.1.2. Proposal for draft new UN Regulations:

Nil

### 7.2. 1998 Agreement (Global)

- 9 (Pedestrian safety);
- 13 (Hydrogen and Fuel Cells Vehicles)
- 20 (Electric vehicle safety)

Electric vehicles

Vehicle Crash compatibility

#### 7.3. 1997 Agreement (Inspections)

Nil

# 7.4. Proposal for draft recommendations or amendments to existing recommendations

Mutual Resolution No. 1.

For document symbols and its availability, please refer to the agenda for the sixty-seventh session (GRSP/2020/1)

Subject		Document symbol Documentation ECE/TRANS/WP.29/ availability				
7.5.	Miscellaneous items	For document symbols and its availability, please refer to the agenda				
	Exchange of information on national and international requirements on passive safety;	for the sixty-seventh session (GRSP/2020/1)				
	International Whole Vehicle Type Approval (IWVTA)					
	Securing of children in buses and coaches;					
	Exchange of views on vehicle automation;					
	Three-dimensional H-point machine;					
	Children left in cars.					