Informal Document **GRPE-90-15** 90th GRPE, 9th of January – 12th of January, 2024, agenda item 16

Report to 90th Session of GRPE (January 2024) Task Force Automated Vehicles Regulation Screening (TF-AVRS)

Number of Meetings

Web-meetings

- 1st Kick-off meeting: 13th March 2023
- 2^{nd} TF-AVRS: 4^{th} April 2023
- 3rd TF-AVRS: 17th April 2023
- 4th TF-AVRS: 9th May 2023
- 5th TF-AVRS: 22nd May 2023
- 6th TF-AVRS: 11th September 2023
- 7th TF-AVRS: 10th October 2023
- 8th TF-AVRS: 13th November 2023
- 9th TF-AVRS: 5th December 2023

13 Participants (Contracting Parties & NGOs)

• CPs:

Germany, France, United Kingdom, South Africa, Unites States, Netherlands

NGO's:
 OICA

Report TF-AVRS – GRPE-90

TF Automated Vehicles Regulation Screening

Targets	 WP29 requests a screening of regulation for application of Automated Vehicles. GRVA proposed a template for the screening TF-FADS (GRVA) provides further guidance
Roles	 Chair: [Netherlands] Secretariat: []
TF-AVRS wikipage	https://wiki.unece.org/pages/viewpage.action?pageId=198672917& src=contextnavpagetreemode

Screening process: Considered items

1. Terminology

• Relevant terms based on GRVA guidance (accelerator, handle-bar type steering)

2. Use cases AVs

- Driverless AVs
 - With passenger
 - Without passengers (cargo)
- AVs with driver
- Bi-directional AV's

3. Other considered items

- Telltales & warning signals
- Test modes

UN Regulations	Title	Topic	Vehicle and/or Component	category	to be checked	changes required	First suggestions of the TF-AVRS					
							Issue	lssue for fully automated vehicles?	lssue for dual mode vehicles?	lssue for vehicles without occupants?	lssue for other use cases?	Possible action
ight vehicles												
UN Regulation No. 15	Measurement of emissions and fuel consumption	Emission	Vehicle	M1, N1	NO	NO	-		-	-		
UN Regulation No. 68	Measurement of the maximum speed, including electric vehicles	Speed	Vehicle	M1, N1	YES	YES	Requirements update	YES	NO	YES	-	Update requirements for AV
UN Regulation No. 83	Emissions of M1 and N1 vehicles	Emission	Vehicle	M1, N1	YES	YES	Many references to key words, update test procedures and additional energy consumption for AV	YES	NO	YES	Cargo AV	Development of procedure or clause for AV
UN Regulation No. 84	Measurement of fuel consumption	Fuel consumptio	Vehicle	M1, N1	NO	NO	-	-	-		-	-
UN Regulation No. 101	CO2 emissions/fuel consumption	Fuel consumptio n	Vehicle	M1, N1	YE\$	YES	Many references to key words, update test procedures and additional energy consumption for AV	YES	NO	YES		Development of procedure for AV
UN Regulation No. 103	Replacement pollution control devices	Emission	Vehicle & Component	M1, N1	YE\$	YE\$	Test procedure & indication	YES	NO	YES	-	Development of procedure or clause for AV
UN Regulation No. 154	Worldwide harmonized Light vehicles Test Procedures (WLTP)											
UN Global Technical Regulation No. 15	Worldwide harmonized Light vehicles Test Procedures											
UN Global Technical Regulation No. 19	Evaporative emission test procedure for the Worldwide harmonized Light vehicle Test Procedure (WLTP EVAP)	Evaporative emission	Vehicle	1-1, 2	YES	NO	-	NO	NO	NO		-
UN Global Technical Regulation No. 24	Laboratory Measurement of Brake Emissions for Light-Duty Vehicles	Brake emissions	Component (System)	1-1, 2								
UN Regulation No. 168	Real Driving Emissions	Emission	Vehicle	M1, M2, N1	YES (OICA)							
leavy duty vehicles												
UN Regulation No. 49	Emissions of compression ignition and positive ignition (LPG and CNG) engines											
UN Regulation No. 132	Retrofit Emissions Control devices (REC)											
UN Global Technical Regulation No. 4	World-wide harmonized Heavy Duty Certification procedure (WHDC)											
UN Global Technical Regulation No. 5	World-Wide harmonized Heavy Duty On-Board Diagnostic systems (WWH-OBD)											
UN Global Technical Regulation No. 10	Off-Cycle Emissions (OCE)											

Light Vehicles and He												
UN Regulation No. 24	Visible pollutants, measurement of power of C.I. engines (Diesel smoke)	Emission	Vehicle & Component	L, M, N	YES	YES	Test procedure	YES	NO	YES		Development procedure fo AV
UN Regulation No. 85	Measurement of the net power											
UN Regulation No. 115	LPG and CNG retrofit systems											
UN Regulation No. 133	Recyclability of motor vehicles	Recyclabilit y	Vehicle	M1, N1	YE\$	NO	-	NO	NO	NO	-	-
UN Regulation No. 143	Heavy Duty Dual-Fuel Engine Retrofit Systems (HDDF-ERS)											
Agricultural and forest	try tractors, non-road m	obile ma	chinery									
UN Regulation No. 96	Diesel emission (agricultural tractors)											
UN Regulation No. 120	Net power of tractors and non- road mobile machinery											
UN Global Technical Regulation No. 11	Non-road mobile machinery engines											
Motorcycles and mope	eds											
UN Regulation No. 40	Emission of gaseous pollutants by motorcycles											
UN Regulation No. 47	Emission of gaseous pollutants of mopeds											
UN Global Technical Regulation No. 2	World-wide Motorcycle emissions Test Cycle (WMTC)	Emission	Vehicle	Two-wheeled Motorcycle	YES	YES	Test procedure	YES	NO	YES		Development procedure fo AV
UN Global Technical Regulation No. 17	Crankcase and evaporative emissions of L- category											
UN Global Technical Regulation No. 18	On-Board Diagnostic (OBD) systems for L-category vehicles											
UN Global Technical Regulation No. 23	Durability											
	the Environment (EVE)											
UN Global Technical Regulation No. 21	DEVP											
UN Global Technical Regulation No. 22	In-Vehicle Battery Durability				YES (UK)							
M.R.												
Mutual Resolution No. 2	M.R.2											

TF-AVRS Results

- No vehicle categories will be excluded from screening
- 2 Regulations are excluded from screening (old)
- 9 regulations are screened
- 1 regulation is planned to be screened

Next steps

- Continue with meetings once per month
- Participants from CP's and NGO's are really needed to accelerate the screening and to continue the necessary work after the screening.
 - Interesting topic and good opportunity to get familiar with GRPE legislation
- GRPE is really behind on other GR's
- Timeline for amendments needs to be provided in March 2024 to WP.29, which means that screening should be finished before March 2024! A final report with summary sheet of the screened legislation needs to be provided.
- Who is willing to join TF-AVRS?

Thank you for your attention