### Transmitted by the TF-VS (Vehicles' Sound)

Informal document GRBP-74-03-**Rev.1** (74th GRBP, September 2021, Agenda item 3)

# **Guidelines of the Task Force Vehicles' Sound**

#### A. Introduction

- 1. Within the informal group for the future work of GRBP and during the seventy-third session of GRBP, several studies were presented:
  - GRBP-73-11 (ETRTO) Tyre performance study
  - GRBP-73-23 (EC) Study on sound level limits of M- and N-category vehicles (updates previous presentation GRBP-72-25 (EC) and GRBP-71-11 (EC))
  - GRBP-73-25 (OICA) OICA/ACEA study on future sound limits values
  - GRBP-73-26 (EC) Technical support for the impact assessment on Euro 5 step of L-category sound emissions level limits
- Previous documents and a revised list of GRBP priorities were shared at GRBP
  - GRBP-70-25 (OICA/ACEA) Tyre Performance Study
  - ECE/TRANS/WP.29/1159 updating GRBP-73-24 (Chair) Work by GRs – Priorities (based on informal GRBP 72-12)
- 3. During the 73<sup>rd</sup> session, GRBP took note of these studies and documents on future sound emissions and decided to establish a taskforce (VS) on this issue, initially called Task Force on Sound Limits (TF-SL) and then confirmed as Task Force Vehicle Sound in July (TF-VS).
- 4. This document establishes the Guidelines of the new TF-VS on future sound emissions for UN Regulations Nos. 51 and 9, 28, 41, 59, 63, 92, 117, 138, future UN Regulation on Reverse warning sound under the 1958 Agreement.
- 5. The aim of the group is:
  - to have a vehicles' sound forum for discussions
  - to make a review of the different studies/works with identification of pro/cons through a holistic approach,
  - to review the new information for example studies about new technologies and tyre noise related to UN-R51-03 including phase 3,
  - to provide a technical report to contribute to any work on future sound emissions

### B. Objective of the Taskforce on Vehicles' Sound

- 6. The scope includes M, N and L categories of vehicles and any fields with impact on Real Sound emissions as tyres, ASEP, roads, interaction between  $L_{EQ}$  and  $L_{MAX}$ , electrification, vehicles' fleet impact ( $L_{DEN} L_{NIGHT}$ ), soundscape, road mapping, measurement uncertainties ...
- 7. The TF-VS shall:
- for M and N categories vehicles
  - Identify all available and upcoming studies,
  - Identify the data available,
  - Review and analyse these studies/data including Phase 3,
  - Work on background information to enable third parties to deal with impact assessment including single vehicle's individual sound emission and based on the most recent regulatory framework
  - Identify the interactions between vehicles sound emissions approvals and environmental noise,
  - Determine the importance of all this information,
  - Define action plans if needed,
  - Propose any useful improvements or any additional actions to any official bodies.
- Organize the same work for L category vehicles.
- 8. TF-VS shall report to GRBP.

# C. Rules of Procedure

- 9. TF-VS shall be open to all participants of GRBP. However, it is recommended that a maximum of two technical experts per country and organization participate in this TF-VS.
- 10. Meetings are organized in that such a way that experts can participate in the meeting in person or virtually.
- 11. TF-VS shall be chaired by France. OICA shall act as Secretary.
- 12. The working language shall be English.
- All documents and/or proposals shall be submitted to the Secretary of the TF-VS in a suitable electronic format at least one week before a scheduled meeting.
- 14. An agenda and the latest draft documents shall be circulated to all members of the TF-VS in advance of all scheduled TF-VS meetings.
- 15. All TF-VS documentation shall be made available on the dedicated UNECE website at this link.

# D. Timeline

- 16. The TF-VS will present progress reports for consideration at the GRBP sessions, including already achieved further results, and comprehensive opinions by:
  - for M & N categories of vehicles: 2022.
  - for L category of vehicles: to be defined later.

The aim of the TF-VS is to present a technical report to GRBP including proposed possible/realistic solutions to improve the soundscape through a complete overview.