

OICA positions on EMC related topics
Contribution of OICA EMC experts to TF EMC

1. TROLLEY BUSES

Document:

- [GRE/2014/41](#) (Belgium) Proposal for amendments to Regulation No. 10
- [GRE-73-20](#) (Russian Federation) Comments on GRE/2014/41
- [GRE-74-12](#) (Russian Federation) Proposals for amendments to Regulation No. 10

OICA position:

- Recommendation from OICA EMC experts is that the trolley bus industry should consider the following:
 - Either refer to both Regulation No. 10 and IEC 62236-3-1 through an amendment of Regulation No. 107. The reference to Regulation No. 10 is for trolleybuses in bus mode and the reference to IEC 62236-3-1 is for trolleybuses in trolley mode
 - or to amend Regulation No. 10 to include applicability for trolleybuses (but this will mean stringent requirements for bus mode)

2. DEVICES FOR INDIRECT VISION

Document:

- [GRE/2015/35](#) (GRSG) Proposal for Supplements to the 04 and 05 series of amendments to Regulation No. 10

Conclusion:

- OICA EMC experts support the proposal GRE/2015/35

3. PROPOSAL FROM CHINA

Document:

- [GRE/2015/36](#) (China) Proposal for a Supplement to the 05 series of amendments to Regulation No. 10

OICA position:

- **Modification to paragraph 1.3 (a):**
 - OICA EMC experts do not support the proposal from China to modify this paragraph. *Justification: this topic is already covered by present wording of 1.3 (c) in Regulation No. 10*
- **Paragraph 7.4.2.1 and 7.4.2.2:**
 - OICA EMC experts do not support the proposal from China and have a counter-proposal: “
 - the value of P_{st} shall not be greater than 1.0;
 - the value of P_{lt} shall not be greater than 0.65;
 - the value of $d(t)$ during a voltage change shall not exceed 3.3 per cent for more than 500 ms;
 - the relative steady-state voltage change, d_c , shall not exceed 3.3 per cent;
 - the maximum relative voltage change d_{max} , shall not exceed **6 per cent.**”*Justification: Vehicles in charging mode can be considered as “switched manually”, therefore the 6 per cent value for d_{max} is the applicable one.*

- **Annex 4, Appendix 1, Figure 1:**
 - OICA EMC experts do not support the proposal from China to delete Annex 4, appendix 1, figure 1. *Justification: it is an additional possibility for L-category vehicles with different requirements for test site than those defined in CISPR 12. Therefore the figure shall be kept in Regulation No. 10*
- **Annex 6 paragraph 4.1:**
 - OICA EMC experts do not support the proposal from China to add a table of frequency steps. *Justification: The table for frequency steps is already defined in ISO 11451-1 3rd edition 2005 and Amd1: 2008 which is referred in R10.04 and R10.05. Furthermore vehicle manufacturers may choose to perform the test with more frequency steps.*
- **Annex 6 paragraph 5.1.2:**
 - OICA EMC experts do not support the whole Chinese proposal and have a counter-proposal: “
For TLS one field probe at the vehicle reference point shall be used.
For antennas four field probes at the vehicle reference line shall be used.”
 - No support on the Chinese proposal to delete the sentence on TLS. *Justification: TLS is used by some vehicle manufacturers mainly in the [20 – 30]MHz frequency range*
 - No support of the Chinese proposal to make distinctions between vehicle categories. *Justification: ISO standard 11451-2 defines the use of 4 field probes method calibration in the [20 or 30 MHz and 2 GHz] frequency band whatever the vehicle category (L, M, N, O)*

4. ACCIDENT EMERGENCY CALL SYSTEM (AECS)

Document:

- [Discussion paper \(NL\) - AECD vs R10](#)

OICA position:

- **“Does R10.04 (and any later version) fully cover the EMC aspects for AECD components to be fitted to vehicles and for vehicles with these systems installed/integrated?”**
 - OICA EMC experts consider that when going through R10.05, paragraph 3.2.1 "Applicability of this Regulation to ESA", it is clear that AECD falls into the scope of R10.05
- **“In case not, what amendments can be proposed to Regulation No. 10?”**
 - Does not apply because answer to previous question
- **“Are specific EMC provisions necessary within the Regulation on AECS?”**
 - General requirements of Regulation No. 10 are adequate and sufficient