

Transmitted by the experts from CLEPA

Informal document GRSG-116-34
(116th GRSG, 1-5 April 2019
Agenda item 3)

Comments on ECE/TRANS/WP.29/GRSG/2019/11

UN Regulation No. 26 (External projection for passenger cars)

NUMBER OF VEHICLES IMPACTED

PROPOSALS GRSG/2019/11

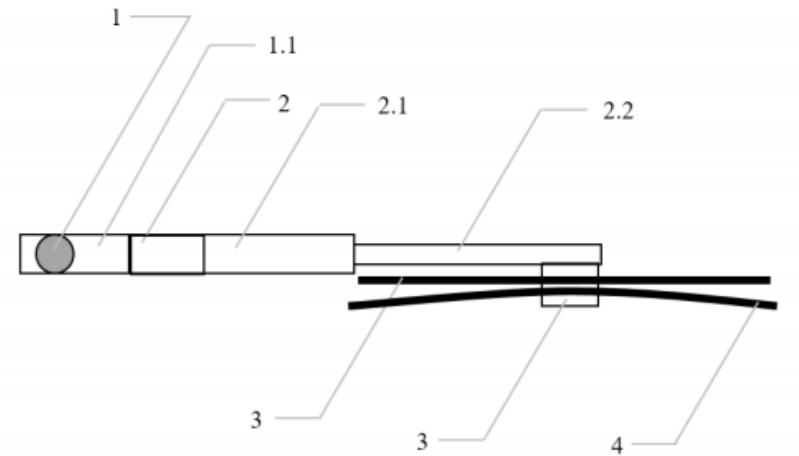
Paragraphs 6.4. to 6.4.2., amend to read:

"6.4. Windscreen wipers

6.4.1. The windscreen wiper fittings shall be such that the wiper shaft (**number 1 in Figure 0**) is furnished with a protective casing (**number 1.1 in Figure 0**) which has a radius of curvature meeting the requirements of paragraph 5.4. above and an end surface area of not less than 150 mm². **The holder (head, main and/or other parts, i.e. numbers 2, 2.1 and 2.2 in Figure 0) are designed with a radius of curvature meeting the requirements of paragraph 5.4. above.** In the case of rounded covers, these shall have a minimum projected area of 150 mm² when measured not more than 6.5 mm from the point projecting furthest. These requirements shall also be met by rear window wipers and headlamp wipers.

6.4.2. Paragraph 5.4. shall not apply to the wiper blades (**number 4 in Figure 0**), ~~or to any~~ to supporting members (**number 3 in Figure 0**) or to the functional hinge between the holder head and the holder. However, these units shall be so made as to have no sharp angles or pointed or cutting parts.

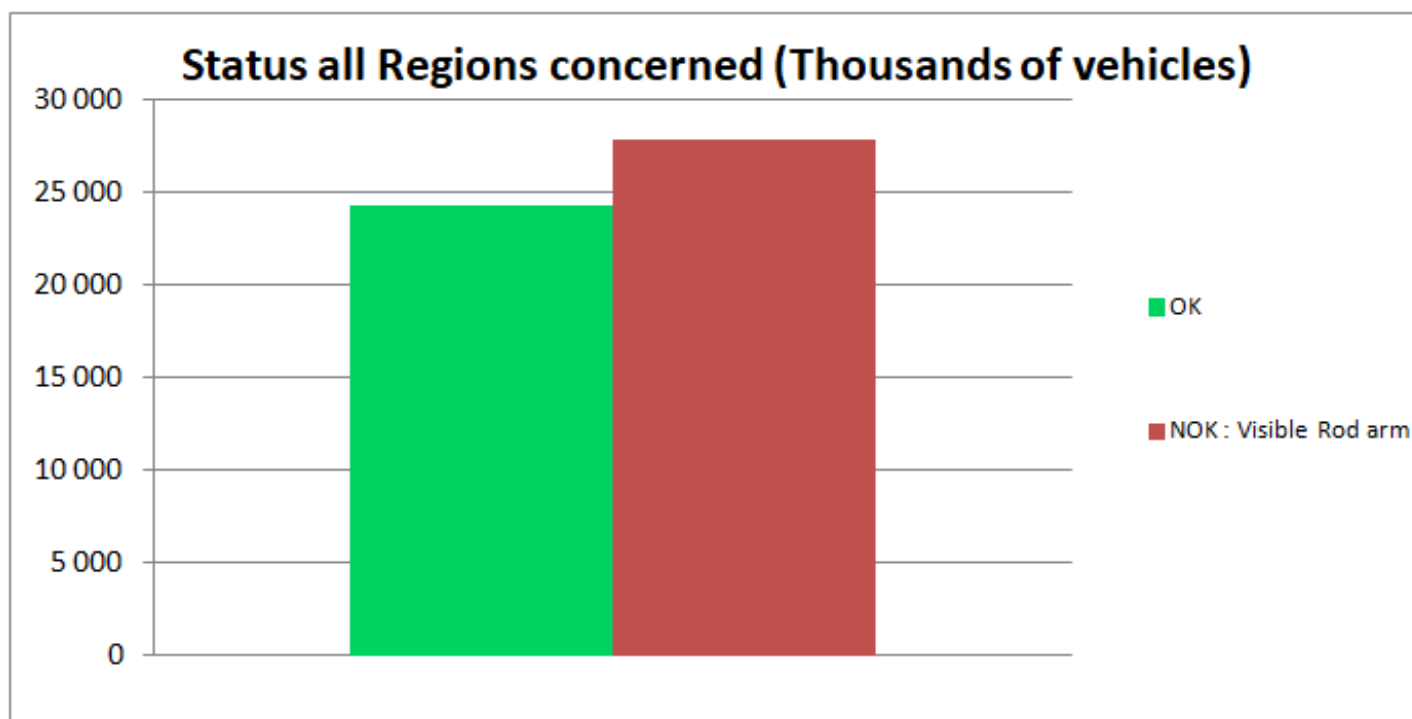
Figure 0
Example of parts distribution



- 1 – Wiper shaft
- 1.1 – Protective casing
- 2 – Holder head
- 2.1 – Main holder
- 2.2 – Second holder
- 3 – Supporting members
- 4 – Wiper blades "

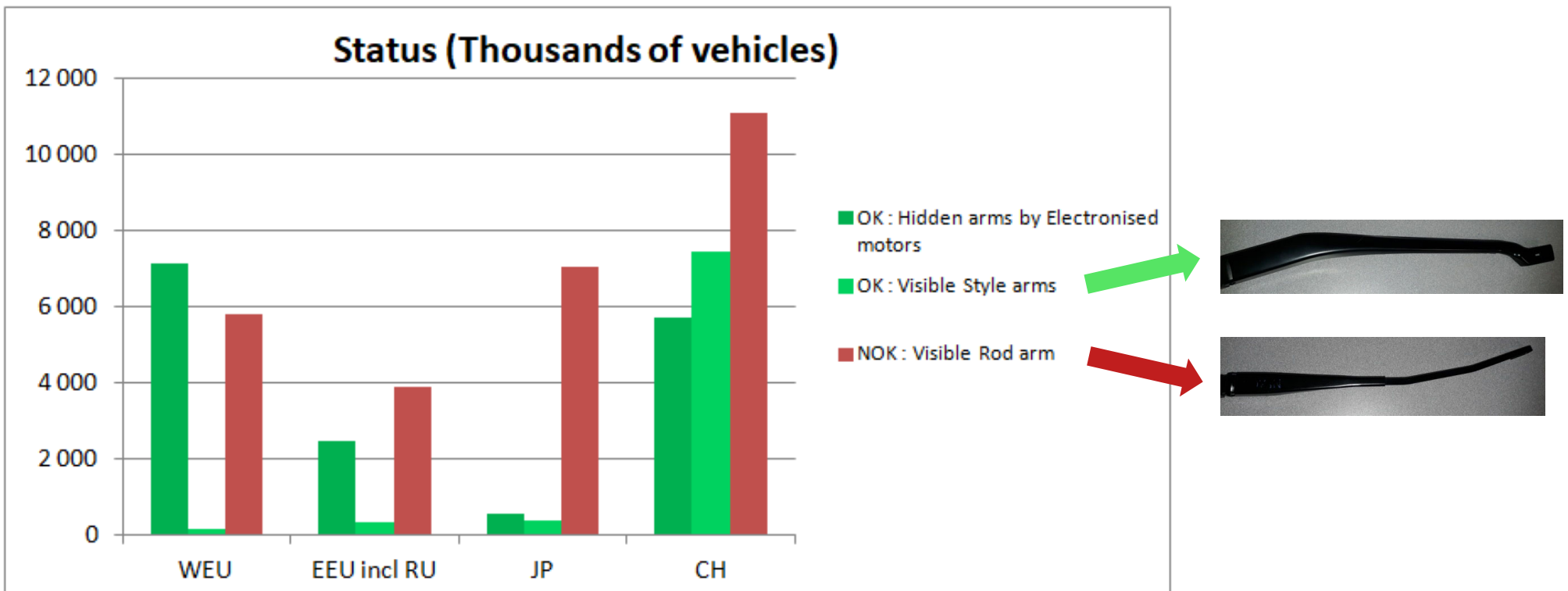
All Regions

W. Europe + E. Europe + Russia + Turkey + Japan + China

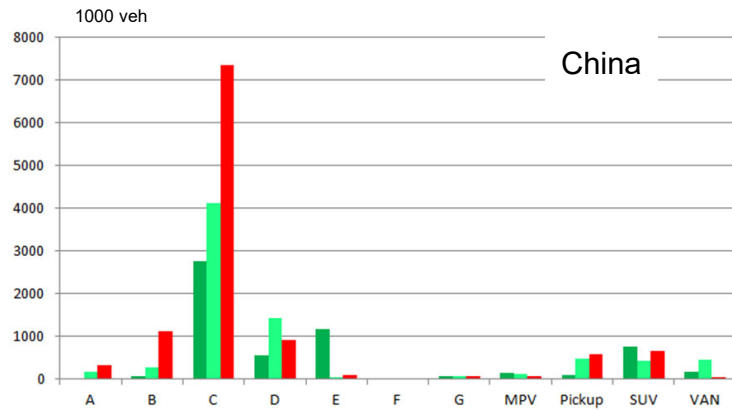
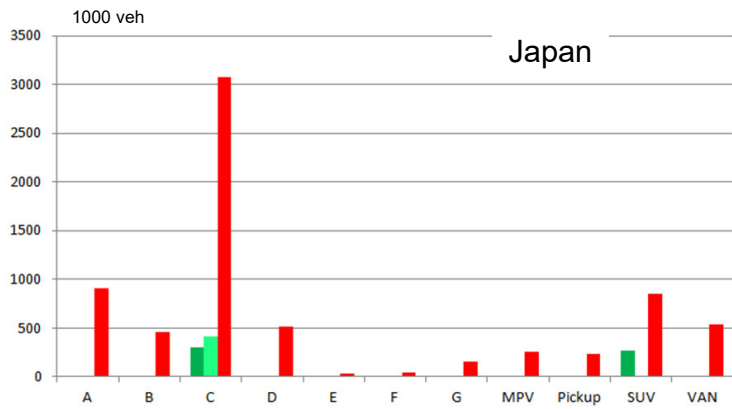
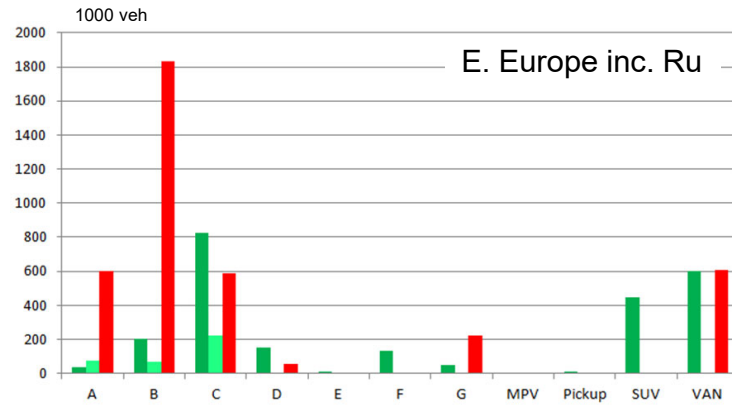
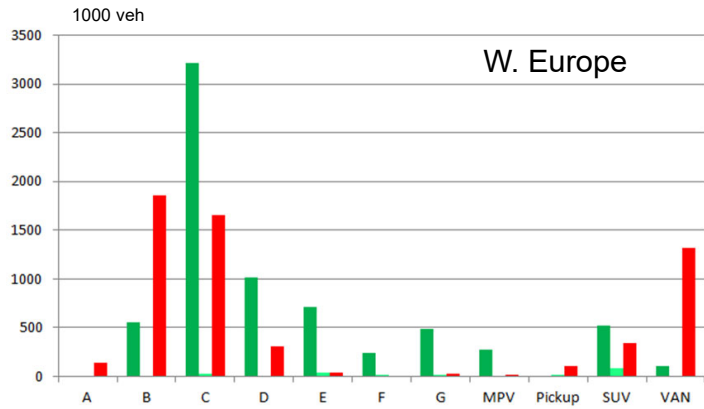


53% of vehicles are impacted by 2.5mm radius regulation change proposal

Results per Region



Results per Segments



- OK : Hidden arms by Electronised motors
- OK : Visible Style arms
- NOK : Visible Rod arm

TECHNICAL / ECONOMICAL IMPACT

Summary of solutions

Solution	Weight Impact per vehicle	Price impact at Carmaker level Base 100 = wiper arm cost per vehicule	Reason for price impact
Put a complete cover on the rod arm	+ 100g	120	Amortization of specific tooling per vehicle + overprice of part
Increase thickness of arm components	+ 300g	125	Amortization of new processes and toolings and additional material for parts
Move from rod arm to style arm	+ 200g	130	Amortization of specific tooling per vehicle + overprice of part
Move from Continuous motor to Reversible motor	- 250 g	170	Additional electronic Hardware and Software