Proposal for amendments to Regulation No. 49 (Compression ignition and positive ignition (LPG and CNG) engines)

The text reproduced below was prepared by the expert from the International Organization of Motor Vehicle Manufacturers (OICA) to align the requirements related to measurement equipment linearity verification in Regulation No. 49 to the provisions in Regulation No. 96.

The modifications to the current text of Regulation No. 49, Revision 6, are marked in bold for new or strikethrough for deletion.

I. Proposal

Annex 4, paragraph 9.2.1.1., amend to read:

"9.2.1. Linearity verification

9.2.1.1 Introduction

A linearity verification shall be performed for each measurement system listed in Table 7. At least 10 reference values, or as specified otherwise, shall be introduced to the measurement system, and, for stand-alone pressure and temperature linearity verifications, at least three reference values shall be selected. The measured values shall be compared to the reference values by using a least squares linear regression in accordance with equation 11 in paragraph 7.8.7. The maximum limits in Table 7 refer to the maximum values expected during testing."

II. Justification

Alignment with Regulation No. 96 (Uniform provisions concerning the approval of Compression Ignition (C.I.) engines to be installed in agricultural and forestry tractors and in non-road mobile machinery with regard to the emissions of pollutants by the engine), Annex 4B, paragraph 8.1.4.3.(e).