

Development of a global technical regulation on tyres
Addition of Rolling Resistance requirements.

Objective of the proposal

The objective of this proposal is to include provisions for tyre rolling resistance test requirements and limits in the global technical regulation (gtr) on tyres, in order to enable the gtr requirements to be deemed as equivalent to existing Regulations for Contracting Parties who require rolling resistance limits in their domestic legislation.

Background

As part of the European Union strategy to reduce CO₂ emissions from road vehicles, type approval legislation¹ was passed in 2009 to require tyres for road vehicles to meet specified requirements with regard to rolling resistance. It is estimated that the use of low rolling resistance tyres can reduce the average rolling vehicle fuel consumption by around 3 per cent, without any significant adverse effect on other critical tyre parameters.

The proposed requirements will come into effect in two phases, according to the timetable indicated below.

Tyre category	Max. Rolling Resistance (Kg/Tonne)	
	Stage 1	Stage 2
C1 (car tyres)	12	10.5
C2 (light commercial tyres)	10.5	9
C3 (heavy commercial tyres)	8	6.5
	Implementation Dates	
New types	2012	2016
Existing types	2014 (2016 for C3 tyres)	2018 (2020 for C3 tyres)

It is intended to implement the new requirements by mandating an amended version of Regulation No. 117, currently in the form of document ECE/TRANS/WP.29/GRB/2010/3, which is expected to be on the agenda for WP.29 in June 2010. The requirements for wet grip and rolling noise, also contained in Regulation No. 117 will also become mandatory for the purposes of EU type-approval, both for tyres as components and tyres fitted to new vehicles.

Effect of adopting the tyre gtr.

The first phase of the tyre gtr is now expected to be adopted by WP.29 in March 2012 at the earliest, so it will not enter into force until after the rolling resistance requirements become mandatory within the EU. Therefore if there are no rolling resistance provisions in the gtr (or if the rolling resistance provisions are inferior to those contained in Regulation No. 117) it will be not be possible for tyres meeting the gtr requirements to be automatically considered as equivalent to tyres meeting the existing regulations. Therefore, in order for the gtr to be acceptable for purposes of type- approval either in the EU or in the territories of other Contracting Parties who adopt the Regulation No. 117 rolling resistance requirements, it would be necessary to include provisions equivalent to those in Regulation No. 117, at least as an 'optional' element of the gtr. If the modular approach for the gtr is retained, it is envisaged that rolling resistance requirements could be included in the same optional module as rolling noise. Alternatively, if Contracting Parties agree, rolling resistance could be included as one of the core requirements of the gtr.

¹ Regulation (EC) no 661/2009 of the European Parliament and of the Council of 13 July 2009 concerning type-approval requirements for the general safety of motor vehicles, their trailers and systems, components and separate technical units intended therefor. See:

Proposal

Subject to the agreement of AC.3 and the adoption of the proposed amendments to Regulation No. 117 by WP.29, the European Commission will propose amendments to the draft gtr for the next meeting of the informal group, to include provisions for the rolling resistance on tyres based on the text agreed for Regulation No. 117.
