HEAD acoustics *** Abstract ***

ETSI Workshop "Telecommunication Quality beyond 2015" 21-22 October 2015 Vienna, Austria

Subjective IVS Testing Procedure using Different Languages

Frank Kettler

The PAN European eCall system is scheduled for April 2018, the ERA GLONASS system in Russia is mandatory since January 2015. In both systems a voice call is established between vehicle and Public Safety Answering Point (PSAP) using hands-free functionality in the vehicle. Requirements for audio performance of In-vehicle systems (IVS) are in discussion, the Russian GOST specification already defines audio requirements including subjective verification tests. The challenge in the design of these tests, planned as conversational tests, is the control

- over the complexity of conversations (single and double talk conditions,..), and
- the consideration of realistic environmental conditions (driving situations, driver exposed to noise, drivers distraction)

The design shall further ensure

- reproducibility of conversations, of acoustic driving noise, of driving situations and network,
- limit duration and costs (as is part of the certification process) and
- last but not least, guarantee safety of test persons while participating in the tests and driving.

The contribution discusses the application of the ITU-T P.832 method for eCall scenarios. It is based on eCall related conversations between PSAP and driver. Lombard speech is considered as well as individual vehicle characteristics and noise profiles. An underestimated but crucial aspect is the consideration of individual IVS delay in uplink and downlink, as this significantly influences the dynamic of conversations. Tests are currently implemented in different languages (Russian, English and German). First results are discussed.