CAR2X CHANNEL CHARACTERIZATION

Wireless Communication and Networks

 Wideband MIMO channel measurements with • High temporal resolution of 1 ns Real 2x4 MIMO with fully parallel frontends Customized scenarios in real traffic situations 1000 Time (m Data post-processing and thorough analysis



variable bandwidth up to 1 GHz

Conventional passenger vehicles

Car-to-Infrastructure

SERVICES

CAR2X CHANNEL CHARACTERIZATION

Car2X Channel Modeling and Simulation

- Accurate Car2X channel models
- Innovative channel modeling approaches
- Statistical parameterization based on
- Car2X channel measurements
- Real-time simulation with low numerical effort



Car2X Physical Layer Implementation

- Car2X Physical Layer signal processing
- Effective extended algorithms compatible with the IEEE 802.11p standard
- FPGA based real-time signal processing
- Functional communication system modeling
- Thorough simulation tests, in-depth analysis and evaluation
- Car2X field tests



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