5G- MAG Reference Tools for Multimedia Broadcast/multicast services

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Kurzfassung des Vortrags No. 61

"5G-MAG has agreed to support the promotion and fostering of 5G Media technologies by launching a program to develop 5G Media Reference Tools. Sponsored by 5G-MAG, this activity aims at establishing a developer community and at creating common open-source reference tools to support the implementation and interoperability of 5G Media technologies." Since the beginning of the project Fraunhofer FOKUS is the official development coordinator of 5G Media Reference Tools.

The focus of the 5G Media Reference Tools project is on the development of Rel-16 5G Media Streaming and 5G Broadcast client components, server/headend and corresponding 5g unicast and broadcast radio emulators. The goal of the implementation is to provide an end-to-end platform enabling the implementation of application (media players) on top of the clients; service layers and applications developed by other media-related organizations; hybrid scenarios and integration of third-party functions in the network.

In our presentation, we will give a detailed overview of the supported use cases and the different components of the 5G Media Reference Tools. This includes Multimedia Broadcast/multicast services as defined in 3GPP 23.246, 23.347 and 26.346. We highlight the relevant parts of the MBMS implementation and demonstrate how the 5G Media Reference Tools can be used to stream DASH and HLS content via 5G broadcast to different - native and MSE based - media players. Moreover, we showcase how the 5G-MAG Reference Tools can dynamically switch between broadcast and unicast content.
In addition, we provide an outlook of future topics in the context of the development of the 5G-MAG Reference Tools. This mainly covers the topic of 5G Media Streaming and porting from a Linux to an Android environment.

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