Fraunhofer IIS Presents the World’s First Full-HD Voice Calls on Android Phones over LTE at Mobile World Congress 2012

Interactive Full-HD Voice demo available on www.full-hd-voice.com

Fraunhofer IIS, the world’s renowned source for audio and multimedia technologies, presents the world’s first Full-HD Voice mobile phone calls over an LTE network at Mobile World Congress. Full-HD Voice is the future of mobile communications, taking audio quality to a new dimension. For the first time, it enables mobile phone calls to sound as clear as talking to another person in the same room, at a quality level that is equal to that experienced by consumers on any other audio/video device.

Visitors to the Fraunhofer booth can experience Full-HD Voice in a live demo using Android mobile phones in which the Full-HD Voice codec AAC-ELD has been integrated. These Android phones are connected to an LTE network provided by Fraunhofer HHI.

Unlike in mobile communications, Full-HD Voice is already established in several VoIP, video telephony and conferencing systems. “Every day, millions of users already make Full-HD Voice calls over IP connections,” said Harald Popp, head of the department Multimedia Realtime Systems at Fraunhofer IIS, “With the introduction of LTE, now is the perfect time to introduce Full-HD Voice to mobile communications as well. Our AAC-ELD audio codec is the perfect solution for all upcoming mobile Full-HD Voice services.”
Currenty, the majority of phone calls are limited to 3.5 kHz. Emerging HD Voice services offered by some operators extend the upper limit to 7 kHz, whereas humans are able to perceive audio signals up to 20 kHz. The Full-HD Voice codec AAC-ELD gives access to the full audible audio spectrum available, offering more than four times the audio bandwidth of regular phone calls and at least twice the bandwidth of HD Voice services. In contrast to regular speech codecs, AAC-ELD also transmits also music and other audio signals at a quality level comparable with HDTV and BluRay – without increasing the bit-rates in comparison to today’s phone services.

For an interactive quality comparison and more information, visit http://www.full-hd-voice.com

About Fraunhofer
The Fraunhofer IIS Audio and Multimedia division, based in Erlangen, Germany, has been working in compressed audio technology for more than 20 years and remains a leading innovator of technologies for cutting-edge multimedia systems. Fraunhofer IIS is universally credited with the development of mp3 and co-development of AAC (Advanced Audio Coding) as well as technologies for the media world of tomorrow, including MPEG Surround and the Fraunhofer Audio Communication Engine.

Through the course of more than two decades, Fraunhofer IIS has licensed its audio codec software and application-specific customizations to at least 1,000 companies. Fraunhofer estimates that it has enabled more than 1 billion commercial products worldwide using its mp3, AAC and other media technologies.

The Fraunhofer IIS organization is part of Fraunhofer-Gesellschaft, based in Munich, Germany. Fraunhofer-Gesellschaft is Europe's largest applied research organization and is partly funded by the German government. With 19,000 employees worldwide, Fraunhofer-Gesellschaft is composed of 60 Institutes conducting research in a broad range of research areas. For more information, contact Matthias Rose, matthias.rose@iis.fraunhofer.de, or visit www.iis.fraunhofer.de/amm.