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THE CHINESE UNIVERSITY OF HONG KONG
Department of Information Engineering

Seminar

OFDMA for Mobile Broadband Wireless Communications - A System View

by

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Time : 11:00am-12:00noon
Venue : Room 833, Ho Sin Hang Engineering Building
The Chinese University of Hong Kong

Abstract
The cellular wireless industry is having an important evolution from CDMA-based 3G to OFDMA-based 4G to meet the requirements of mobile broadband communications. In this talk, we will present the key advantages of having an OFDMA based system for a broadband data-centric cellular system as compared to other technologies, mainly GSM and CDMA. We will also present a few key system level ideas to take advantage of the OFDMA technologies. Specifically, we will talk about the self noise issue, the inter-sector and inter-cell interference management problems and the corresponding system approaches we can take to combat these problems.

Biography
Xinzhou Wu received the B.E. degree from Tsinghua University, China in 1998, the M.S. and Ph.D. degrees from University of Illinois at Urbana-Champaign in 2000 and 2004, all in electrical engineering.

From 2005 to 2006, he was a member of technical staff at Flarion Technologies, a startup company which implemented and deployed the first OFDMA based WAN technology - FlashOFDM. He is currently a senior staff engineer/manager at Qualcomm Flarion Technologies, Bridgewater, NJ. He is the one of main inventors and developers of the next generation wireless peer-to-peer networks. He co-authored 17 technical papers and more than 100 US patent applications in the area of wireless communications and wireless networking. His current research interests are in wireless networks, resource allocation in cellular networks, and information theory.

**** ALL ARE WELCOME ****

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