



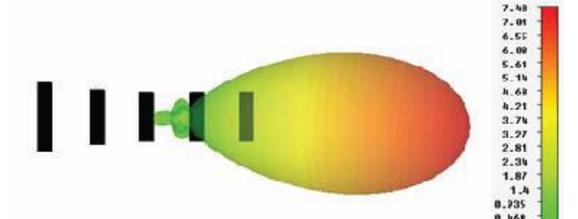
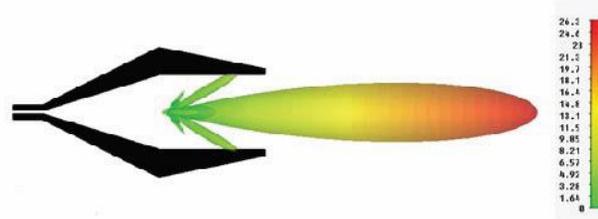
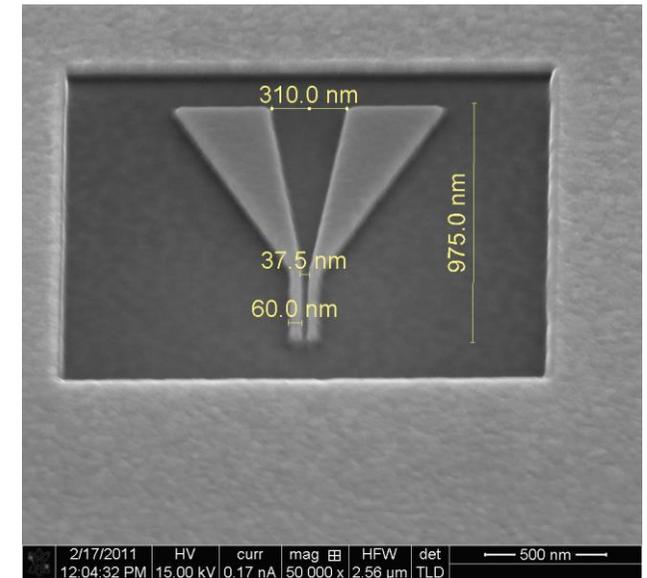
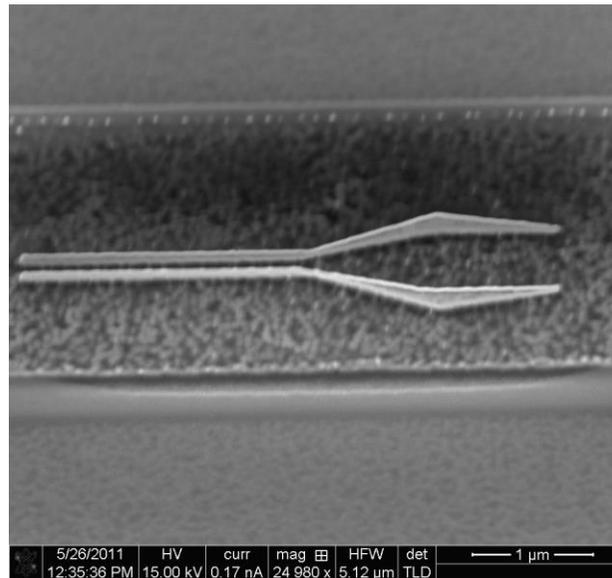
Katedra Inżynierii Mikrofalowej i Antenowej

zaprasza na seminarium pt.

“Research on Nanoantennas”

prowadzone przez
dra Macieja Klemm

Termin seminarium 15.06.2015
godzina 12:30, sala NE140



Abstract

In this talk a latest research on nanoantennas (optical antennas) carried out in the Department of Electrical and Electronic Engineering of the University of Bristol shall be presented.

Most recently, research on nanoantenna arrays at UoB has focused on applications where control of the propagation of optical beams is required. Proposed nanoantenna arrays act as ‘designer surfaces’ (sometimes also called metasurfaces) allowing control of the reflection and refraction of light beams by providing phase discontinuities at the planar interface. The operation of these surfaces is very close to the reflect-arrays that are known in the microwave antenna community. During the talk latest numerical and experimental (nano-fabrication and measurements) results will be shown.

Biography

Dr Maciej Klemm is currently a Senior Research Fellow and a Senior Lecturer in the Department of Electrical and Electronic Engineering of the University of Bristol. He has earned his PhD degree in 2006 at the Electronics Laboratory of Swiss Federal Institute of Technology (ETH) Zurich. His research at ETH focused on wearable antennas and millimetre-wave integrated antennas for 60 and 77 GHz wireless and radar systems. In Dr Klemm joined the Centre for Communications Research, University of Bristol. His main research focus has been on the development of a **Microwave UWB Radar for Breast Cancer Detection**. He was awarded first prize and **Gold Medal** at the prestigious House of Commons “**SET for Britain**” competition. In 2009 Dr Klemm was awarded a prestigious EPSRC Career Acceleration Fellowship to support a five-year project on Dynamic Microwave Imaging. Additionally, he was awarded EPSRC Cross-disciplinary Interfaces Programme grant on nanoantennas for optical cancer biopsies, in collaboration with colleagues from Physics. His current work focuses on new application of microwave imaging, and nanoantennas.