

Colloquium Cukrovarnická

**V úterý dne 13. prosince 2011 ve 15:00 hod.
ve Fyzikálním ústavu Cukrovarnická v seminární
místnosti (budova A, 1. patro)**

Electrochemical Surface Science



Klaus Wandelt

Institute of Physical Chemistry, University of Bonn, Germany;
Institute of Experimental Physics, University of Wrocław,
Poland;
Department of Physics, University of Rome II Tor Vergata,
Italy.

A direction in Surface Science is to extend the investigations to surfaces in realistic environment, e.g. in gas atmospheres or in liquids. In this presentation the status of “Electrochemical Surface Science” will be illustrated. Based on a combination of in-situ (cyclic voltametry, electrochemical scanning tunneling microscopy, infrared spectroscopy, X-ray diffraction) as well as ex-situ methods (low energy electron diffraction, synchrotron X-ray photoelectron and Auger electron spectroscopy, ion scattering) various processes at single crystal copper electrodes in contact with electrolyte solutions have been investigated and will be discussed. Specific examples are anion adsorption, thin film deposition and growth, and self-assembly of organic layers.