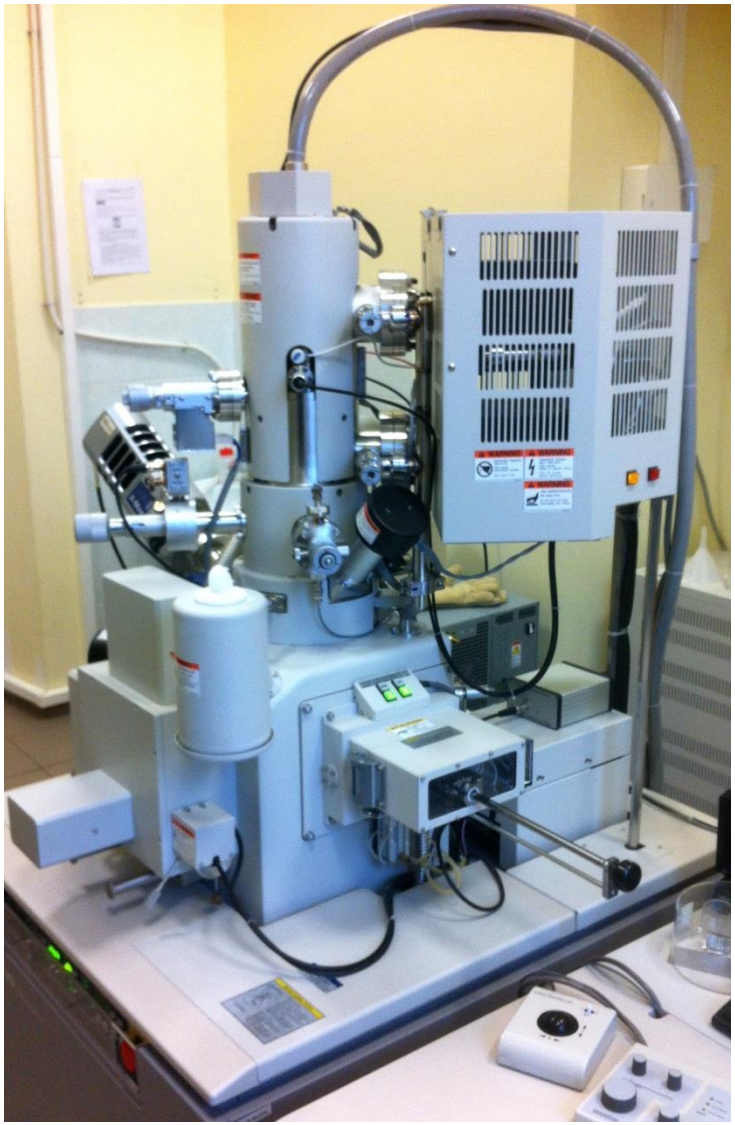
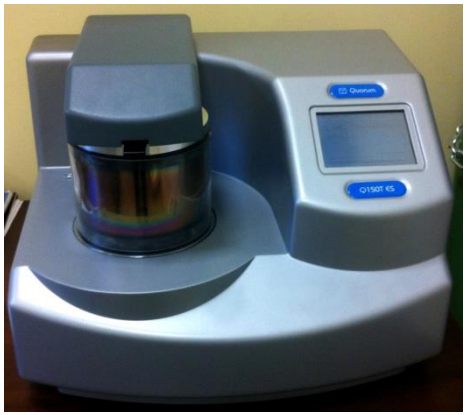
Scanning Electron Microscopy (SEM)



FE-SEM SU-70 (Hitachi)
SEM+EDS+EBSD

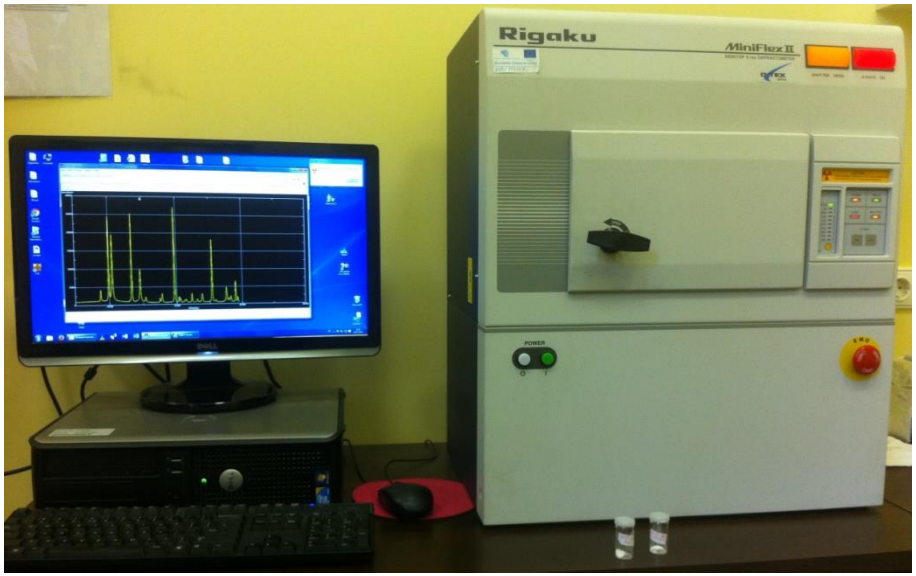
Tabletop SEM
TM3000 (Hitachi)
SEM+EDS



Turbo-sputter Quorum Q150T ES

X-Ray Difraction(XRD)

D8 Advance(Bruker)
XRD, XRR, Texture, High-T XRD



Tabletop XRD MiniFlex II (Rigaku)

Optical Microscopy and Elipsometry

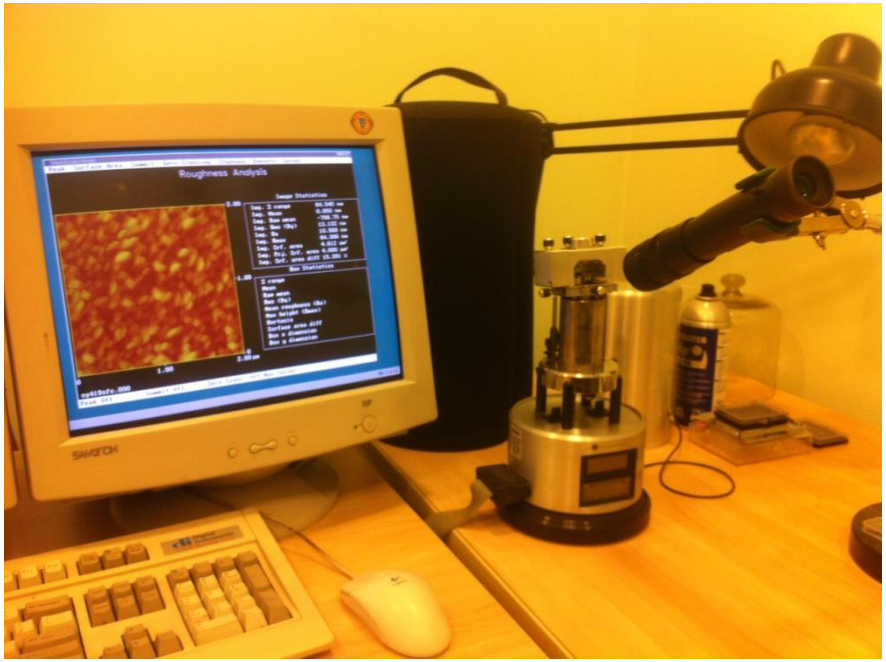
Optical microscope (Leitz)

Optical microscope BX51 (Olympus)

Woollam ellipsometer M-2000

System ALPHA300 (WiTec) Raman, AFM, and SNOM imaging in a single instrument

Atomic Force Microscopy and Profilometry

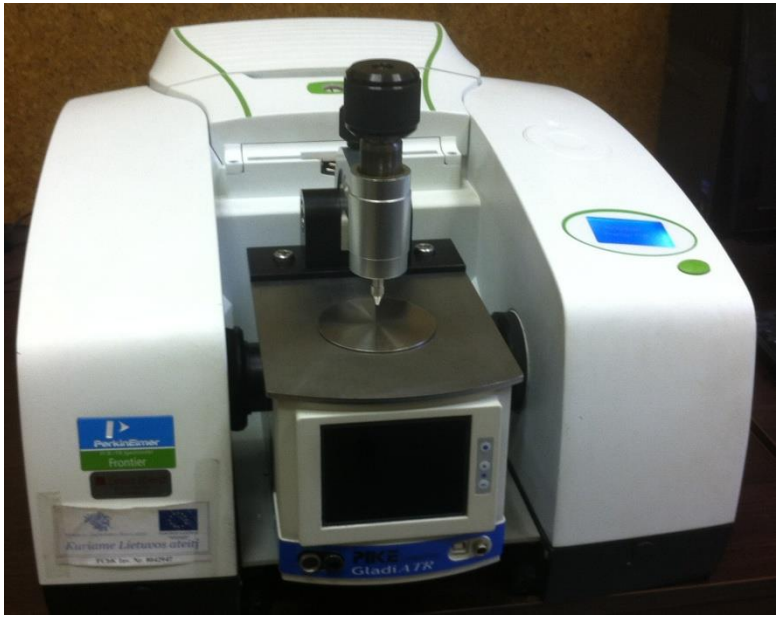


Veeco Multimode SPM
AFM (contact and taping modes)
STM

System ALPHA300 (WiTec)
Raman, AFM, and SNOM imaging in a single instrument

Profilometer
Talystep
(Taylor-Hobson)

Spectroscopy



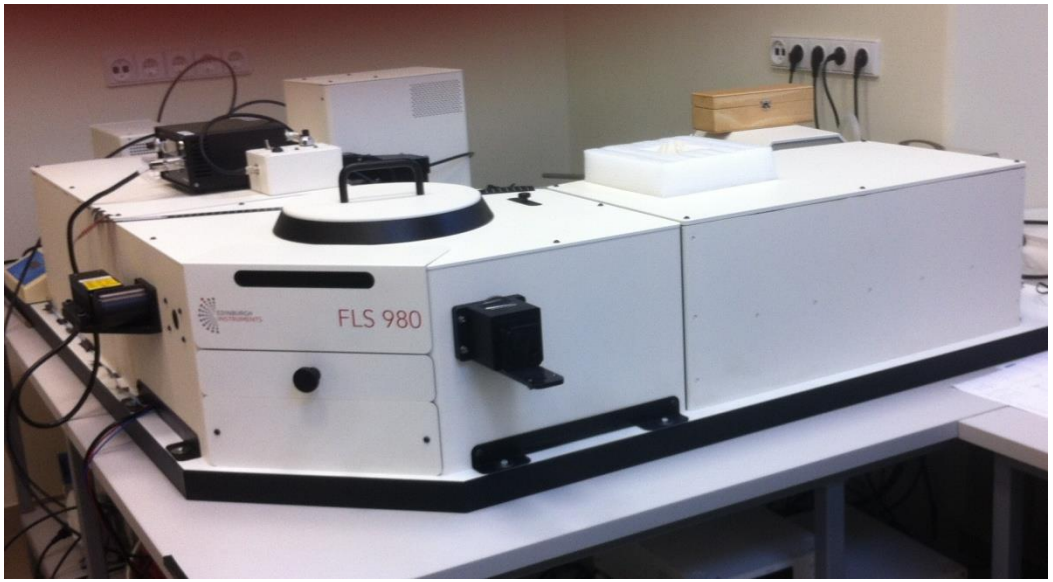
FT-IR spectrometer Frontier (PerkinElmer)

UV-Vis Lambda 35 (PerkinElmer)

UV-Vis-mid-IR spectrometer Cary 5000 (Agilent)

Fluorescence spectrometry

Fluorescence spectrometer LS 55
(PerkinElmer)

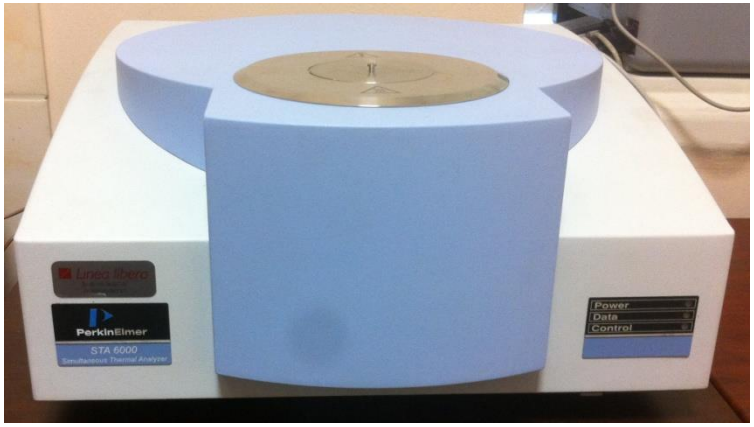


Fluorescence spectrometer FLS 980
(Edinburgh Instruments)

Thermal analysis

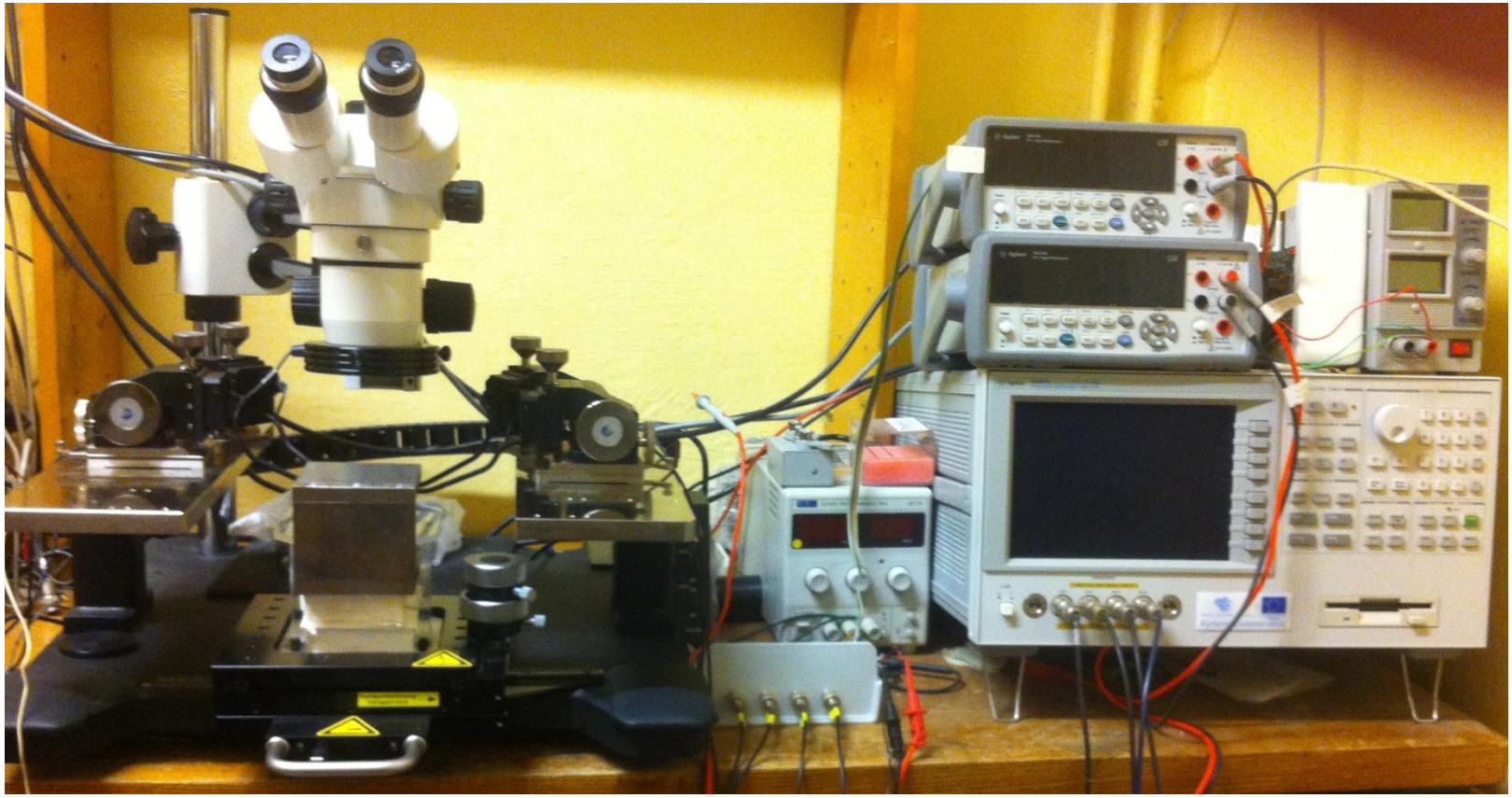
Pyris 1 TGA + Clarus 600T GS/MS
(PerkinElmer)

Differential Scanning Calorimeter DSC 8500
(PerkinElmer)

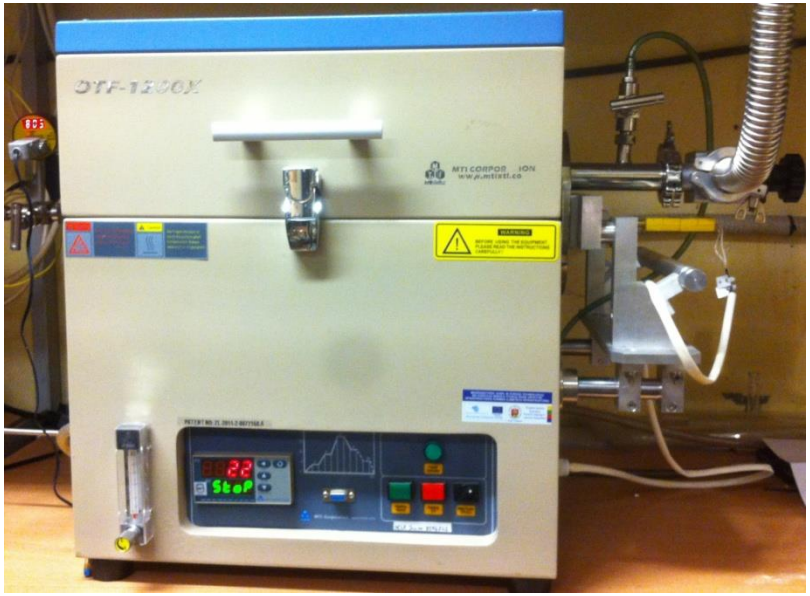


Simultaneous Thermal Analyzer STA 6000
TGA-DTA-DSC (PerkinElmer)

Electrical measurements
(including Hall effect measurements)



Rapid thermal annealing (RTA)
Inert atmosphere glove box



Compact RTP Furnace OTF-1200X
(MTI Corporation)

Glove box Jacomex GP(CONCEPT)-T2