

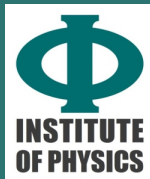
Chair of Resource  
Mineralogy



Chair of Geology and  
Economic Geology



Institute of Physics



HORIBA Scientific



## Contact

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## Registration

Please confirm your attendance by  
sending an email to  
[daniela.tatschl@unileoben.ac.at](mailto:daniela.tatschl@unileoben.ac.at)  
before 1 April 2019.



## Invitation

Opening of  
Raman-TERS-AFM  
Laboratory

9 April 2019, 2.00 pm  
Peter-Tunner Hörsaal

Peter-Tunner-Straße 5  
8700 Leoben

## The Event

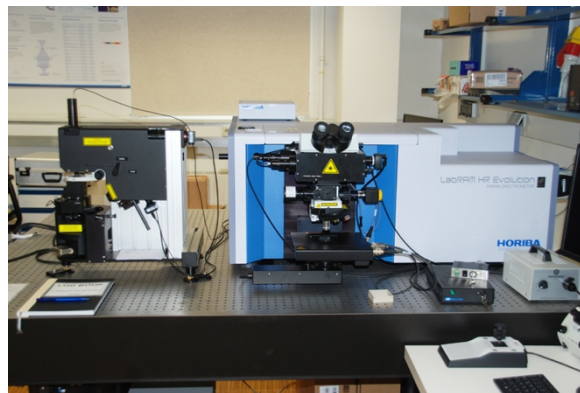
Supported by the Infrastructure Initiative of the Rectorate a new Raman-TERS-AFM laboratory could be established at Montanuniversität in 2018. The Horiba LabRAM HR Evolution installed in this new lab allows to perform various kinds of high-resolution analyses. The partner organisations jointly running this new lab are pleased to invite you to the official laboratory opening.

## Raman Spectroscopy

Raman spectroscopy has developed into a major analytical technique in many fields, from fundamental research through to applied solution. The Raman effect allows fast, non-destructive chemical/physical analysis of solids, powders, liquids and gases. Identification of materials on the micro- to nanoscale has become of increasing interest to many research groups. The research program for Raman spectroscopy includes a variety of disciplines within geosciences and material sciences for the analyses of minerals, polymers, semiconductors, corrosion, carbon, nanomaterials etc.

## Scanning Probe Microscopy

Raman technology is integrated with a AIST-NT's scanning probe microscope (SPM). The NanoRaman™ platform integrates Atomic Force Microscopy (AFM) that can provide besides topography physical sample information on the nanometer scale, including hardness, adhesion, friction, surface potential, electrical and thermal conductivity, magnetism and piezo response (among others), all together with the spectroscopic information obtained from Raman. The end result is a more comprehensive sample characterization in one versatile instrument, for fast simultaneous co-localized measurements and Tip-Enhanced Raman Spectroscopy (TERS).



## Program

- 14.00 Welcome
- 14.15 R.J. Bakker, Leoben  
*Raman in Mineralogy*
- 14.45 G. Rantitsch, Leoben  
*Raman in Geology*
- 15.15 A. Matković, Leoben  
*SPM in Nanostructure Research*
- 15.45 J. Kalbacova, HORIBA  
*Know more about your 2D Material with Tip-enhanced Raman spectroscopy combined with other SPM Methods*
- 16.15 Visit to Laboratory
- 16.45 Buffet and Networking