

Conference program of
NINMACH2013

Garching, Germany,
Sept. 9-12, 2013

PRELIMINARY!

***** means keynote speaker

SUNDAY

Walking Discussion (optional): Day excursion to Mount Herzogstand

MONDAY

10:00-12:00: Registration of participants in the Foyer of the Physics Department

12:00-13:00 Lunch

13:00-13:30 Welcome

10 min Burkhard Schillinger: Welcome

10 min Prof. Petry: Greetings from IAEA

5 min Vladimira Vodopivec: Organisational details

(5 min spare)

- 13:30-15:00 Neutron Imaging: Radiography and Tomography I

*****30 min Why use neutrons? An Overview of Neutron Imaging and Neutron Sources, Dr. SCHILLINGER, Burkhard

20 min Contribution to the knowledge about cultural heritage objects by means of neutron and X-ray investigations, Dr. MANNES, David

*****30 min Neutron imaging of museum objects - the user's perspective, Dr. ANHEUSER, Kilian (10 min spare)

15:00-15:20 Coffee

- 15:20-17:25 Neutron Imaging: Radiography and Tomography II

*****40 min Advanced hard X-ray imaging techniques applied to archaeology and palaeontology: a tool complementary to neutron imaging, Dr. MANCINI, Lucia

20 min Computed tomography meets highlights of the state archeological inventory - virtual excavation and reconstruction, EBINGER-RIST, Nicole

20 min Non-invasive characterization of ancient Japanese helmets through Neutron Imaging, Mrs. SALVEMINI, Filomena

20 min Neutron imaging, a non-destructive method for the study of mobile cultural heritage. A close collaboration with the Neutra team at the PSI, Dr. WOERLE, Marie

20 min Investigating Production Technology with Neutron Tomography, HERRINGER, Susan

18:00-21:00: Poster session in the Faculty Club (IAS)
(in short walking distance)

TUESDAY

- 09:00-10:10 Autoradiography

30 min ***** Neutron Activation Autoradiographs - the Technique, Dr. DENKER, Andrea

40 min ***** The examination of paintings by Rembrandt with Neutron Autoradiography, LAURENZE-LANDSBERG, Claudia

- 10:10-10:50 Facilities I

20 min The new neutron imaging station DINGO at OPAL, Dr. GARBE, Ulf

20 min The new Neutron Imaging Beam Line ANTARES at FRM II, Dr. SCHULZ, Michael (10 min spare)

10:50-11:10 Coffee

- 11:10-12:10 Activation Analysis

20 min Archaeological Ceramics studied by NAA at the FRM-1, Dr. WAGNER, Ursula

20 min Investigation of archaeological ceramics from the Brazilian colonial period by k0 neutron activation analysis, Dr. SOARES LEAL, Alexandre

20 min From the cathedral of Augsburg to the old Chinese vase - A short report of the neutron activation analysis @FRM II, Dr. LI, Xiaosong

12:10-13:10 Lunch

- 13:10-15:00 Neutron Imaging: Radiography and Tomography III

***** 30 min Into the past: application of neutron imaging to palaeontology, POTZE, Stephany

***** 20 min Imaging with cold and with fast fission neutrons on breccia containing animal and hominid fossils, Dr. SCHILLINGER, Burkhard

20 min Neutron Imaging Integrated into the Development and Activities of the South African Palaeo-Scientific Community, DE BEER, Frikkie

20 min Problems and limitations of X-ray microtomography for the endostructural characterization of fossil tooth tissues, Dr. ZANOLLI, Clément

20 min Neutron radiography studies of the Przeworsk culture objects from Czersk, Dr. MILCZAREK, Jacek

15:00-15:20 Coffee

- 15:20-17:00 Prompt Gamma Activation Analysis I

30 min ***** High Flux Prompt Gamma Activation Analysis: a non-destructive technique for determination of elemental composition of cultural heritage objects, Dr. KUDEJOVA, Petra

20 min Non Destructive elemental and mineralogical evaluation of Greco-Roman Bronzes., Dr. SIOURIS, Ioannis

20 min NIPS-NORMA: a new neutron-based element-mapping and imaging facility at the Budapest Research Reactor, Dr. KIS, Zoltán

20 min In-situ elemental analysis and provenance study of Teregganu historic stone using neutron induced prompt gamma-ray techniques, Dr. ABDULLAH, Jaafar

(10 min spare)

17:00-18:00: Overview talk about FRM II (only for visitors of FRM II, the others will ride to downtown)

From 18:00: Guided tours to FRM II, the workshops of the Bayrisches Nationalmuseum and the Neue Pinakothek

WEDNESDAY

- 09:00-10:50 Scattering Methods I

***** 40 min Neutron Scattering Analyses of Cultural Heritage objects, Dr. KOCKELMANN, Winfried

20 min Non-invasive characterization of ancient Japanese helmets through ToF-Neutron Diffraction, FEDRIGO, Anna

***** 30 min Combining neutron methods - a unique science tool kit in artefact analysis, Dr. ROSTA, Lászlò

20 min The manufacturing of Japanese swords: a non destructive quantitative analysis of steel composition and microstructure through neutron diffraction and neutron imaging techniques, Dr. GRAZZI, Francesco

10:50-11:10 Coffee

- 11:10-12:40 Neutron Imaging: Radiography and Tomography IV

20 min Energy-Selective neutron imaging in cultural heritage, Dr. KARDJILOV, Nikolay

20 min Application of a pulsed neutron transmission method to a cultural heritage study, Prof. KIYANAGI, Yoshiaki

30 min ** Neutron Computed Tomography as a Basis for Concepts in Preserving Wooden Works of Art, Dr. OSTERLOH, Kurt

20 min From Neutron Imaging to Neutron Activation Analysis: Neutrons in Cultural Heritage Applications, Dr. LERCHE, Michael

12:40-13:40 Lunch

- 13:40-14:40 Prompt Gamma Activation Analysis II

20 min Fifteen years of archaeometry research at the Prompt-gamma activation analysis facility of the Budapest Neutron Centre, Dr. KASZTOVSZKY, Zsolt

20 min Feasibility Study for Detecting the Lost Leonardo Mural by Prompt Gamma Neutron Activation, Prof. LIVINGSTON, Richard

20 min Lapis lazuli: The stone of the Antiquity and their origin, Dr. ZÖLDFÖLDI, Judit

20 min Gap

- 14:40-15:20 Scattering Methods II

20 min The evolution of mineralogical phases during firing of ancient Greek ceramic pots, Dr. SIOURIS, Ioannis

20 min Detection of Cu-Sn intermetallic compounds on tinned archaeological bronzes using diffraction methods: an evaluation of XRD and TOF-ND methods, Dr. MANTI, Panagiota

15:20-15:40 Coffee

- 15:40-17:00 Neutron Imaging: Radiography and Tomography V

20 min Neutron imaging studies within the neu_ART Cultural Heritage project, MILA, Giorgia

20 min Neutron Imaging of Archaeological Waterlogged Wood, DEMOULIN, Thibault

20 min Investigation of the cultural heritage by neutron tomography at INR, RO, Dr. DINCA, Marin

20 min Lost Letters found. A Neutron tomography study of Medieval, Dr. VISSER, Dirk

19:30: Conference Dinner in Bräustüberl, Freising

THURSDAY

- 09:00-10:00 Facilities II

20 min Compact Neutron Imaging System for the Investigation of Large and Dense Objects, Dr. KETTLER, John

20 min The upgraded imaging facility CONRAD-2, Dr. KARDJILOV, Nikolay

20 min Simulation studies for the development and construction of a demonstration facility for radiography with fast neutrons, NEIKE, Daniel

10:00-10:30 Coffee

10:30- 11:50 Last session: Late registrants, last but not least!

20 min Penetrating Corrosion on Ancient Coins using Neutron-CT at ANTARES, Dr. BEVAN, George

20 min An imaging technique to enhance cadmium in oil paints as a demonstration of element selective neutron imaging, Dr. KAI, Tetsuya

20 min Della Robbia Sculptures in Portugal: neutron techniques applied to provenance issues, Prof. DIAS, M. Isabel, Prof. PRUDÊNCIO, Maria Isabel

20 min Modifying PGAA for the measurement of bronze samples, SOELLRADL, Stefan

12:00 – 13:00 40-60 min Wrap-up, Decision about next conference.
Goodbye

13:00 Lunch

POSTERS

The use of Monte Carlo Code for radiation transport and dosimetry calculation for neutron radiography exposure room facility at reactor TRIGA MARK II PUSPATI (RTP), Mr. JAMRO, Rafhayudi

Neutron computed tomography for determining the spatial distribution of carbolineum in wooden artefacts of cultural heritage, Dr. NUSSER, Amélie

Current status of neutron radiography in Thailand, Dr. KHAWEERAT, Sasiphan

PGAA analysis of some Neolithic obsidian samples from Romanian regions, Dr. CONSTANTINESCU, Bogdan

3D Neutron Imaging of a XVIIIth Dynasty Egyptian Sealed Pottery, Dr. ABRAHAM, Emmanuel

Combination of 3D visualisation techniques and nuclear analysis methods, Dr. SZENTMIKLÓSI, László

NIPS-NORMA: A new PGAI-NT setup at the Budapest Research Reactor, Dr. SZENTMIKLÓSI, László

Neutron investigation of an exceptional zinc lamp from the Academia Georgica Treiensis archaeological collection (Italy), Dr. ROGANTE, Massimo

Neutron diffraction measurements for the characterisation of Italian Celtic coins

Investigation of carbonate deposits of ancient Roman aqueduct systems in the Mediterranean Area via Laser-ICP-MS and INAA, STIEGHORST, Christian

Preserve Historical Paintings by Means of Neutron Imaging: A Complete Guideline, DE BEER, Frikkie

Neutron techniques applied to better define conservation strategies of 16th – 18th centuries Portuguese glazed tiles, Prof. PRUDÊNCIO, Maria Isabel, Prof. DIAS, M. Isabel

Elemental analysis of Minerals content of Some Ayurvedic Medicinal Plants from India by Non-destructive Instrumental Neutron Activation Analysis (INAA) and Atomic Absorption Spectroscopy (AAS) Techniques, Dr. BHARATI, Pardeshi

Elemental Analysis of Smithsonian Building Stones and Brick by Prompt Gamma and Delayed Gamma Neutron Activation Analysis, Prof. LIVINGSTON, Richard

Applications of Imaging Techniques in Cultural Heritage: Examples and survey on recent developments, Dr. KHARFI, Faycal