Conference program

Monday 5th June

8:30 – 9:30  Registration

9:30 – 9:45  Welcome address

9:45 – 11:30  Session 1

9:45 – 10:30  – Self-diffusion studies based on field-cycling NMR relaxometry: The perfect partnership of protons and deuterons
Rainer Kimmich

10:30 – 11:00  – Proton FFC-NMR Relaxometry of lipids in aditivated liposomes with enhanced elasticity
Esteban Anoardo

11:00 – 11:30  – Interfacial water dynamics in some colloidal and nanoporous systems as probed by NMRD
Pierre Levitz

11:30 – 12:00  – Coffee break

12:00 – 13:30  Session 2

12:00 – 12:30  – The influence of cationic cluster formation on the structural and dynamical properties of ionic liquids: chemical shifts, quadrupole coupling constants, rotational correlation times and validity of Stokes-Einstein-Debye
Ralf Ludwig

12:30 – 13:00  – Proton NMR at Larmor frequencies down to 3 Hz by means of field-cycling techniques
Ernst Rössler

13:00 – 13:30  – Fast Field-Cycling Magnetic Resonance Imaging
David Lurie

13:30 – 14:30  Lunch
Session 3

14:30 – 16:00

14:30 – 15:00
- Design and commissioning of a whole-body 0.2 T fast field-cycling MRI magnet
  Lionel Broche

15:00 – 15:30
- Progress on imaging using a 0.2 T whole-body Fast Field-Cycling system
  P. James Ross

15:30 – 16:00
- Coarse Grained $^1$H Relaxometry by Spin Diffusion
  Dominique Petit

16:00 – 16:30
- Coffee break

Session 4

16:30 – 18:00

16:30 – 17:00
- Cation-gelator interaction at the liquid-solid interface in aqueous and non-aqueous low molecular weight ionogels
  Michał Bielejewski

17:00 – 17:30
- Anomalous ion diffusion in ionic liquid-based polymer electrolytes
  Adam Rachocki

17:30 – 18:00
- Characterization of molecular dynamics and elastic properties of flexible liposomes membranes using proton FFC-NMR Relaxometry
  Carla Cecilia Fraenza

18:00 – 19:30
- “STELAR EVENT”

20:00 – 22:00
- Conference dinner
Tuesday 6th June

9:00 – 11:00  Session 5

9:00 – 9:30  Quadrupole enhanced relaxation of protons in a selected Bismuth-Aryl compound as a potential candidate for MRI contrast agents
Hermann Scharffeter

9:30 – 10:00  High Field FFC-MRI with Citrate-Coated GdF₃ Nanoparticles: Preliminary Results at 3T
Markus Bödenler

10:00 – 10:30  DNP-FFC: Improved sensitivity and selectivity in relaxometry by exploiting electron spin saturation
Siegfried Stapf

10:30 – 11:00  Joining Forces – Prospects for the Application of FFC Relaxometry in Hyperpolarized NMR
Grzegorz Kwiatkowski

11:00 – 11:30  Coffee break

11:30 – 13:30  Session 6

11:30 – 12:00  Investigating the structure and the dynamics of liquids around metallic and oxide nanoparticles using NMR relaxometry
Anne-Laure Rollet

12:00 – 12:30  Dynamics and wettability of petroleum fluids in shale oil probed by fast field cycling NMR relaxation
Jean-Pierre Korb

12:30 – 13:00  Hydration of MgO-based cement and its mixtures with Portland cement: kinetics, state of water, and binder phase structure by NMR spectroscopy and relaxometry
Lucia Calucci

13:00 – 13:30  Molecular dynamics in supercooled ionic liquids studied by FFC relaxometry
Carlos Mattea

13:30 – 14:30  Lunch
1430 – 1630  Session 7

1430 – 1500  – Effect of the synthetic malaria pigment hematin on water NMR relaxation times: implications for malaria diagnosis by NMR
Yves Gossuin

1500 – 1530  – Field Cycling to the nT Range for High Resolution NMR Spectroscopy
Hans-Martin Vieth

1530 – 1600  – A proton T1-NMRD study of snow-flakes and hexagonal ice
Per-Olof Westlund

1600 – 1630  – Brownian translational dynamics on flexible surface for nuclear spin relaxation study of fluid membrane phases
Pär Håkansson

1630 – 1700  Coffee break

1700 – 1800  Poster Session

1800 – 1930  Boat trip

2000 – 2100  Dinner
Wednesday 7th June

**Session 8**

8:30 – 10:30

8:30 – 9:00

How was tempera paint prepared by artists? Study of water dynamics in paint by NMR relaxometry

Agathe Fanost

9:00 – 9:30

$T_1$-dispersion curves of human brain disease and Protein Mass Spectrometry analysis

Hana Lahreh

9:30 – 10:00

Relaxometry of Cancer: effect of water mobility and magnetic field strength on tissue and cell proton $T_1$

Simonetta Geninatti Crich

10:00 – 10:30

Dynamics of hyaluronic acid dermal fillers assessed by fast field cycling NMR Relaxometry.

Sławomir Wilczyński

10:30 – 11:00

Coffee break

**Session 9**

11:00 – 13:00

11:00 – 11:30

Debye peak in mono-alcohols – a joint study of dielectric spectroscopy and field cycling NMR

Max Flämig

11:30 – 12:00

Changes in motions in Osteopontin upon heparin binding from high resolution relaxometry

Pavel Kaderavek

12:00 – 12:30

Enhanced Longitudinal Relaxivity in Organic and Inorganic Nanoparticles Based on Amphiphilic Gd-AAZTA-like Complexes

Fabio Carniato

12:30 – 13:00

Some simulation tools for fast field-cycling NMR and MRI instruments

Pascal Fries

13:00 – 13:15

Closing remarks

13:30 – 14:30

Lunch