



Summer School on
NEW MAGNETICS
September 15-19, 2003
Będlewo near Poznań, Poland



SCHEDULE

Sunday, 14 September

16.00-18.00 *Transportation to Będlewo and Registration*

19.00 *Reception and get-together*

Monday, 15 September

8.50- 9.00 *OPENING*

Chairman: W. Temmerman

9.00-10.30 **J. Hafner** *First-principles investigations of magnetic nanostructures*

10.30-11.00 *Coffee*

11.00-12.30 **H. Kroha** *Nonlinear transport of electrons and spins in correlated mesoscopic structures*

12.30-13.00 **M. Kosuth** *Electronic, magnetic and transport properties of ferromagnet-semiconductor heterostructure systems*

13.00-14.00 *Lunch*

Chairman: J.A. Morkowski

14.30-16.00 **L. Nordstroem** *Unconstrained non-collinear calculations of complex magnetic materials*

16.00-16.30 *Coffee*

16.30-18.00 **J.M. Greneche** *Nanocrystalline alloys: structural aspects and magnetic properties*

18.00-18.30 **A. Postnikov** *Ab-initio simulations of molecular magnets*

19.00 *Dinner*

Tuesday, 16 September

Chairman: K.-H. Mueller

9.00-10.30 **R. Wiesendanger** *Frontiers of nanomagnetism investigated by spin- polarized scanning tunneling spectroscopy*

10.30-11.00 *Coffee*

11.00-12.30 **H. Eschrig** *Relativistic density functional approach and magnetism*

12.30-13.00 **J. Hafner** *Non-collinear magnetism and phase-stability of Mn*

13.00-14.00 *Lunch*

Chairman: R. Wiesendanger

14.30-16.00 **K. Baberschke** *The magnetism of ultrathin trilayers: A playground to study fundamentals*

16.00-16.30 *Coffee*

16.30-18.00 **D. Szotek** *SIC-LSD description of half-metallic transition metal oxides*

18.00-18.30 **M. Richter** *Magnetocrystalline anisotropy of strained transition metals and rare-earth intermetallics: density functional calculations*

19.00 *Dinner*

20.00-22.00 *Posters*

Wednesday, 17 September

Chairman: J. Hafner

- 9.00-10.30** **J. Kirschner** *Recent developments in nanoscale magnetism*
10.30-11.00 *Coffee*
11.00-12.30 **H. v. Loehneysen** *Heavy fermion systems near a magnetic instability*
12.30-13.00 **M. Przybylski** *Fe-based spin aligners grown on semiconducting substrates*
13.00-14.00 *Lunch*

Chairman: H. von Loehneysen

- 14.30-16.00** **H. Ebert** *Magnetic and spectroscopy properties of free and supported transition metal clusters*
16.00-16.30 *Coffee*
16.30-18.00 **K.-H. Mueller** *Magnetism in low-dimensional cuprates*
18.00-18.30 **F. Stobiecki** *Magnetoresistance of $\text{Ni}_{80}\text{Fe}_{20}/\text{Au}/\text{Co}/\text{Au}$ multilayers*
18.30-19.30 *Oral Session* (M. Zwierzycki / J. Dubowik / B. Idzikowski)
20.00 *Banquet*

Thursday, 18 September

Chairman: H. Eschrig

- 9.00-10.30** **S. Bluegel** *Magnetism under the scanning tunneling microscope*
10.30-11.00 *Coffee*
11.00-12.30 **W. Temmerman** *Self interaction corrected electronic structure calculations for correlated systems*
12.30-14.00 **V. Eyert** *Ab-initio calculations for low-dimensional magnetic systems*
14.00-15.00 *Lunch*

Chairman: K. Baberschke

- 15.30-17.00** **F. Petroff** *Magnetic tunnel junctions: review of experimental results and perspectives*
17.00-17.30 *Coffee*
17.30-19.00 **T. Jungwirth** *Transport and magnetic properties of ferromagnetic (III,Mn)V semiconductors*
19.30 *Bonfire*

Friday, 19 September

Chairman: S. Bluegel

- 9.00-10.30** **O. Eriksson** *Electronic structure of dilute magnetic semiconductors*
10.30-11.00 *Coffee*
11.00-12.30 **A. Ślebarski** *Electronic structure and thermodynamical properties of some ternary d and f electron intermetallics*
12.30-13.15 **J.A. Morkowski** *Fast magnon relaxation*
13.15-13.45 **S. Krompiewski** *Ferromagnetically contacted metallic carbon nanotubes with spin-selective interfaces*
14.00-15.00 *Lunch*
15.00 *Excursion*
20.00 *Dinner*