

2011

1. **Angst, M.**
Strongly correlated electrons
Schriften des Forschungszentrum Jülich, Schlüsseltechnologien **27** (2011), 12-1 - 12-19
2. **Arndt, J.*; Stockert, O.*; Schmalzl, K.; Faulhaber, E.*; Jeevan, H. S.*; Geibel, C.*; Schmidt, W.; Loewenhaupt, M.*; Steglich, F.***
Spin fluctuations in normal state CeCu₂Si₂ on approaching the quantum critical point
PRL **106** (2011), 246401: 1 - 4
3. **Birkel, C. S.*; Claudio Weber, T.; Panthöfer, M.*; Birkel, A.*; Koll, D.*; Kieslich, G.*; Schmidt, J.*; Hermann, R.; Tremel, W.***
Properties of spark plasma sintered nanostructured Zn_{1+x}Sb
Phys. Status Solidi A (2011), 1 - 7
4. **Brückel, T.**
Applications of Neutron Scattering - an Overview
Schriften des Forschungszentrum Jülich, Schlüsseltechnologien **27** (2011), 14-1 - 14-40
5. Brückel, T.
Introduction: Neutron Scattering in Contemporary Research
Schriften des Forschungszentrum Jülich, Schlüsseltechnologien **27** (2011), 1-1 - 1-15
6. **Brückel, T.; Heger, G.*; Richter, D.; Roth, G.*; Zorn, R. (Eds.)**
Laboratory Course Neutron Scattering (Lectures)
Schriften des Forschungszentrum Jülich, Schlüsseltechnologien **27** (2011)
7. Brückel, T.; Heger, G.*; Richter, D.; Roth, G.*; Zorn, R. (Eds.)
Laboratory Course Neutron Scattering (Experimental Manuals)
Schriften des Forschungszentrum Jülich, Schlüsseltechnologien **28** (2011)
8. Brückel, T.; Eckold, G.*; Griewatsch, K.*; Link, P.*; Steitz, R.*; Voit, A.*; Zabel, H.* (Eds.)
Perspektiven der Neutronenforschung in Deutschland,
Perspectives of Neutron Research in Germany: im Licht der kommenden neuen Europäischen Neutronenquelle (2011)
9. **Burghaus, J.*; Sougrati, M. T.*; Möchel, A.; Houben, A.*; Hermann, R.; Dronskowski, R.***
Local ordering and magnetism in Ga_{0.9}Fe_{3.1}N
Journal of Solid State Chemistry **184** (2011), 2315 - 2321
10. **Chang, L. J.*; Schweika, W.; Kao, Y.-J.*; Chou, Y. Z.*; Perbom, J.; Brückel, T.; Yang, H. C.*; Chen, Y. Y.*; Gardner, J. S.***
Magnetic correlations in Ho_xTb_{2-x}Ti₂O₇
Physical Review B **83** (2011), 144413: 1 - 7
11. **Cui, H.**
Control and operation of an image-plate scanner for x-ray diffraction
Bachelor-Arbeit FH Aachen (2011)
12. **Dadda, J.*; Müller, E.*; Perl, S.*; Höche, T.*; Bauer Pereira, P.; Hermann, R.**
Microstructures and Nanostructures in long-term Annealed AgPb₁₈SbTe₂₀ (LAST-18) Compounds and their Influence on the Thermoelectric Properties
J. Mater. Res. **26**, 15 (2011), 1800 - 1812
13. **Diakhate, M. S.*; Hermann, R.; Möchel, A.; Sergueev, I.*; Sondergaard, M.*; Christensen, M.*; Verstraete, M. J.***
Thermodynamic, thermoelectric and magnetic properties of FeSb₂: A combined first-principles and experimental study
Physical Review B **84** (2011), 125210: 1 - 8
14. **Disch, S.; Wetterskog, E.*; Hermann, R.P.; Salazar-Alvarez, G.*; Busch, P.; Brückel, T.; Bergström, L.*; Kamali, S.***
Shape induced symmetry in self-assembled mesocrystals of iron oxide nanocubes
Nano Letters (2011) **11** (4), 1651 - 1656
15. Disch, S.
The spin structure of magnetic nanoparticles and in magnetic nanostructures
Schriften des Forschungszentrum Jülich **21** (2011)
16. **Gallus, J.**
Lattice Dynamics in the SnSb₂Te₄ Phase Change Material
Diplomarbeit RWTH Aachen (2011)
17. **Glavic, A.**
Multiferroicity in oxide thin films and heterostructures
Doktorarbeit RWTH Aachen (2011)
18. Glavic, A.; Voigt, J.; Perbom, J.; Su, Y.; Schubert, J.; de Groot, J.; Zande, W.*; Brückel, T.
19. **Hermann, R.**
Emerging Leaders Generation of the Mössbauer Mössbauer Effect Reference and Data Journal **34**(2) (2011), 42 - 44
20. Hermann, R.
Neutrons for global energy solutions, A foresight study
Neutron News **22**, 3, (2011), 4 - 5
21. Hermann, R.
Spin Dependent and Magnetic Scattering
Schriften des Forschungszentrum Jülich, Schlüsseltechnologien **27** (2011), 7-1 - 7-24
22. **Herrero-Martin, J.*; Mazzoli, C.*; Scagnoli, V.*; Paolasini, L.*; Walker, H.*; Xiao, Y.*; Brückel, T.; Mittal, R.*; Kumar, N.*; Dhar, S.K.*; Thamizhavel, A.*; Su, Y.**
EuFe₂As₂: Magnetic Structure and Local Charge Distribution Anisotropies as Seen by Resonant X-ray Scattering
Journal of Superconductivity and Novel Magnetism **24** (2011) 1-2, 705 - 709
23. **Kaye, M. D.*; Schmalzl, K.; Conti Nibali, V.*; Tarek, M.*; Rheinstädter, M. C.***
Ethanol enhances collective dynamics of lipid membranes
Physical Review E **83** (2011), 050907: 1 - 4 (R)
24. **Kentzinger, E.**
Neutron Reflectometry
Schriften des Forschungszentrum Jülich, Schlüsseltechnologien **27** (2011), 9-1 - 9-22
25. **Matsuaga, T.*; Yamada, N.*; Kojima, R.*; Shamoto, S.*; Sato, M.*; Tanida, H.*; Uruga, T.*; Kohara, S.*; Takata, M.*; Zalden, P.*; Bruns, G.*; Sergueev, I.*; Wille, H. C.*; Hermann, R.; Wuttig, M.***
Phase-Change Materials: Vibrational Softening upon Crystallization and Its Impact on Thermal Properties
Adv. Funct. Mater. (2011), XX, 1 - 8
26. **Mattauch, S.; Rücker, U.**
TREFF Reflectometer
Schriften des Forschungszentrum Jülich, Schlüsseltechnologien **28** (2011), 10-1 - 10-8
27. **Mittal, R.*; Mishra, S. K.*; Chaplot, S. L.*; Ovsyannikov, S. V.*; Greenberg, E.*; Trots, D. M.*; Dubrovinsky, L.*; Su, Y.; Brückel, T.; Matsuishi, S.*; Hosono, H.*; Garbarino, G.***
Ambient- and low-temperature synchrotron x-ray diffraction study of BaFe₂As₂ and CaFe₂As₂ at high pressures up to 56 GPa
Physical Review B **83** (2011), 054503: 1 - 11
28. Mittal, R.*; Zbiri, M.*; Rols, S.*; Su, Y.; Xiao, Y.; Chaplot, S.L.*; Schober, H.*; Johnson, M.*; Chatterji, T.*; Matsuishi, S.*; Hosono, H.*; Brückel, T.
Phonon Dynamics in Parent and Superconducting FeAs Compounds
Chinese Journal of Physics **49** (2011) 1, 403 - 413
29. **Möchel, A.**
Lattice dynamics in thermoelectric Zintl phases
Dissertation Université Liège (2011)
30. Möchel, A.; Sergueev, I.*; Nguyen, N.*; Long, G. J.*; Grandjean, F.*; Johnson, D. C.*; Hermann, R.
Lattice dynamics in the FeSb₃ skutterudites
Physical Review B **84** (2011), 064302: 1 - 9
31. **Nandi, S.; Su, Y.; Xiao, Y.; Price, S.; Wang, X. F.*; Chen, X. H.*; Herrero-Martín, J.*; Mazzoli, C.*; Walker, H. C.*; Paolasini, L.*; Francoual, S.*; Shukla, D. K.*; Strempler, J.*; Chatterji, T.; Kumer, C. M. N.; Mittal, R.; Ronnow, H. M.*; Rüegg, Ch.*; McMorrow, D. F.*; Brückel, T.**
Strong coupling of Sm and Fe magnetism in SmFeAsO as revealed by magnetic x-ray scattering
Physical Review B **84** (2011), 054419: 1 - 8
32. **Reim, J.**
Spindynamik im Schwedenborgit CaBaCo₂Fe₂O₇: Untersuchung mit Neutronenstreuung und Spindwellentheorie
Diplomarbeit RWTH Aachen (2011)
33. **Rosén, E.**
Magnetische Eigenschaften und Spinkorrelationen in Co- und Fe-basierten Swedenborgiten
Diplomarbeit RWTH Aachen (2011)
34. **Rücker, U.**
Magnetic Nanostructures
Schriften des Forschungszentrum Jülich, Schlüsseltechnologien **27** (2011), 10-1 - 10-20

35. **Samain**, L.*; Silversmit, G.*; Sanyova, J.*; Vekemans, B.*; Salomon, H.*; Gilbert, B.*; Grandjean, F.*; Long, G. L.*; Hermann, R. P.; Vincze, L.*; Strivay, D.*
Fading of modern Prussian blue pigments in linseed oil medium
J. Anal. At. Spectrom. **26** (2011), 930 - 941
36. **Schmitz**, M.
Mesoskopische magnetische Struktur und konkurrierende Anisotropien in lateral strukturierten Fe/Cr-Schichtsystemen
Diplomarbeit RWTH Aachen (2011)
37. **Sergueev**, I.*; Wille, H.-C.*; Hermann, R.; Bessas, D.; Shvyd'ko, Yu. V.*; Zajac, M.*; Rüffer, R.*
Milli-electronvolt monochromatization of hard X-rays with a sapphire backscattering monochromator
J. Synchrotron Radiation **18** (2011), 1 - 9
38. **Steffen**, A.
Herstellung und Charakterisierung von dünnen $\text{La}_{2/3}\text{Sr}_{1/3}\text{MnO}_3/\text{(Sr/Ba)TiO}_3$ -Mehrfachschichten in Hinblick auf „Exchange Bias“
Diplomarbeit RWTH Aachen (2011)
39. **Steffens**, P.*; Friedt, O.*; Sidis, Y.*; Link, P.*; Kulda, J.*; Schmalzl, K.; Nakatsuji, S.*; Braden, M.*
Magnetic excitations in the metallic single-layer ruthenates $\text{Ca}_{2-x}\text{Sr}_x\text{RuO}_4$ studied by inelastic neutron scattering
Physical Review B **83** (2011), 054429: 1 - 12
40. **Stockert**, O.*; Arndt, J.*; Faulhaber, E.*; Geibel, C.*; Jeevan, H. S.*; Kirchner, S.*; Loewenhaupt, M.*; Schmalzl, K.; Schmidt, W.; Si, Q.*; Steglich, F.*
Magnetically driven superconductivity in CeCu_2Si_2
nature physics **7** (2011), 119 - 124
- 2010**
41. **Akrap**, A.*; Angst, M.; Khalifah, P.*; Mandrus, D.*; Sales, B.C.*; Forro, L.*
Electrical transport in charge-ordered Fe_2BO_4 : Resistive switching and pressure effects
Physical Review B **82** (2010) 16, 165106
42. **Angst**, M.
Multiferroics
Schriften des FZ Jülich, Schlüsseltechnologien 13 (2010), C3
43. **Armstrong**, C. L.*; Sandqvist, E.*; Schmalzl, K.; Rheinstädter, M. C.*
Membrane mediated protein-protein interactions
Physics in Canada **66** (2010) 3, 189 - 191
44. **Bedanta**, S.; Petracic, O.*; Chen, X.*; Rhensius, J.*; Kentzinger, E.; Rücker, U.; Brückel, T.; Doran, A.*; Scholl, A.*; Cardoso, S.*; Freitas, S. S.*; Kleemann, W.*
Single-particle blocking and collective magnetic states in discontinuous CoFe/Al₂O₃ multilayers
J. Phys. D: Appl. Phys. **43** (2010), 474002: 1 - 11
45. Bedanta, S.; Kleemann, W.*; Petracic, O.*; Rhensius, J.*; Chen, X.*; Eimüller, T.*; Kentzinger, E.; Rücker, U.; Brückel, T.; Cardoso, S.*; Freitas, P. P.*
Supermagnetism in magnetic nanoparticle systems
7th International Conference on Fine Particle Magnetism (ICFPM-2010), Book of Abstracts (2010), 25
46. **Beekman**, M.*; Hermann, R.; Möchel, A.; Juranyi, F.*; Nolas, G. S.*
A study of low-energy guest phonon modes in clathrate-II $\text{Na}_x\text{Si}_{136}$ ($x = 3, 23$, and 24)
J. Phys.: Condensed Matter **22** (2010), 355401: 1 - 5
47. **Bessas**, D.; Claudio Weber, T.; Bauer Pereira, P.; Hermann, R.
Neutron scattering by nanostructured thermoelectric materials
Neutrons for Global Energy Solutions, Book of Abstracts (2010), 70
48. **Bland**, S.R.*; Angst, M.; Adiga, S.; Scagnoli, V.*; Johnson, R.D.*; Herrero-Martin, J.*; Hatton, P.D.*
Symmetry and charge order in Fe_2OBO_3 studied through polarized resonant x-ray diffraction
Physical Review B **82** (2010) 11, 115110
49. **Blügel**, S.; Brückel, T.; Waser, R.; Schneider, C. M. (Eds.)
Lecture Notes of the 41st Spring School 2010, Schriften des FZ Jülich, Schlüsseltechnologien 13 (2010)
50. **Brown**, P. J.*; Chatterji, T.; Stunault, A.*; Su, Y.; Xiao, Y.; Mittal, R.; Brückel, T.; Wolf, Th.*; Adelmann, P.*
Magnetization distribution in the tetragonal phase of BaFe_2As_2
Physical Review B **82** (2010), 024421: 1 - 5
51. **Brückel**, T.
A neutron primer: Elastic scattering and the properties of the neutron
Schriften des Forschungszentrum Jülich, Schlüsseltechnologien 15 (2010), 2-1 - 2-31
52. **Brückel**, T.
Applications of neutron scattering
Schriften des Forschungszentrum Jülich, Schlüsseltechnologien 15 (2010), 5-1 - 5-31
53. **Brückel**, T.
Correlated electrons in complex transition metal oxides
Schriften des Forschungszentrum Jülich, Schlüsseltechnologien 15 (2010), 11-1 - 11-21
54. **Brückel**, T.
Die magnetische Röntgenbeugung
in: Forschung mit Synchrotronstrahlung: Eine Einführung in die Grundlagen und Anwendungen, Jens Falta und Thomas Möller (Hrsg.), Vieweg + Teubner (2010), 233 - 240
55. **Brückel**, T.
Elementspezifische magnetische Ordnung in den Mischkristallen $\text{Gd}_x\text{Eu}_{1-x}\text{S}$: Resonante magnetische Röntgenbeugung
in: Forschung mit Synchrotronstrahlung: Eine Einführung in die Grundlagen und Anwendungen, Jens Falta und Thomas Möller (Hrsg.), Vieweg + Teubner (2010), 366 - 373
56. **Brückel**, T.; Heger, G.*; Richter, D.; Roth, G.*; Zorn, R. (Eds.)
Laboratory Course Neutron Scattering (Lectures)
Schriften des Forschungszentrum Jülich, Schlüsseltechnologien 15 (2010)
57. **Brückel**, T.; Schweika, W.; Tonnerre, J.-M. (Eds.)
Polarized neutrons and synchrotron x-rays for magnetism Conference 2009
Journal of Physics: Conference Series **211** (2010)
58. **Brückel**, T.; Schweika, W.; Tonnerre, J.-M.*
PNNSX 2009; 2nd Workshop on Polarized Neutrons and Synchrotron X-Rays for Magnetism
Journal of Physics: Conference Series **211** (2010), 011001: 1 - 3
59. **Chang**, L. J.*; Su, Y.; Schneider, H.; Mittal, R.; Lees, M. R.*; Balakrishnan, G.*; Brückel, T.
Magnetic correlations in pyrochlore spin ice as probed by polarized neutron scattering
Journal of Physics: Conference Series **211** (2010), 012013: 1 - 6
60. Chang, L. J.*; Su, Y.; Kao, Y.-J.*; Chou, Y. Z.*; Mittal, R.; Schneider, H.; Brückel, T.; Balakrishnan, G.*; Lees, M. R.*
Magnetic correlations in the spin ice $\text{Ho}_{2-x}\text{Y}_x\text{Ti}_2\text{O}_7$ as revealed by neutron polarization analysis
Physical Review B **82** (2010), 172403: 1 - 4
61. **Disch**, S.; Hermann, R.; Brückel, T.
Magnetic scattering by iron oxide nanoparticles
SNI - Deutsche Tagung für Forschung mit Synchrotronstrahlen, Neutronen und Ionenstrahlen an Großgeräten, Freie Universität Berlin, 24. - 26.02.2010, Programm & Abstractbook (2010), 299
62. **Disch**, S.; Wetterskog, E.*; Hermann, R.; Bergström, L.; Brückel, T.
Magnetization distribution in iron oxide nanoparticles
Neutrons for Global Energy Solutions, Book of Abstracts (2010), 72
63. **Disch**, S.; Wetterskog, E.*; Hermann, R.; Bergström, L.*; Brückel, T.
Polarized SANS by iron oxide nanoparticles
Abstract Book “Polarised Neutrons in Condensed Matter Investigations” (2010), 18
64. **Disch**, S.
The spin structure of magnetic nanoparticles and in magnetic nanostructures
Dissertation RWTH Aachen (2010)
65. **Fennell**, T.*; Deen, P. P.*; Wildes, A. R.*; Schmalzl, K.; Prabhakaran, D.*; Boothroyd, A. T.*; Aldus, R. J.*; McMorrow, D. F.*; Bramwell, S. T.*
Coulomb phase in the spin ice $\text{Ho}_2\text{Ti}_2\text{O}_7$
ILL Annual Report 2010, G. Cicognani, A. Harrison and K. Jenkins (ed.) (2010), 24
66. Fennell, T.*; Deen, P. P.*; Wildes, A. R.*; Schmalzl, K.; Prabhakaran, D.*; Boothroyd, A. T.*; Aldus, R. J.*; McMorrow, D. F.*; Bramwell, S. T.*
Coulomb phases in the spin ices $\text{Ho}_2\text{Ti}_2\text{O}_7$ and $\text{Dy}_2\text{Ti}_2\text{O}_7$
Abstract Book, Conference FLIPPER, Single-Crystal Diffraction with Polarised Neutrons (2010), 56 - 57
67. **Fenske**, J.*; Lott, D.*; Mankey, G. J.*; Klose, F.*; Mulders, A.*; Schmidt, W.; Schmalzl, K.; Tartakovskaya, E. V.*
Magnetische Spinanordnung in $\text{Fe}50\text{Pt}50-x\text{Rh}_x$ -Filmen
SNI - Deutsche Tagung für Forschung mit Synchrotronstrahlen, Neutronen und Ionenstrahlen an Großgeräten, Freie Universität Berlin, 24. - 26.02.2010, Programm & Abstractbook (2010), 329
68. **Feygenson**, M.*; Schweika, W.; Ioffe, A.; Vakhrushev, S. B.*; Brückel, T.
Magnetic phase transition in confined MnO nanoparticles studied by polarized neutron scattering
Physical Review B **81** (2010), 064423: 1 - 5

69. Finger, T.*; Senff, D.*; Schmalzl, K.; Schmidt, W.; Regnault, L. P.*; Becker, P.*; Bohaty, L.*; Braden, M.*
Electric-field control of the chiral magnetism of multiferroic MnWO₄ as seen via polarized neutron diffraction
Physical Review B **81** (2010), 054430: 1 - 5
70. Finger, T.*; Senff, D.*; Schmalzl, K.; Schmidt, W.; Regnault, L.-P.*; Becker, P.*; Bohaty, L.*; Braden, M.*
Polarized-neutron-scattering studies on the chiral magnetism in multiferroic MnWO₄
Journal of Physics: Conference Series **211** (2010), 012001: 1 - 8
71. Fu, Z.; Kögerler, P.; Rücker, U.; Su, Y.; Mittal, R.; Brückel, T.
An approach to the magnetic ground state of the molecular magnet {Mo72Fe30}
New Journal of Physics, **12** (2010), 083044: 1 - 15
72. Fu, Z.; Kögerler, P.; Rücker, U.; Su, Y.; Brückel, T.
Approaching the magnetic ground state of molecular magnet {Mo72Fe30}
SNI - Deutsche Tagung für Forschung mit Synchrotronstrahlen, Neutronen und Ionenstrahlen an Großgeräten, Freie Universität Berlin, 24. - 26.02.2010, Programm & Abstractbook (2010), 341
73. Glavic, A.; Voigt, J.; Brown, P. J.*; Chatterji, T.; Kumar, C. M. N.; Su, Y.; Perbon, J.; Schubert, J. (IBN-1); Brückel, T.
Neutronenpolarisationsanalyse zur Untersuchung komplexer magnetischer Strukturen am Beispiel von TbMnO₃-Einkristallen und Dünnsschichten
SNI - Deutsche Tagung für Forschung mit Synchrotronstrahlen, Neutronen und Ionenstrahlen an Großgeräten, Freie Universität Berlin, 24. - 26.02.2010, Programm & Abstractbook (2010), 328
74. Gottschlich, M.
Experimental and theoretical studies of the magnetocaloric effect (MCE) in the Mn_{5-x}FexSi₃ series
Neutrons for Global Energy Solutions, Book of Abstracts (2010), 73
75. Gossuin, Y.*; Disch, S.; Vuong, Q. L.*; Gillis, P.*; Hermann, R.; Park, J.-H.*; Sailor, M. J.*
NMR relaxation and magnetic properties of superparamagnetic nanoworms
Contrast Media & Molecular Imaging **5**, 6(2010), 318 - 322
76. de Groot, J.; Kentzinger, E.; Voigt, J.; Gukasov, A.*; Gillon, B.*; Brückel, T.
Magnetization density in multiferroic TbMnO₃
Abstract Book, Conference FLIPPER, Single-Crystal Diffraction with Polarised Neutrons (2010), 42 - 43
77. Grünwald, A. T. D.*; Wildes, A. R.*; Schmidt, W.; Tartakovskaya, E. V.*; Kwo, J.*; Majkrzak, C.*; Ward, R. C. C.*; Schreyer, A.*
Magnetic excitations in Dy/Y superlattices as seen via inelastic neutron scattering
Physical Review B **82** (2010), 014426: 1 - 6
78. Grünwald, A. T. D.*; Wildes, A. R.*; Schmidt, W.; Tartakovskaya, E. V.*; Nowak, G.*; Theis-Brohl, K.*; Schreyer, A.*
Neutron scattering measurements of magnetic excitations in Gd/Y superlattices
Applied Physics Letters **96** (2010), 192505: 1 - 3
79. Harikrishnan, S.*; Rößler, S.*; Kumar, C. M. N.; Xiao, Y.; Bhat, H. L.*; Rößler, U. K.*; Steglich, F.*; Wirth, S.*; Elizabeth, S.*
Memory effect in Dy_{0.5}Sr_{0.5}MnO₃ single crystals
J. Phys.: Condensed Matter **22** (2010), 346002: 1 - 8
80. Hermann, R.; Nielsch, K.*; Böttner, H.*
Nanostructured Thermoelectric Materials: 451. WE-Heraeus-Seminar
Physik Journal **9**, 5 (2010), 54 - 55
81. Hermann, R. (Ed.)
NGES 2010: Neutrons for Global Energy Solutions (2010), Book of Abstracts
82. Hermann, R.; Rücker, U.; Angst, M.
PNSXM 2009: Workshop on Polarized Neutrons and Synchrotron X-rays for Magnetism
Synchrotron Radiation News **23**, 2 (2010), 16 - 17
83. Hermann, R.; Rücker, U.; Angst, M.
Workshop on Polarized Neutrons and Synchrotron X-rays for Magnetism - PNSXM 2009
Neutron News **21**, 3 (2010), 3 - 4
84. Hermann, R.
Phonon spectroscopy in thermoelectric antimonides and tellurides
29th International Conference on Thermoelectrics, Abstract Book (2010), 59
85. Hermann, R.; Schweika, W.; Valldor, M.*
Polarisation magnétique et frustration dans YBaCo₃FeO₇ étudiées par magnétométrie, diffusion de neutron et spectrométrie Mössbauer
9. GFSM 2010 « L'effet Mössbauer au cœur des applications » Lisboa, (2010), Program and Abstract Book, 25
86. Hermann, R.
Thermoelectrics
Schriften des FZ Jülich, Schlüsseltechnologien **13** (2010), C6
87. Hermann, R.
Unelastische Kernresonanz- und Neutronenstreuung an thermoelektrischen Materialien
SNI - Deutsche Tagung für Forschung mit Synchrotronstrahlen, Neutronen und Ionenstrahlen an Großgeräten, Freie Universität Berlin, 24. - 26.02.2010, Programm & Abstractbook (2010), 30
88. Houben, A.; Schweika, W.; Walter, J.*; Conrad, H.; Müller, P.*; Hansen, B. T.*; Brückel, T.; Dronskowski, R.*
POWTEX - The new high-intensity neutron TOF diffractometer at FRM II
SNI - Deutsche Tagung für Forschung mit Synchrotronstrahlen, Neutronen und Ionenstrahlen an Großgeräten, Freie Universität Berlin, 24. - 26.02.2010, Programm & Abstractbook (2010), 93
89. Josten, E.; Rücker, U.; Mattauch, S.; Korolkov, D.; Glavic, A.; Gilles, S.; Brückel, T.
Magnetische Korrelationen in lateral strukturierten Schichtsystemen
SNI - Deutsche Tagung für Forschung mit Synchrotronstrahlen, Neutronen und Ionenstrahlen an Großgeräten, Freie Universität Berlin, 24. - 26.02.2010, Programm & Abstractbook (2010), 329
90. Josten, E.; Rücker, U.; Mattauch, S.; Korolkov, D.; Glavic, A.; Brückel, T.
Magnetization Flop in Fe/Cr GMR Multilayers
Journal of Physics: Conference Series **211** (2010), 012023: 1 - 8
91. Kentzinger, E.; Rücker, U.
Surfaces, interfaces and thin films investigated by neutron reflectometry
Schriften des FZ Jülich, Schlüsseltechnologien **15** (2010), 12-1 - 12-30
92. Kim, T.-H.*; Angst, M.; Hu, N.*; Jin, R.*; Zhang, X.*; Wendelken, J.*; Plummer, E.*; Li, A.-P.*
Imaging and Manipulation of the Competing Electronic Phases near the Mott Metal-Insulator Transition
Proceedings of the National Academy of Sciences USA, **107** (2010), 5272
93. Kumar, C. M. N.; Xiao, Y.; Su, Y.; Senyshyn, A.*; Perbon, J.; Brückel, T.
Structural and magnetic investigations on metastable hexagonal DyMnO₃
SNI - Deutsche Tagung für Forschung mit Synchrotronstrahlen, Neutronen und Ionenstrahlen an Großgeräten, Freie Universität Berlin, 24. - 26.02.2010, Programm & Abstractbook (2010), 333
94. Lamago, D.*; Mittal, R.*; Pintschovius, L.*; Reznik, D.*; Heid, R.*; Chaplot, S. L.*; Kumar, N.*; Bohnen, K.-P.*; Su, Y.; Brückel, T.
Anomalous phonons in CaFe₂As₂ explored by inelastic neutron scattering
SNI - Deutsche Tagung für Forschung mit Synchrotronstrahlen, Neutronen und Ionenstrahlen an Großgeräten, Freie Universität Berlin, 24. - 26.02.2010, Programm & Abstractbook (2010), 67
95. Li, H.-F.; Su, Y.; Chatterji, T.; Nefedov, A.*; Perbon, J.; Meuffels, P.; Xiao, Y.; Vaknin, D.*; Brückel, T.
Soft x-ray resonant scattering study of single-crystal LaSr₂Mn₂O₇
Eur. Phys. J. B **74** (2010), 457 - 461
96. Li, J.-B.*; Rao, G.H.*; Xiao, Y.; Liang, J. K.*; Luo, J.*; Liu, G. Y.*; Chen, J. R.*
Structural evolution and physical properties of Bi_{1-x}Gd_xFeO₃ ceramics
Acta Materialia **58** (2010), 3701 – 3708
97. Marty, K.*; Christianson, A. D.*; Lumsden, M. D.*; Angst, M.; Yamani, Z.*; Tian, W.*; Jin, R.*; Payzant, E. A.*; Nagler, S. E.*; Sales, B. C.*; Mandrus, D.*
Three dimensional magnetic correlations in multiferroic LuFe₂O₄
Abstract Book, Conference FLIPPER, Single-Crystal Diffraction with Polarised Neutrons (2010), 32 - 33
98. Mattauch, S.; Rücker, U.; Fracassi, V.; Schmitz, R.; Daemen, J.; Babcock, E.; Ioffe, A.; Brückel, T.
MARIA - The new high-intensity polarized neutron reflectometer of JCNS
Abstract Book “Polarised Neutrons in Condensed Matter Investigations” (2010), 106
99. Mattauch, S.; Rücker, U.; Korolkov, D.; Fracassi, V.; Schmitz, R.; Daemen, J.; Budwig, A.; Kleines, H.; Kämmerling, P.; Wagener, M.; Bednarek, M.; Bussmann, K.; Babcock, E.; Ioffe, A.; Brückel, T.
The new high flux polarised neutron reflectometer MARIA at JCNS

- SNI - Deutsche Tagung für Forschung mit Synchrotronstrahlen, Neutronen und Ionenstrahlen an Großgeräten, Freie Universität Berlin, 24. - 26.02.2010, Programm & Abstractbook (2010), 85
100. Mittal, R.*; Heid, R.*; Bosak, A.*; Forrest, T.R.*; Chaplot, S.L.*; Lamago, D.*; Reznik, D.*; Bohnen, K.P.*; Su, Y.; Kumar, N.; Dhar, S.K.*; Thamizhavel, A.*; Rueegg, Ch.*; Krisch, M.*; McMorrow, D.F.*; Brückel, T.; Pintschovius, L.* Pressure dependence of phonon modes across the tetragonal to collapsed tetragonal phase transition in CaFe₂As₂ Physical Review B, 81 (2010) 14, 144502
101. Möchel, A.; Hermann, R.; Juranyi, F.* Lattice dynamics in thermoelectric materials for high temperature applications Neutrons for Global Energy Solutions, Book of Abstracts (2010), 85
102. Möchel, A.; Voigt, J.; Sergeev, I.*; Hermann, R. Untersuchung der Gitterdynamik in thermoelektrischen Skutteriden SNI - Deutsche Tagung für Forschung mit Synchrotronstrahlen, Neutronen und Ionenstrahlen an Großgeräten, Freie Universität Berlin, 24. - 26.02.2010, Programm & Abstractbook (2010), 281
103. Perbon, J. Preparation of oxide ceramics and single crystal growth Schriften des FZ Jülich, Schlüsseltechnologien 13 (2010), B1
104. Pfuhl, E. Magnetische Ordnungsphänomene in Er/Tb Schichtsystemen Diplomarbeit RWTH Aachen (2010)
105. Pfuhl, E.; Voigt, J.; Mattauch, S.; Korolkov, D.; Brückel, T. Interlayer exchange coupling in Er/Tb superlattices mediated by short range incommensurate Er order Journal of Physics: Conference Series 211 (2010), 012019: 1 - 5
106. Phan, M.H.*; Frey, N.A.*; Angst, M.; de Groot, J.; Sales, B.C.*; Mandrus, D.G.*; Srikanth, H.* Complex magnetic phases in LuFe₂O₄ Solid State Communications 150 (2010), 341 - 345
107. Price, S.; Su, Y.; Xiao, Y.; Nandi, S.; Brückel, T. Magnetic neutron scattering on iron arsenide high TC superconductors Neutrons for Global Energy Solutions, Book of Abstracts (2010), 82
108. Rheinstädter, M. C.*; Wood, K.*; Schmalzl, K.; Strauch, D.* Protein-protein interaction in a biological membrane ILL Annual Report 2010, G. Cicognani, A. Harrison and K. Jenkins (ed.) (2010), 56
109. Rücker, U. Nanomagnetism Schriften des FZ Jülich, Schlüsseltechnologien 15 (2010), 13-1 - 13-17
110. Schiering, G.*; Claudio Weber, T.; Theissmann, R.*; Stein, N.*; Petermann, N.*; Becker, A.*; Denker, J.*; Wiggers, H.*; Hermann, R.; Schmeichel, R.* Nanocrystalline silicon compacted by spark-plasma sintering: Microstructure and thermoelectric properties Mater. Res. Soc. Symp. Proc. 1267, 1 (2010), DD01-69
111. Schmalzl, K.; Rasch, J.*; Böhm, M.*; Mutka, H.*; Jimenez-Ruiz, M.*; Schefer, J.*; Abramova, G. M.*; Löffler, J. F.* Neutronenstreuung und ab-initio Studien zu CuCrS₂ SNI - Deutsche Tagung für Forschung mit Synchrotronstrahlen, Neutronen und Ionenstrahlen an Großgeräten, Freie Universität Berlin, 24. - 26.02.2010, Programm & Abstractbook (2010), 335
112. Schmidt, W.; Schmalzl, K.; Feilbach, H.; Brückel, T. Upgrades for IN12: Status und Perspektiven SNI - Deutsche Tagung für Forschung mit Synchrotronstrahlen, Neutronen und Ionenstrahlen an Großgeräten, Freie Universität Berlin, 24. - 26.02.2010, Programm & Abstractbook (2010), 96
113. Schneidewind, A.*; Stockert, O.*; Schmalzl, K.; Loewenhaupt, M.* Temperature dependence of magnetic excitations in CeCu₂Ge₂ investigated by inelastic neutron scattering SNI - Deutsche Tagung für Forschung mit Synchrotronstrahlen, Neutronen und Ionenstrahlen an Großgeräten, Freie Universität Berlin, 24. - 26.02.2010, Programm & Abstractbook (2010), 337
114. Schumacher, D.; Mattauch, S.; Rücker, U.; Brückel, T. Preparation and analysis of epitaxial Fe monolayers buried in Pd Journal of Physics: Conference Series 211 (2010), 012021: 1 - 5
115. Schweika, W. Polarized neutron scattering and polarization analysis Schriften des FZ Jülich, Schlüsseltechnologien 15 (2010), 6-1 - 6-19
116. Schweika, W. X-ray and neutron diffraction Schriften des FZ Jülich, Schlüsseltechnologien 13 (2010), B5
117. Schweika, W. XYZ-polarization analysis of diffuse magnetic neutron scattering from single crystals Abstract Book, Conference FLIPPER, Single-Crystal Diffraction with Polarised Neutrons (2010), 78
118. Schweika, W. XYZ-polarisation analysis of diffuse magnetic neutron scattering from single crystals Journal of Physics: Conference Series 211 (2010), 012026: 1 - 6
119. Su, Y.; Schweika, W.; Mittal, R.; Borghols, W.; Ioffe, A.; Brückel, T. DNS - A diffuse neutron scattering spectrometer with polarization analysis at FRM II Abstract Book "Polarised Neutrons in Condensed Matter Investigations" (2010), 13
120. Su, Y.; Xiao, Y.; Mittal, R.; Price, S.; Chatterji, T.; Herrero-Martin, J.*; Mazzoli, C.*; Paolasini, L.*; Meven, M.*; Kumar, C. M. N.; Brown, P. J.*; Stunault, A.*; Wolf, Th.*; Thamizhavel, A.*; Brückel, T. Static Magnetism of iron pnictides as probed via complementary neutron and synchrotron x-ray scattering techniques SNI - Deutsche Tagung für Forschung mit Synchrotronstrahlen, Neutronen und Ionenstrahlen an Großgeräten, Freie Universität Berlin, 24. - 26.02.2010, Programm & Abstractbook (2010), 333
121. Temleitner, L.*; Pusztai, L.*; Schweika, W. The structure of liquid water by polarized neutron diffraction and reverse Monte Carlo modelling Abstract Book, Conference FLIPPER, Single-Crystal Diffraction with Polarised Neutrons (2010), 140
122. Voigt, J.; Babcock, E.; Brückel, T. Beam transport and polarization at TOPAS, the thermal time-of-flight spectrometer with polarization analysis Journal of Physics: Conference Series 211 (2010), 012032: 1 - 6
123. Voigt, J.; Nemkovskiy, K.; Babcock, E.; Brückel, T. TOPAS, the new JCNS time-of-flight spectrometer at FRM II Neutrons for Global Energy Solutions, Book of Abstracts (2010), 69
124. Wille, H.-C.*; Hermann, R.; Sergueev, I.*; Pelzer, U.*; Möchel, A.; Claudio, T.; Perbon, J.; Rüffer, R.*; Said, A.*; Shvyd'ko, Yu. V.* Nuclear forward and inelastic spectroscopy on ¹²⁵Te and Sb₂¹²⁵Te₃ EPL 91 (2010), 62001
125. Xiao, Y.; Su, Y.; Schmidt, W.; Schmalzl, K.; Kumar, C. M. N.; Price, S.; Chatterji, T.; Mittal, R.; Chang, L. J.*; Nandi, S.; Kumar, N.*; Dhar, S. K.*; Thamizhavel, A.*; Brückel, T. Field-induced spin reorientation and giant spin-lattice coupling in EuFe₂As₂ Physical Review B 81 (2010), 220406(R) 1 - 4
126. Xiao, Y. Macroscopic characterization techniques Schriften des FZ Jülich, Schlüsseltechnologien 13 (2010), B3
127. Xiao, Y.; Su, Y.; Meven, M.*; Price, S.; Thamizhavel, A.*; Brückel, T. Magnetic structure of EuFe₂As₂ determined by single crystal neutron diffractionmanagement Neutrons for Global Energy Solutions, Book of Abstracts (2010), 84
128. Xiao, Y.; Su, Y.; Li, H.-F.; Kumar, C. M. N.; Mittal, R.; Persson, J.; Senyshyn, A.*; Gross, K.; Brückel, T. Neutron diffraction investigation of the crystal and magnetic structures in KCrF₃ perovskite Physical Review B 82 (2010) 094437
129. Xiao, Y.; Su, Y.; Mittal, R.; Chatterji, T.; Hansen, T.*; Price, S.; Kumar, C. M. N.; Perbon, J.; Matsuishi, S.*; Inoue, Y.*; Hosono, H.*; Brückel, T. Neutron diffraction study of phase transitions and thermal expansion of SrFeAsF Physical Review B 81, (2010) 094523: 1 - 5
130. Xu, X.S.*; de Groot, J.; Sun, Q.-C.*; Sales, B.C.*; Mandrus, D.*; Angst, M.; Litvinchuk, A.P.*; Musfeldt, J.L.* Lattice dynamical probe of charge order and antipolar bilayer stacking in LuFe₂O₄ Physical Review B 82 (2010) 1, 014304
131. Zakalek, P. Magnetische Grenzflächenphänomene in Eisen-Palladium-Vielfachschichtsystemen Diplomarbeit RWTH Aachen, (2010)
132. Zakalek, P.; Rücker, U.; Brückel, T.; Schumacher, D.; Mattauch, S. Neutronenreflektometrie an Pd/Fe-Multilayers SNI - Deutsche Tagung für Forschung mit Synchrotronstrahlen,

- Neutronen und Ionenstrahlen an Großgeräten, Freie Universität Berlin, 24. - 26.02.2010, Programm & Abstractbook (2010), 328
133. **Zbiri**, M.; Mittal, R.; Rols, S.; Su, Y.; Xiao, Y.; Schober, H.; Chaplot, S. L.; Johnson, M. R.; Chatterji, T.; Inoue, Y.; Matsushige, S.; Hosono, H.; Brückel, T.
Magnetic lattice dynamics of the oxygen-free FeAs pnictides: how sensitive are phonons to magnetic ordering?
J. Phys.: Condensed Matter **22** (2010), 315701: 1 - 8
- 2009**
134. **Aliouane**, N.*; Schmalzl, K.; Senff, D.*; Maljuk, A.*; Prokes, K.*; Braden, M.*; Argyriou, D. N.*
Flop of electric polarization driven by the flop of the Mn spin cycloid in multiferroic TbMnO₃
Physical Review Letters **102** (2009), 207205: 1 - 4
135. **Arndt**, J.*; Stockert, O.*; Borth, R.*; Faulhaber, E.*; Schmalzl, K.; Schneidewind, A.*; Jeevan, H. S.*; Geibel, C.*; Loewenhaupt, M.*; Steglich, F.*
Do antiferromagnetism and superconductivity coexist in 2% and 10% Ge doped CeCu₂Si₂?
Journal of Physics: Conference Series **150** (2009), 042008: 1 - 4
136. **Brommer**, P.*; de Boissieu, M.*; Euchner, H.*; Francooul, S.*; Gähler, F.*; Johnson, M.*; Parlinski, K.*; Schmalzl, K.
Vibrational properties of MgZn₂
Z. Kristallogr. **224** (2009), 97 - 100
137. **Brückel**, T.
International Conference "Polarized Neutrons and Synchrotron X-rays for Magnetism: Book of Abstract" : 2 - 5 August 2009, Bonn, Germany, 2009
138. Brückel, T.; Voigt, J.; Ioffe, A.; Manoshin, S.
Diffractometer for non-equilibrium states of condensed matter
International Conference "Polarized Neutrons and Synchrotron X-rays for Magnetism: Book of Abstract" : 2 - 5 August 2009, Bonn, 2009. - S. 95
139. **Chang**, L. J.; Su, Y.; Schweika, W.; Brückel, T.; Chen, Y. Y.; Jang, D. S.; Liu, R. S.
Neutron polarization analysis on the multiferroic TbMn₂O₅
Physica B **404** (2009), 2517 - 2519; Proceedings of the 7th International Workshop on Polarized Neutrons for Condensed Matter Investigations and 2nd International Symposium of Quantum Beam Science Directorate
140. **Chatterji**, T.; Schneider, G. J.
Anomalous hyperfine interaction in CoF₂ investigated by high resolution neutron spectroscopy
J. Phys.: Condens. Matter **21** (2009), 436008: 1 - 5
141. Chatterji, T.; McIntyre, G. J.*; Lindgard, P.-A.*
Antiferromagnetic phase transition and spin correlations in NiO
Physical Review B **79** (2009), 172403: 1 - 4
142. Chatterji, T.; Schneider, G.J.; van Eijck, L.*; Frick, B.*; Bhattacharya, D.*
Direct evidence for the Nd magnetic ordering in NdMnO₃ from the hyperfine field splitting of Nd nuclear level
J. Phys.: Condens. Matter **21** (2009), 126003: 1 - 6
143. Chatterji, T.; Schneider, G. J.; Perßon, J.
Low-energy nuclear spin excitations in NdAl₂
Physical Review B **79** (2009), 132408: 1 - 4
144. Chatterji, T.; Schneider, G. J.
Low-energy nuclear spin excitations in CoO
Physical Review B **79** (2009), 212409: 1 - 3
145. Chatterji, T.; Hansen, T. C.*; Brunelli, M.*; Henry, P. F.*
Negative thermal expansion of ReO₃ in the extended temperature range
Applied Physics Letters **94** (2009), 241902: 1 - 3
146. Chatterji, T.; Ouladdiaf, B.*; Bhattacharya, D.*
Neutron diffraction investigation of the magnetic structure and magnetoelastic effects NdMnO₃
J. Phys.: Condens. Matter **21** (2009), 306001: 1 - 5
147. Chatterji, T.; Freeman, P. G.*; Jimenez-Ruiz, M.*; Mittal, R.; Chaplot, S.*
Pressure- and temperature-induced M₃ phonon softening in ReO₃
Physical Review B **79** (2009), 184302: 1 - 5
148. **Disch**, S.; Hermann, R.; Sager, W.; Brückel, T.
Not so small angle scattering with polarization analysis:
Towards the magnetic form factor of nanoparticles
International Conference "Polarized Neutrons and Synchrotron X-rays for Magnetism: Book of Abstract" : 2 - 5 August 2009, Bonn, 2009. - S. 131
149. **Dronskowski**, R.*; Schweika, W.; Brückel, T.; Houben, A.*
Advanced nitrides and neutrons: New nitridic itinerant ferromagnets and the high-performance time-of-flight neutron diffractometer POWTEX
in *Solid-State Chemistry of Inorganic Materials VII*, edited by P. Woodward, J. Mitchell, S. Brock, J. Evans (Mater. Res. Soc. Symp. Proc. **Volume 1148E**, Warrendale, PA, 2009), paper # 1148-PP15-01
150. **Fennell**, T.*; Deen, P.P.*; Wildes, A. R.*; Schmalzl, K.; Prabhakaran, D.*; Boothroyd, A. T.*; Aldus, R. J.*; McMorrow, D. F.*; Bramwell, S. T.*
Magnetic Coulomb Phase in the Spin Ice Ho₂Ti₂O₇
www.scienceexpress.org 10.1126/science.1177582 (2009), 1 - 8
151. Fennell, T.*; Deen, P.P.*; Wildes, A. R.*; Schmalzl, K.; Prabhakaran, D.*; Boothroyd, A. T.*; Aldus, R. J.*; McMorrow, D. F.*; Bramwell, S. T.*
Magnetic Coulomb Phase in the Spin Ice Ho₂Ti₂O₇
Science, 326 (2009), 415 - 417
152. **Fenske**, J.*; Lott, D.*; Mankey, G. J.*; Schmidt, W.; Schmalzl, K.; Tartakovkaya, E. V.*; Klose, F.*; Mulders, A. M.*; Schreyer, A.*
Investigation of the magnetic spin configuration in thin Fe50Pt50-x films with polarized neutron diffraction
International Conference "Polarized Neutrons and Synchrotron X-rays for Magnetism: Book of Abstract" (2009), 158
153. **Glavic**, A.; Voigt, J.; Schubert, J.; Su, Y.
Neutron scattering from TbMnO₃ deposited on YAlO₃
International Conference "Polarized Neutrons and Synchrotron X-rays for Magnetism: Book of Abstract" (2009), 122
154. **de Groot**, J.; Kentzinger, E.; Voigt, J.; Goukassov, A.*; Gillon, B.*; Brückel, T.
Magnetization density in TbMnO₃ single crystals
International Conference "Polarized Neutrons and Synchrotron X-rays for Magnetism: Book of Abstract" : 2 - 5 August 2009, Bonn, 2009. - S. 120
155. **Hermann**, R. P.; Sergueev, I.*; Pelzer, U.*; McGuire, M.*
Magnetism in EuFe_{2-x}Ni_xAs₂ probed by nuclear resonance scattering
International Conference "Polarized Neutrons and Synchrotron X-rays for Magnetism: Book of Abstract" : 2 - 5 August 2009, Bonn, 2009. - S. 59
156. Hermann, R. P.; Möchel, A.; Claudio Weber, T.
Nuclear inelastic scattering by antimony and tellurium in thermoelectric materials
28th International Conference / 7th European Conference on Thermoelectrics ICT/ECT (2009), 100
157. Hermann, R. P.; Sergueev, I.*; Pelzer, U.*; Angst, M.; Schweika, W.; McGuire, M.*
Nuclear resonance scattering by 57Fe and 151Eu in EuFe₂As₂
International Conference on the Applications of the Mössbauer Effect ICAME 2009, Book of Programme and Abstracts (2009), 58
158. **Herrero-Martín**, J.*; Scagnoli, V.*; Mazzoli, C.*; Su, Y.; Mittal, R.; Xiao, Y.; Brückel, T.; Kumar, N.*; Dhar, S.*; Thamizhavel, A.*; Paolasini, L.*
Magnetic structure of EuFe₂As₂ as determined by resonant x-ray scattering
Physical Review B **80** (2009), 134411: 1 - 5
159. Herrero-Martin, J.*; Paolasini, L.*; Mazzoli, C.*; Scagnoli, V.*; Mittal, R.; Brückel, T.; Su, Y.
Study of magnetic correlations on the iron pnictide EuFe₂As₂ by RXS
International Conference "Polarized Neutrons and Synchrotron X-rays for Magnetism: Book of Abstract" : 2 - 5 August 2009, Bonn, 2009. - S. 73
160. **Josten**, E.
Magnetische Korrelationen in lateral strukturierten Fe/Cr-Schichtsystemen
Diplomarbeit Universität Bonn (2009)
161. Josten, E.; Rücker, U.; Brückel, T.
Magnetic correlations in laterally patterned magnetic multilayers
International Conference "Polarized Neutrons and Synchrotron X-rays for Magnetism: Book of Abstract" : 2 - 5 August 2009, Bonn, 2009. - S. 161
162. **Kentzinger**, E.; Mattauch, S.; Korolkov, D.; Rücker, U.; Ioffe, A.; Toperverg, B.; Brückel, T.
Probing lateral correlations in magnetic nanostructures by polarized neutron scattering under grazing incidence
International Conference "Polarized Neutrons and Synchrotron X-rays for Magnetism: Book of Abstract" : 2 - 5 August 2009, Bonn, 2009. - S. 104
163. **Kimber**, S.A.J.*; Kreyssig, A.*; Zhang, Y.-Z.*; Jeschke, H.O.*; Valenti, R.*; Yokochiya, F.*; Colombier, E.*; Yan, J.*; Hansen, T.C.*; Chatterji, T.; McQueeney, R.J.*; Canfield, P.C.*; Goldman, A.I.*; Argyriou, D.N.*
Similarities between structural distortions under pressure and chemical doping in superconducting BaFe₂As₂

- Letters Nature Materials Advance Online Publication (2009), 471 - 475
164. **Krott**, M.*; Houben, A.*; Müller, P.*; Schweika W.; Dronskowski, R.*
Determination of the magnetic structure of manganese carbodiimide with diffraction experiments using polarized neutrons
Phys. Rev. B **80** (2009), 024117: 1 - 5
165. **Kumar**, C. M. N.; Xiao, Y.; Su, Y.; Perßon, J.; Brückel, T.
Magnetic structure of hexagonal DyMnO₃
International Conference "Polarized Neutrons and Synchrotron X-rays for Magnetism: Book of Abstract" : 2 - 5 August 2009, Bonn, 2009. - S. 123
166. **Lee**, C.-H.; Chang, H.-H.; Su, H.-C.; Wu, Y.-H.; Hu, C.-W.; Chang, L. J.; Ioffe, A.; Bussmann, K.; Brückel, T.
Neutron depolarization study on the magnetic correlation length of nickel ferrite with different packing densities
Physica B **404** (2009), 2565 - 2567; Proceedings of the 7th International Workshop on Polarized Neutrons for Condensed Matter Investigations and 2nd International Symposium of Quantum Beam Science Directorate
167. **Li**, H.-F.; Su, Y.; Xiao, Y. G.; Perßon, J.; Meuffels, P.; Brückel, T.
Crystal and magnetic structure of single-crystal La_{1-x}Sr_xMnO₃ ($x \sim 1/8$)
Eur. Phys. J. B **67** (2009), 149 - 157
168. **Lorenz**, W. E. A.*; Kuzian, R. O.*; Drechsler, S.-L.*; Stein, W.-D.*; Wizent, N.*; Behr, G.*; Málek, J.*; Nitzsche, U.*; Rosner, H.*; Hiess, A.*; Schmidt, W.; Klingeler, R.*; Loewenhaupt, M.*; Büchner, B.*
Highly dispersive spin excitations in the chain cuprate Li₂CuO₂
EPL **88** (2009), 37002: 1 - 6
169. **Mattauch**, S.; Rücker, U.; Fracassi, V.; Schmitz, R.; Daemen, J.; Babcock, E.; Ioffe, A.; Brückel, T.
MARIA - The new high-intensity polarized neutron reflectometer of JCNS
International Conference "Polarized Neutrons and Synchrotron X-rays for Magnetism: Book of Abstract" : 2 - 5 August 2009, Bonn, 2009. - S. 106
170. **McGuire**, M. A.*; Hermann, R. P.; Sefat, A. S.*; Sales, B. C.*; Jin, R.*; Mandrus, D.*; Grandjean, F.*; Long, G. J.*
Influence of the rare-earth element on the effects of the structural and magnetic phase transitions in CeFeAsO, PrFeAsO, and NdFeAsO
New Journal of Physics **11** (2009), 025011: 1 - 16
171. **Mittal**, R.; Zbiri, M.*; Rols, S.*; Su, Y.; Xiao, Y.; Schober, H.*; Chaplot, S.*; Johnson, M.*; Chatterji, T.; Matsuishi, S.*; Hosono, H.*; Brückel, T.
Effects of magnetic doping and temperature dependence on phonon dynamics in CaFe_{1-x}Co_xAsF compounds ($x = 0, 0.06$, and 0.12)
Physical Review B **79** (2009), 214514: 1 - 8
172. Mittal, R.; Pintschovius, L.*; Lamago, D.*; Heid, R.*; Bohnen, K.-P.*; Reznik, D.*; Chaplot, S. L.*; Su, Y.; Kumar, N.*; Dhar, S. K.*; Thamizhavel, A.*; Brückel, T.
Measurement of Anomalous Phonon Dispersion of CaFe₂As₂ Single Crystals Using Inelastic Neutron Scattering
Physical Review Letters **102** (2009), 217001: 1 - 4
173. Mittal, R.; Rols, S.*; Zbiri, M.*; Su, Y.; Schober, H.*; Chaplot, S. L.*; Johnson, M.*; Tegel, M.*; Chatterji, T.; Matsuishi, S.*; Hosono, H.*; Johrendt, D.*; Brückel, T.
Phonon spectra in CaFe₂As₂ and Ca_{0.6}Na_{0.4}Fe₂As₂: Measurement of the pressure and temperature dependence and comparison with ab initio and shell model calculations
Physical Review B **79** (2009), 144516: 1 - 7
174. **Pfuhl**, E.; Voigt, J.; Brückel, T.
Proximity effects in Er/Tb multilayers
International Conference "Polarized Neutrons and Synchrotron X-rays for Magnetism: Book of Abstract" : 2 - 5 August 2009, Bonn, 2009. - S. 166
175. **Phan**, M. H.*; Frey, N. A.*; Srikanth, H.*; Angst, M.; Sales, B. C.*; Mandrus, D.*
Magnetism and cluster glass dynamics in geometrically frustrated LuFe₂O₄
Journal of Applied Physics **105** (2009), 07E308: 1 - 3
176. **Rheinstädter**, M. C.*; Schmalzl, K.; Wood, K.*; Strauch, D.*
Protein-Protein Interaction in Purple Membrane
Physical Review Letters **103** (2009), 128104: 1 - 4
177. **Rücker**, U.; Toperverg, B.*; Ott, F.*; Brückel, T.
Zeeman splitting revisited - polarized neutron reflectivity in high magnetic fields
International Conference "Polarized Neutrons and Synchrotron

- X-rays for Magnetism: Book of Abstract" : 2 - 5 August 2009, Bonn, 2009. - S. 167
178. **Schumacher**, D.; Mattauch, S.; Rücker, U.; Brückel, T.
2-Dimensional magnetism of Fe-Monolayers in Pd
International Conference "Polarized Neutrons and Synchrotron X-rays for Magnetism: Book of Abstract" : 2 - 5 August 2009, Bonn, 2009. - S. 168
179. **Schweika**, W.
Multi-detector polarization analysis development for diffuse magnetic scattering by single crystals
International Conference "Polarized Neutrons and Synchrotron X-rays for Magnetism: Book of Abstract" (2009), 107
180. **Steffens**, P.*; Farrell, J.*; Price, S.*; Mackenzie, A. P.*; Sidis, Y.*; Schmalzl, K.; Braden, M.*
Incommensurate magnetic ordering in Ti-doped Sr₃Ru₂O₇
Phys. Rev. B **79** (2009), 054422: 1 - 8
181. **Su**, Y.; Link, P.*; Schneidewind, A.*; Wolf, Th.*; Adelmann, P.*; Xiao, Y.; Meven, M.*; Mittal, R.; Rotter, M.*; Johrendt, D.*; Brückel, T.; Loewenhaupt, M.*
Antiferromagnetic ordering and structural phase transition in Ba₂Fe₂As₂ with Sn incorporated from the growth flux
Physical Review B **79** (2009), 064504: 1 - 6
182. **Su**, Y.; Schweika, W.; Mittal, R.; Harbott, P.; Küssel, E.; Bussmann, K.; Gossen, F.; Schmitz, B.; Skrobucha, M.; Möller, R.; Wagener, M.; Drochner, M.; Kleines, H.; Ioffe, A.; Brückel, T.
DNS-Diffuse neutron scattering with polarization analysis
International Conference "Polarized Neutrons and Synchrotron X-rays for Magnetism: Book of Abstract" : 2 - 5 August 2009, Bonn, 2009. - S. 110
183. **Valldor**, M.*; Sanders, Y.; Schweika, W.
High spin frustration in Co based Swedenborgites
Journal of Physics: Conference Series **145** (2009), 012076: 1 - 6
184. **Voigt**, J.; Babcock, E.; Brückel, T.
Polarisation analysis for thermal time-of-flight spectroscopy
International Conference "Polarized Neutrons and Synchrotron X-rays for Magnetism: Book of Abstract" : 2 - 5 August 2009, Bonn, 2009. - S. 113
185. **Xiao**, Y.; Su, Y.; Mittal, R.; Chatterji, T.; Hansen, T.*; Kumar, C. M. N.; Matsuishi, S.*; Hosono, H.*; Brückel, T.
Magnetic order in the CaFe_{1-x}CoxAsF ($x = 0.00, 0.06, 0.12$) superconducting compounds
Physical Review B **79** (2009), 060504 (R): 1 - 4
186. **Xiao**, Y.; Su, Y.; Kumar, C. M. N.; Li, H.-F.; Mittal, R.; Perßon, J.; Senyshyn, A.*; Gross, K.; Brückel, T.
Magnetic structure and orbital odering in KCrF₃
International Conference "Polarized Neutrons and Synchrotron X-rays for Magnetism: Book of Abstract" : 2 - 5 August 2009, Bonn, 2009. - S. 148
187. **Xiao**, Y.; Su, Y.; Meven, M.*; Mittal, R.; Kumar, C. M. N.; Chatterji, T.; Price, S.; Perßon, J.; Kumar, N.*; Dhar, S. K.*; Thamizhavel, A.*; Brückel, T.
Magnetic structure of EuFe₂As₂ determined by single-crystal neutron diffraction
Physical Review B **80** (2009), 174424: 1 - 8
- 2008**
188. **Angst**, M.; Hermann, R. P.; Christianson, A. D.*; Lumsden, M. D.*; Lee, C.*; Whangbo, M.-H.*; Kim, J.-W.*; Ryna, P. J.*; Nagler, S. E.*; Tian, W.*; Jin, R.*; Sales, B. C.*; Mandrus, D.*
Charge order in LuFe₂O₄: Antiferroelectric ground state and coupling to magnetism
Physical Review Letters **101** (2008), 227601: 1 - 4
189. **Bodnarchuk**, V. I.; Kraan, W. H.; Rekveldt, M. T.; Ioffe, A.
Neutron spin turners with a rotating magnetic field: first experiments
Meas. Sci. Technol. **19** (2008) 034012: 1 - 5
190. **Bosak**, A.*; Schmalzl, K.; Krisch, M.*; van Beek, W.*; Kolobanov, V.*
Lattice dynamics of beryllium oxide: Inelastic x-ray scattering and ab initio calculations
Phys. Rev. B **77** (2008), 224303-1 - 224303-7
191. **Bose**, P.*; Mittal, R.; Choudhury, N.*; Chaplot, S. L.*
Inelastic neutron scattering and lattice dynamics of ZrO₂, Y₂O₃ and ThSiO₄
Proceedings of the International Symposium on Neutron Scattering (15. - 18.01.2008)
Pramana - Journal of Physics **71**, 5, (2008), 1141 - 1146
192. **Bóta**, A.; Varga, Z.; Goerigk, G.
Structural description of the nickel part of a raney-type catalyst by using anomalous small-angle x-ray scattering

- The Journal of Physical Chemistry C Letters **112** (2008), 4427 - 4429
193. Brückel, T.; Heger, G.*; Richter, D.; Zorn, R. (Eds.) Laboratory Course Neutron Scattering (Lectures) Schriften des FZ, Schlüsseltechnologien **5** (2008)
194. Brückel, T.; Kentzinger, E.; Mattauch, S.; Paul, A.; Rücker, U.; Voigt, J. A deeper look into magnetic nanostructures using advanced scattering methods Proc. of the Internat. Symposium on Neutron Scattering (15. - 18.01.2008) Pramana - Journal of Physics **71**, 5, (2008), 895
195. Brückel, T. A neutron primer: Elastic scattering and the properties of the neutron Schriften des FZ, Schlüsseltechnologien **5** (2008), 2-1 - 2-31
196. Brückel, T. Applications of neutron scattering Schriften des FZ, Schlüsseltechnologien **5** (2008), 6-1 - 6-27
197. Brückel, T. Correlated electrons in complex transition metal oxides Schriften des FZ, Schlüsseltechnologien **5** (2008), 15-1 - 15-20
198. Chatterji, T.; Schneider, G. J.; Galera, R. M.* Low-energy nuclear spin excitations in NdMg₃ and NdCo₂ Physical Review B **78** (2008), 012411: 1 - 4
199. Chatterji, T.; Henry, P. F.*; Mittal, R.; Chaplot, S. L.* Negative thermal expansion of ReO₃: Neutron diffraction experiments and dynamical lattice calculations Physical Review B **78** (2008), 134105-1 - 134105-6
200. Chen, J.*; Jung, P.; Hoffelner, W.*; Ullmaier, H. Dislocation loops and bubbles in oxide dispersion strengthened ferritic steel after helium implantation under stress Acta Materialia **56** (2008), 250 - 258
201. Chen, J.*; Jung, P.; Pouchon, M. A.*; Rebac, T.*; Hoffelner, W.* Irradiation creep and precipitation in a ferritic ODS steel under helium implantation Journal of Nuclear Materials **373** (2008), 22 - 27
202. Conrad, H.; Brückel, T.; Budwig, A.; Bussmann, K.; Engels, R.; Fracassi, V.; Heinen, J.; Heybutzki, H.; Ioffe, A.; Küsel, E.; Kulessa, T.; Pap, M.; Schmitz, B.; Suxdorf, F.; Zeiske, T. A new thermal triple-axis spectrometer at the research reactor FRJ-2 Journal of Neutron Research **16** (2008), 31 - 38
203. Conrad, H.; Brückel, T.; Schäfer, W.*; Voigt, J. POWTEX - the high-intensity time-of-flight diffractometer at FRM II for structure analysis of polycrystalline materials J. Appl. Cryst. **41** (2008), 836 - 845
204. Disch, S.; Cheetham, A. K.*; Ruschewitz, U.* Formation of unsaturated C₃ hydrocarbons by the protolysis of magnesium sesquicarbide with ammonium halides Inorganic Chemistry **47** (2008), 969 - 973
205. Glavic, A. Interferenzlithografie zur Erzeugung magnetischer Nanostrukturen: Von der lateralen Strukturierung bis zur Untersuchung der magnetischen Eigenschaften Diplomarbeit RWTH Aachen (2008)
206. Goel, P.*; Mittal, R.; Chaplot, S. L.*; Tyagi, A. K.* Lattice dynamics of strontium tungstate Proceedings of the International Symposium on Neutron Scattering (15. - 18.01.2008) Pramana - Journal of Physics **71**, 5, (2008), 1135 - 1139
207. Goerigk, G. Decomposition kinetics in copper-cobalt alloys systems: Applications of small-angle x-ray scattering in: Neutrons and Synchrotron Radiation in Engineering Materials Science (2008), 249 - 256; Eds.: Reimers, W.; Pyzalla, A. R.; Schreyer, A.; Clemens, H., Wiley-VCH
208. Goldman, A.*; Argyriou, D.*; Ouladdiaf, B.*; Chatterji, T.; Kreyssig, A.*; Nandi, S.*; Ni, N.*; Bud'ko, S.*; Canfield, P.*; McQueeney, R.* Lattice and magnetic instabilities in CaFe₂As₂: A single crystal neutron diffraction study Physical Review B **78** (2008), 100506(R)-1 - 100506(R)-4
209. Gossuin, Y.*; Hocq, A.*; Vuong, Q.*; Disch, S.; Hermann, R.; Gillis, P.* Physico-chemical and NMR relaxometric characterization of gadolinium hydroxide and dysprosium oxide nanoparticles Nanotechnology **19** (2008), 475102: 1 - 8
210. Gray, D. L.*; Long, G. J.*; Grandjean, F.*; Hermann, R. P.; Ibers, J. A.* Syntheses, Structure, and a Mössbauer and Magnetic Study of

- Ba₄Fe₂I₅S₄ Inorganic Chemistry **47** (2008) 1, 94 - 100
211. de Groot, J. Strukturelle und magnetische Ordnung von multiferroischen TbMnO₃ Untersuchungen in Einkristallen und in Dünnschichten Diplomarbeit RWTH Aachen (2008)
212. Hermann, R. Scattering of Neutrons & Photons in: Lecture Notes of the 39th Spring School: Soft Matter, From Synthetic to Biological Materials; Schlüsseltechnologien **1** (2008), A1.1 - A1.30
213. Hu, R.*; Thomas, K. J.*; Lee, Y.*; Vogt, T.*; Choi, E. S.*; Mitrović, V. F.*; Hermann, R. P.; Grandjean, F.*; Canfield, P. C.*; Kim, J. W.*; Goldman, A. I.*; Petrovic, C.* Colossal positive magnetoresistance in a doped nearly magnetic semiconductor Physical Review B **77** (2008), 085212-1 - 085212-5
214. Ioffe, A.; Bodnarchuk, V.; Bussmann, K.; Mueller, R.; Georgii, R.* A new neutron spin-echo spectrometer with time-gradient magnetic fields: First experimental test Nuclear Instruments and Methods Physics Research **A586** (2008), 36 - 40
215. Ioffe, A. A new neutron spin-echo technique with time-gradient magnetic fields Nuclear Instruments and Methods Physics Research **A586** (2008), 31 - 35
216. Ioffe, A. Neutron Sources Schriften des FZ, Schlüsseltechnologien **5** (2008), 1-1 - 1-11
217. Kentzinger, E.; Busch, P.; Korolkov, D.; Mattauch, S.; Paul, A.; Rücker, U.; Voigt, J.; Brückel, T. Correlations in nanostructured materials by neutron scattering under grazing incidence nanoelectronic days 2008, Abstract Book, Forschungszentrum Jülich, CNI (2008), 81
218. Kentzinger, E.; Rücker, U.; Toperverg, B.; Ott, F.*; Brückel, T. Depth-resolved investigation of the lateral magnetic correlations in a gradient nanocrystalline multilayer Physical Review B **77** (2008), 104435-1 - 104435-19
219. Kimber, S. A. J.*; Argyriou, D. N.*; Yokaichiya, F.*; Habicht, K.*; Gerischer, S.*; Hansen, T.*; Chatterji, T.; Klingeler, R.*; Hess, C.*; Behr, G.*; Konrat, A.*; Büchner, B.* Magnetic ordering and negative thermal expansion in PrFeAsO Physical Review B **78** (2008), 140503(R)-1 - 140503(R)-4
220. Korolkov, D. Structural analysis of diblock copolymer nanotemplates using grazing incidence scattering Dissertation RWTH Aachen (2008)
221. Korolkov, D. Structural analysis of diblock copolymer nanotemplates using grazing incidence scattering Schriften des FZ, Schlüsseltechnologien **2** (2008)
222. Li, H. Synthesis of CMR manganites and ordering phenomena in complex transition metal oxides Dissertation RWTH Aachen (2008)
223. Li, H. Synthesis of CMR manganites and ordering phenomena in complex transition metal oxides Schriften des FZ, Schlüsseltechnologien **4** (2008)
224. Lott, D.*; Fenske, J.*; Schreyer, A.*; Mani, P.*; Mankey, G. J.*; Klose, F.*; Schmidt, W.; Schmalzl, K.; Tartakovskaya, E. V.* Antiferromagnetism in a Fe50Pt40Rh10 thin film investigated using neutron diffraction Physical Review B **78** (2008), 174413: 1 - 10
225. Manoshin, S.*; Ioffe, A. New modules for the VITESS software package: Time-gradient magnetic fields and neutron refractive lenses Nuclear Instruments and Methods Physics Research **A586** (2008), 81 - 85
226. McGuire, M. A.*; Christianson, A. D.*; Sefat, A. S.*; Sales, B. C.*; Lumsden, M. D.*; Jin, R.*; Payzant, E. A.*; Mandrus, D.*; Luan, Y.*; Keppens, V.*; Varadarajan, V.*; Brill, J. W.*; Hermann, R. P.; Sougrati, M. T.*; Grandjean, F.*; Long, G.* Phase transitions in LaFeAsO: Structural, magnetic, elastic, and transport properties, heat capacity and Mössbauer spectra Physical Review B **78** (2008), 094517: 1 - 10
227. Mishra, S. K.*; Mittal, R.; Choudhury, N.*; Chaplot, S. L.*; Pandey, D.* Inelastic neutron scattering and lattice dynamics of NaNbO₃ and Sr_{0.70}Ca_{0.30}TiO₃

- Proc. of the Internat. Symposium on Neutron Scattering (15. - 18.01.2008)
- Pramana - Journal of Physics **71**, 5, (2008), 1129 - 1134
228. Mittal, R.; Su, Y.; Rols, S.*; Chatterji, T.; Chaplot, S. L.*; Schober, H.*; Rotter, M.*; Johrendt, D.*; Brückel, T.
Inelastic neutron scattering and lattice-dynamical calculations of BaFe₂As₂
Physical Review B **78** (2008), 104514-1 - 104514-5
229. Mittal, R.
Negative thermal expansion in framework compounds
Proc. of the Internat. Symposium on Neutron Scattering (15. - 18.01.2008)
- Pramana - Journal of Physics **71**, 4, (2008), 829 - 835
230. Mittal, R.; Su, Y.; Rols, S.*; Tegel, M.*; Chaplot, S. L.*; Schober, H.*; Chatterji, T.; Johrendt, D.*; Brückel, Th.
Phonon dynamics in Sr_{0.6}K_{0.4}Fe₂As₂ and Ca_{0.6}Na_{0.4}Fe₂As₂ from neutron scattering and lattice-dynamical calculations
Physical Review B **78** (2008), 224518: 1 - 5
231. Möchel, A.
Magnetische Struktur und Anregungen von SEMnO₃
Multiferroika (SE = Gd, Tb)
Diplomarbeit Universität Bonn (2008)
232. Paul, A.; Buchmeier, M.; Bürgler, D. E.; Rücker, U.; Schneider, C. M.
Twisted magnetization state at the interface of an antiferromagnetically coupled Fe/Si multilayer as probed by specular and off-specular polarized neutron scattering
Physical Review B **77** (2008), 184409-1 - 184409-16
233. Radulescu, A.; Ioffe, A.;
Neutron guide system for small-angle neutron scattering instruments of the Jülich Centre for Neutron Science at the FRMII.
Nuclear Instruments and Methods Physics Research **A586** (2008), 55 - 58
234. Schmalzl, K.; Strauch, D.*; Hiess, A.*; Berger, H.*
Temperature dependent phonon dispersion in 2H-NbSe₂ investigated using inelastic neutron scattering
J. Phys.: Condens. Matter **20** (2008), 104240-1 - 104240-3
235. Schumacher, Daniel
2-Dimensionaler Magnetismus von Eisen-Monolagen in Palladium
Diplomarbeit RWTH Aachen (2008)
236. Schweika, W.
Polarized neutron scattering
Schriften des FZ, Schlüsseltechnologien **5** (2008), 3-1 - 3-23
237. Seeck, O. H.*; Kentzinger, E.
Grazing incidence neutron scattering
Schriften des FZ, Schlüsseltechnologien **5** (2008), 5-1 - 5-26
238. Sinko, K.*; Huesing, N.*; Goerigk, G.; Peterlik, H.*
Nanostructure of gel-derived aluminosilicate materials
Langmuir, 24 (2008) 3, 949 - 956
239. Sougrati, M. T.*; Hermann, R. P.; Grandjean, F.*; Long, G. J.*; Brück, E.*; Tegus, O.*; Trung, N. T.*; Buschow, K. H. J.*
A structural, magnetic, and Mössbauer spectral study of the magnetocaloric Mn_{1-x}Fe_xP_{1-x}Ge_x compounds
Journal of Physics: Condensed Matter **20** (2008), 475206: 1 - 9
240. Strempfer, J.*; Hupfeld, D.; Voigt, J.; Bihlmayer, G.*; Goldman, A. I.*; Brückel, T.
Resonant magnetic X-ray scattering from terbium
Journal of Physics: Condensed Matter **20** (2008), 445208: 1 - 7
241. Teixeira, S.C.M.*; Zaccai, G.*; Ankner, J.*; Bellissent-Funel, M.C.*; Bewley, R.*; Blakeley, M.P.*; Callow, P.*; Coates, L.*; Dahint, R.*; Dalglish, R.*; Dencher, N. A.*; Forsyth, V. T.*; Fragneto, G.*; Frick, G.*; Gilles, R.*; Gutberlet, T.; Haertlein, M.*; Hauß, T.*; Häubler, W.*; Heller, W.T.*; Herwig, K.*; Holderer, O.; Juranyi, F.*; Kampmann, R.*; Knott, R.*; Krueger, S.*; Langan, P.*; Lechner, R. E.*; Lynn, G.*; Majkrzak, C.*; May, R. P.*; Meilleur, F.*; Mo, Y.*; Mortensen, K.*; Myles, D.A.A.*; Natali, F.*; Neylon, C.*; Niimura, N.*; Ollivier, J.*; Ostermann, A.*; Peters, J.*; Pieper, J.*; Rühm, A.*; Schwahn, D.; Shibata, K.*; Soper, A.K.*; Strässle, Th.*; Suzuki, J.*; Tanaka, I.*; Tehei, M.*; Timmins, P.*; Torikai, N.*; Unruh, T.*; Urban, V.*; Vavrin, R.*; Weiss, K.*
New Sources and Instrumentation for Neutrons in Biology
Chemical Physics, 345 (2008), 133 - 155
242. Theis-Bröhl, K.*; Westphalen, A.*; Zabel, H.*; Rücker, U.; McCord, J.*; Höink, V.*; Schmalhorst, J.*; Reiss, G.*; Weis, T.*; Engel, D.*; Ehresmann, A.*; Toperverg, B. P.*
Hyper-domains in exchange bias micro-stripe pattern
New Journal of Physics **10** (2008), 093021: 1 - 21
243. Varga, Z.*; Bota, A.*; Goerigk, G.
Unbinding transition in lipid multibilayers induced by copper(II)ions
- The Journal of Physical Chemistry B Letters **112** (2008), 8430 - 8433
244. Wille, H. C.*; Hermann, R. P.; Sergueev, I.*; Leupold, O.*; van der Linden, P.*; Sales, B. C.*; Grandjean, F.*; Long, G. J.*; Rüffer, R.*; Shvyd'ko, Yu. V.*
Nuclear resonant spectroscopy on ¹²¹Sb and ¹²⁵Te
ESRF Highlights (2008), 18 - 19
245. Xu, X. S.*; Angst, M.; Brinzari, T. V.*; Hermann, R. P.; Musfeldt, J. L.*; Christianson, A. D.*; Mandrus, D.*; Sales, B. C.*; McGill, S.*; Kim, J.-W.*; Islam, Z.*
Charge order, dynamics, and magneto-structural transition in multiferroic LuFe₂O₄
Physical Review Letters **101** (2008), 227602: 1 - 4
- 2007**
246. Angst, M.*; Khalifah, P.*; Hermann, R.; Xiang, H. J.*; Whangbo, M.-H.*; Varadarajan, V.*; Brill, J. W.*; Sales, B. C.*; Mandrus, D.*
Charge order superstructure with integer iron valence in Fe₂BO₃
Physical Review Letters **99** (2008), 086403-1 - 086403-4
247. Angst, M.*; Hermann, R.; Schweika, W.; Kim, J.-W.*; Khalifah, P.*; Xiang, H.*; Whangbo, M.-H.*; Kim, D.-H.*; Sales, B.*; Mandrus, D.*
Incommensurate charge order phase in Fe₂BO₃ due to geometrical frustration
Physical Review Letters **99** (2007), 256402-1 - 256402-4
248. Bedanta, S.*; Kentzinger, E.; Petracic, O.*; Kleemann, W.*; Rücker, U.; Paul, A.; Brückel, T.; Cardoso, S.*; Freitas, P.*
Polarized neutron reflectivity studies on granular Co₈₀Fe₂₀/Al₂O₃ multilayers
Physica B **397** (2007), 65 - 67
249. Bóta, A.*; Varga, Z.*; Goerigk, G.
Biological systems as nanoreactors: Anomalous small-angle scattering study of the CdS nanoparticle formation in multilamellar vesicles
Journal of Physical Chemistry B, **111** (2007) 8, 1911 - 1915
250. Bóta, A.*; Varga, Z.*; Goerigk, G.
Vesicles as reactors of nanoparticles: an anomalous small-angle X-ray scattering study of the domains rich in copper ions
Journal of Applied Crystallography **40** (2007), s259 - s263
251. Brückel, T.
A neutron primer: Elastic scattering and the properties of the neutron
Schriften des FZ, **38** (2007), 2-1 - 2-31
252. Brückel, T.
Atomic and magnetic structures in crystalline materials: Neutron and x-ray scattering
Schriften des FZ, Materie und Material **34** (2007), D1.1 - D1.47
253. Brückel, T.; Heger, G.*; Richter, D.; Zorn, R. (Eds.)
Laboratory Course Neutron Scattering
Schriften des FZ, Materie und Material **38** (2007)
254. Brückel, T.
Magnetism
Schriften des FZ **38** (2007), 15-1 - 15-19
255. Chang, J.*; Pailhés, S.*; Shi, M.*; Måansson, M.*; Claesson, T.*; Tjernberg, O.*; Voigt, J.; Perez, V.*; Patthey, L.*; Momono, N.*; Oda, M.*; Ido, M.*; Schnyder, A.*; Mudry, C.*; Mesot, J.*
When low- and high-energy electronic responses meet in in cuprate superconductors
Physical Review B **75** (2007), 224508-1 - 224808-6
256. Chang, L.; Terashita, H.; Schweika, W.; Chen, Y.*; Gardner, J.*
HoTbTi₂O₇, the mixtures of spin ice and spin liquid
Journal of Magnetism and Magnetic Materials **310** (2007), 1293 - 1294
257. Feygenson, M.; Kentzinger, E.; Ziegenhagen, N.; Rücker, U.; Goerigk, G.; Wang, Y.*; Brückel, T.
Contrast variation by anomalous X-ray scattering applied to investigation of the interface morphology in a giant magnetoresistance Fe/Cr/Fe trilayer
J. Appl. Cryst. **40** (3) (2007), 532 - 538
258. Feygenson, M.
Magnetic and structural properties of thin films and nanoparticles studied by scattering methods
Dissertation (2007), RWTH Aachen
259. Feygenson, M.
Magnetic and structural properties of thin films and nanoparticles studied by scattering methods
Schriften des FZ Jülich **39** (2007)
260. Goerigk, G.; Williamson, D. L.*
Correlation between the photoconductivity and the nanostructure of hot-wire deposited silicon-germanium alloys analyzed by

- anomalous small-angle x-ray scattering
Proc. SPIE-Int. Soc. Opt. Eng., 2007. **6651** (Photovoltaic Cell and Module Technologies): p. 66510D/1-66510D/13
261. Goerigk, G.; Huber, K.*; Schweins, R.*
Probing the extent of the Sr²⁺ ion condensation to anionic polyacrylate coils: A quantitative anomalous small-angle x-ray scattering study
The Journal of Chemical Physics **127** (2007), 154908-1 - 154908-8
262. Grandjean, F.*; Hermann, R.; Popiel, E.*; Long, G.*
A Mössbauer spectral study of the GdCo_{4-x}Fe_xB compounds
Journal of Applied Physics **101** (2007), 023917-1 - 023917-6
263. Hermann, R. P.; Grandjean, F.*; Kafle, D.*; Brown, D. E.*; Johnson, C. E.*; Kauzlarich, S. M.*; Long, G. J.*
Antimony-121 Mössbauer Spectral Study of the Eu_{1.4}MnSb₁₁ and Yb_{1.4}MnSb₁₁ Zintl Compounds
Inorganic Chemistry **46** (2007), 10736 - 10740
264. Hu, R.*; Hermann, R. P.; Grandjean, F.*; Lee, Y.*; Warren, J. B.*; Mitrović, V. F.*; Petrovic, C.*
Weak ferromagnetism in Fe_{1-x}Co_xSb₂
Physical Review B **76** (2007), 224422-1 - 224422-6
265. Ioffe, A.; Bodnarchuk, V.; Bussmann, K.; Mueller, R.
Larmor labeling by time-gradient magnetic fields
Physica B **397** (2007), 108 - 111
266. Ioffe, A.
Neutron Sources
Schriften des FZ Jülich **38** (2007), 1-1 - 1-11
267. Kentzinger, E.
Diffusion des neutrons polarisés en incidence rasante
Collection SFN **8** (2007), 23 - 42
268. Kentzinger, E.; Frielinghaus, H.; Rücker, U.; Ioffe, A.; Richter, D.; Brückel, T.
Probing lateral magnetic nanostructures by polarized GISANS
Physica B **397** (2007), 43 - 46
269. Köbler, U.; Hoser, A.; Mueller, R.; Fischer, K.
Complex critical magnetic behaviour in three dimensions
Journal of Magnetism and Magnetic Materials **315** (2007), 12 - 25
270. Köbler, U.; Hoser, A.
Critical magnetic behaviour in one and two dimensions
Journal of Magnetism and Magnetic Materials **311** (2007), 523 - 529
271. Köbler, U.; Hoser, A.
First order spin flop transition in yttrium iron garnet (YIG)
Solid State Communications **142** (2007), 350 - 354
272. Köbler, U.; Hoser, A.
The crossover from atomistic to continuous dynamic symmetry at the magnetic phase transition
Solid State Communications **142** (2007), 600 - 604
273. Köbler, U.; Hoser, A.*
The impact of renormalization group theory on magnetism
Eur. Phys. J. B **60** (2007), 151 - 159
274. Köbler, U.; Thomas, C.
Universality in the heat capacity of magnetic and superconducting solids for T → 0
Physica B **395** (2007), 39 - 47
275. Kozhevnikov, S.*; Ott, F.*; Kentzinger, E.; Paul, A.
Enhanced off-specular scattering in magnetic neutron waveguides
Physica B **397** (2007), 68 - 70
276. Li, H.; Su, Y.; Perßon, J.; Meuffels, P.; Walter, J.*; Skowronek, R.; Brückel, T.
Correlation between structural and magnetic properties of La_{7/8}Sr_{1/8}Mn_{1-x}O_{3+δ} with controlled nonstoichiometry
J. Phys.: Condens. Matter **19** (2007), 016003-1 - 016003-12
277. Li, H.; Su, Y.; Perßon, J.; Meuffels, P.; Walter, J.; Skowronek, R.; Brückel, T.
Neutron-diffraction study of structural transition and magnetic order in orthorhombic and rhombohedral La_{7/8}Sr_{1/8}Mn_{1-x}O_{3δ}
J. Phys.: Condens. Matter **19**, 176226-1 - 176226-12 (2007)
278. Mattern, N.*; Gemming, T.*; Goerigk, G.; Eckert, J.*
Phase separation in amorphous Ni-Nb-Y alloys
Scripta Materialia **57** (2007), 29 - 32
279. Paul, A.; Brückel, T.; Kentzinger, E.; Rücker, U.
Magnetization reversal in trained exchange biased multilayers
J. Phys.: Condens. Matter **19** (2007), 086229-1 - 086229-9
280. Paul, A.; Buchmeier, M.; Schneider, C. M.; Brückel, T.
Magnetization reversal via symmetric rotation of layers in exchange biased multilayers
Journal of Applied Physics **101** (2007), 123913-1 - 123913-10
281. Paul, A.; Braak, H.; Bürgler, D.; Schreiber, R.; Rata, D.; Grünberg, P.; Schneider, C. M.; Brückel, T.
- Polarized neutron reflectivity of dilute magnetic semiconductors
Physica B **397** (2007), 59 - 61
282. Paul, A.; Schneider, C. M.; Stahn, J.*
Reversal mechanism and suppression of training in an exchange-coupled system
Physical Review B **76** (2007), 184424-1 - 184424-7
283. Pranzas, P. K.*; Dornheim, M.*; Bösenberg, U.*; Fernandez, J. R. A.*; Goerigk, G.; Roth, S. V.*; Gehrke, R.*; Schreyer, A.*
Small-angle scattering investigations of magnesium hydride used as a hydrogen storage material
Journal of Applied Crystallography **40** (2007) Suppl. 1, s383 - s387
284. Radulescu, A.; Schwahn, D.; Stellbrink, J.; Kentzinger, E.; Fetters, L.*; Richter, D.
Hierarchical structures formed by partially crystalline polymers in solution: from fundamentals to applications - a combined conventional, focusing and ultra-small-angle neutron scattering study
Journal of Applied Crystallography **40** (2007), s97 - s100
285. Rebboah, L.*; Hermann, R. P.; Grandjean, F.*; Hyeon, T.*; An, K.*; Amato, A.*; Long, G. J.*
⁵⁷Fe Mössbauer spectral and muon spin relaxation study of the magnetodynamics of monodispersed gamma-Fe₂O₃ nanoparticles
Physical Review B **76** (2007), 174422-1 - 174422-12
286. Rücker, U.; Kentzinger, E.
Thin film systems: Scattering under grazing incidence
Schriften des FZ Jülich, Materie und Material **34** (2007), D4.1 - D4.46
287. Rzhevsky, A. A.*; Krichevskov, B. B.*; Su, Y.; Schneider, C. M.
Probing the (001) surface of magnetite crystals by second harmonic generation
J. Phys.: Condens. Matter **19** (2007), 396006-1 - 396006-10
288. Schmalzl, K.; Wallacher, D.*; Koza, M. M.*; Rheinstädter, M.*; Strauch, D.*; Knorr, K.*
Dynamics of Argon in confined geometry
Eur. Phys. J. Special Topics **141** (2007), 117 - 120
289. Schmalzl, K.; Strauch, D.*
Static Pockels constants p_{ij} and p_{ijk} of CaF₂ and BaF₂ under strain from *ab initio* calculations
Physical Review B **76** (2007), 205106-1 - 205106-8
290. Schmalzl, K.
Volume and pressure dependence of ground-state and lattice dynamical properties of BaF₂ from density-functional methods
Physical Review B **75** (2007), 014306-1 - 014306-11
291. Schweika, W.; Valldor, M.*; Lemmens, P.*
Approaching the ground state of the kagomé antiferromagnet
Physical Review Letters **98** (2007), 067201-1 - 067201-4
292. Schweika, W.; Hermann, R.; Prager, M.; Perßon, J.; Keppens, V.*
Dumbbell rattling in thermoelectric zinc antimony
Physical Review Letters **99** (2007), 125501-1 - 125501-4
293. Schweika, W.
Magnetic fluctuations: Polarized neutron scattering
Schriften des FZ Jülich, Materie und Material **34** (2007), D2.1 - D2.20
294. Schweika, W.
Polarized neutron scattering
Schriften des FZ Jülich, Materie und Material **38** (2007), 3-1 - 3-23
295. Seeck, O.*; Kentzinger, E.
Continuum description: Grazing incidence neutron scattering
Schriften des FZ Jülich **38** (2007), 5-1 - 5-26
296. Steffens, P.*; Sidis, Y.*; Link, P.*; Schmalzl, K.; Nakatsuji, S.*; Maeno, Y.*; Braden, M.*
Field-Induced Paramagnons at the Metamagnetic Transition of Ca_{1.8}Sr_{0.2}RuO₄
Phys. Rev. Lett. **99** (2007), 217402-1 - 217402-4
297. Su, Y.
Charge and orbital ordering: Resonant x-ray scattering
Schriften des FZ Jülich, Materie und Material **34** (2007), D7.1 - D7.25
298. Temleitner, L.*; Pusztai, L.*; Schweika, W.
The structure of liquid water by polarized neutron diffraction and everse Monte Carlo modelling
J. Phys.: Condens. Matter **19** (2007), 335207-1 - 335207-12
299. Theis-Bröhl, K.*; Toperverg, B.*; Westphalen, A.*; Zabel, H.*; McCord, J.*; Höink, V.*; Schmalhorst, J.*; Reiss, G.*; Weis, T.*; Engel, D.*; Ehresmann, A.*; Rücker, U.
Polarized neutron reflectometry study on a magnetic film with an ion beam imprinted stripe pattern
Superlattices and Microstructures **41** (2007), 104 - 108
300. Vainio, U.*; Pirkkalainen, K.*; Kisko, K.*; Goerigk, G.; Kotelnikova, N.*; Serimaa, R.*

- Copper and copper oxide nanoparticles in a cellulose support studied using anomalous small-angle x-ray scattering
Eur. Phys. J. D **42** (2007), 93 - 101
301. **Varga**, Z.*; Bóta, A.*; Goerigk, G.
Localization of dihalogenated phenols in vesicle systems determined by contrast variation X-ray scattering
Journal of Applied Crystallography **40** (2007), s205 - s208
302. **Voigt**, J.
Magnetic and lattice excitations: Neutron and x-ray spectroscopies
Schriften des FZ Jülich, Materie und Material **34** (2007), D3.1 - D3.19
303. Voigt, J.; Perbon, J.; Kim, J. W.*; Bihlmayer, G.; Brückel, T.
Strong coupling between the spin polarization of Mn and Tb in multiferroic TbMnO₃ determined by x-ray resonance exchange scattering
Physical Review B **76** (2007), 104431-1 - 104431-5
304. **Walter**, W.*; Borlein, M.*; Eyßelein, F.*; Gehring, M.*; Kozielowski, T.; Kramer, A.*; Monkenbusch, M.; Ohl, M.; Paul, A.; Schrauth, B.*; Tiemann, Ch.
Design of a pair of superconducting solenoids for a neutron spin-echo spectrometer at the SNS
IEEE Transactions on Appl. Superconductivity **17**, 2 (2007), 1209 - 1212
305. **Wille**, H.-C.*; Hermann, R. P.; Sergueev, I.*; Leupold, O.*; van der Linden, P.*; Sales, B. C.*; Grandjean, F.*; Long, F. J.*; Rüffer, R.*; Shvyd'ko, Yu. V.*
Antimony vibrations in skutterudites probed by ¹²¹Sb nuclear inelastic scattering
Physical Review B **76** (2007), 140301(R)-1 - 140301(R)-4
306. **Zhang**, F.*; Skoda, M. W. A.*; Jacobs, R. M. J.*; Zorn, S.*; Martin, R. A.*; Martin, C. M.*; Clark, G. F.*; Goerigk, G.; Schreiber, F.*
Gold Nanoparticles Decorated with Oligo(ethylene glycol) Thiols: Protein Resistance and Colloidal Stability
J. Phys. Chem. A **111** (2007), 12229 - 12237
- 2006**
307. **Bedanta**, S.*; Kentzinger, E.; Petracic, O.*; Kleemann, W.*; Rücker, U.; Brückel, T.; Paul, A.; Cardoso, S.*; Freitas, P.*
Modulated magnetization depth profile in dipolarly coupled magnetic multilayers
Physical Review B **74** (2006), 054426-1 - 054426-3
308. **Bhattacharya**, S.*; Hermann, R.; Keppens, V.*; Tritt, T.*; Snyder, G.*
Effect of disorder on the thermal transport and elastic properties in thermoelectric Zn₄Sb₃
Phys. Rev. B **74** (2006), 134108-1 - 134108-5
309. **Brückel**, T.; Speier, W. (Eds.)
Large Scale Facilities for Research with Photons, Neutrons, and Ions
Annual Report "Structure of Matter" 2005, FZ Jülich (2006)
310. Brückel, T.; Richter, D.; Zorn, R. (Eds.)
Neutron Scattering at FRJ-2: Experimental Reports 2005/6
311. **Chen**, J.*; Jung, P.; Nazmy, M.*; Hoffelner, W.*
In situ creep under helium implantation of titanium-aluminium alloy
Journal of Nuclear Materials **352** (2006), 36 - 41
312. Chen, J.; He, Z. Y.; Jung, P.
Microstructure of helium-implanted α -Al₂O₃ after annealing
Acta Materialia **54** (2006), 1607 - 1614
313. **Conrad**, H.
Prospects of a European Spallation Source at Forschungszentrum Jülich
Proceedings of ICANS-XVII, 17th Meeting of the Internat. Collaboration on Advanced Neutron Sources, April 2005, Santa Fe, New Mexico. - Los Alamos National Laboratory, 2006. - (LA-UR-06-3904), Seite 25
314. **Gareev**, R.; Bugoslavsky, Yu.*; Schreiber, R.; Paul, A.; Sperl, M.*; Döppé, M.*
Carrier-induced ferromagnetism in Ge(Mn,Fe) magnetic semiconductor thin-film structures
Applied Physics Letters **88** (2006), 222508-1 - 222508-3
315. **Gatta**, G. D.*; Nestola, F.*; Bromiley, G. D.*; Mattauch, S.
The real topological configuration of the extra-framework content in alkali-poor beryl: A multi-methodological study
American Mineralogist **91** (2006) 29 - 34
316. **Genix**, A.*; Arbe, A.*; Alvarez, F.*; Colmenero, J.*; Schweika, W.; Richter, D.
Local structure of syndiotactic poly(methyl methacrylate). A combined study by neutron diffraction with polarisation analysis and atomistic molecular dynamics simulations
Macromolecules **39** (2006), 3947 - 3958
317. **Goerigk**, G.; Williamson, D.*
Temperature induced differences in the nanostructure of hot-wire deposited silicon-germanium alloys analyzed by anomalous small-angle x-ray scattering
Journal of Applied Physics **99** (2006), 084309-1 - 084309-8
318. **Guenther**, L.*; Peukert, W.*; Goerigk, G.; Dingenouts, N.*
Microstructure formation in dip-coated particulate films
Journal of Colloids and Interface Science **294** (2006), 309 - 320
319. **Henry**, J.*; Vincent, L.*; Avery, X.*; Marini, B.*; Jung, P.
Bending tests on T91 samples implanted with 0.25 at.% helium: Experiments and mechanical analysis
Journal of Nuclear Materials **356** (2006), 78 - 87
320. **Hermann**, R.*; Grandjean, F.*; Keppens, V.*; Schweika, W.; Nolas, G.*; Mandrus, D.*; Sales, B.*; Christen, H.*; Bonville, P.*; Long, G.*
The dynamics of the caged guests in filled germanium clathrates
Materials and Technologies for Direct Thermal-to-Electric Energy Conversion / ed.: J. Yang, T.P. Hogan, R. Funahashi, G.S. Nolas. - Warrendale, PA, MRS, 2006. - (Materials Research Society Symposium proceedings ; 886). - 1-55899-840-3. - S. 389 - 394
321. **Ioffe**, A.
About simultaneous high momentum transfer and high energy resolution measurement in inelastic neutron reflectometry
Journal of Neutron Research **14** (2006), 3, 251 - 256
322. **Jung**, P.; Chen, J.*; Klein, H.
Recovery of tensile properties in helium implanted EUROFER97 by post-implantation annealing
Journal of Nuclear Materials **356** (2006), 88 - 94
323. **Krivchikov**, A.*; Gorodilov, B.*; Korolyuk, O.*; Manzhelii, V.*; Romantsova, O.*; Conrad, H.; Press, W.*; Tse, J.*; Klug, D.*
Thermal conductivity of Xe clathrate hydrate at low temperatures
Physical Review B **73** (2006), 064203-1 - 064203-6
324. **Köbler**, U.; Hoser, A.; Hoffmann, J.*
Crystal field effects in the 3d transition metal compounds
Physica B **382** (2006), 98 - 104
325. Köbler, U.; Hoser, A.
Effective spin description of crystal field effects in NdAl₃
JMMM **299** (2006), 145 - 154
326. Köbler, U.; Schreiber, R.
Exploring the 2D to 3D dimensionality crossover in thin iron films
JMMM **300** (2006), 519 - 524
327. Köbler, U.; Hoser, A.; Hoffmann, J.*; Thomas, C.*
One-dimensional bulk ferromagnet: NdAl₂ and hcp cobalt
Solid State Communications **137** (2006), 301 - 305
328. Li, H.; Yu, G.*; Teng, J.*; Zhu, F.*
Ultrathin high anisotropic magnetoresistance Ni_{0.81}Fe_{0.19} films
J. Phys. D: Appl. Phys. **39** (2006), 4915 - 4919
329. **Long**, G.*; Hermann, R.; Grandjean, F.*; Chacon, C.*; Isnard, O.*
A Mössbauer spectral study of the YCo_{4-x}Fe_xB compounds
J. Phys.: Cond. Matter **18** (2006), 10765 - 10773
330. **Medarde**, M.*; Dallera, C.*; Grioni, M.*; Voigt, J.; Podlesnyak, A.*; Pomjakushina, E.*; Conder, K.*; Neisius, Th.*; Tjernberg, O.*; Barilo, S. N.*
Low-temperature spin-state transition in LaCoO₃ investigated using resonant x-ray absorption at the Co K edge
Physical Review B **73** (2006), 054424-1 - 054424-10
331. **Melnichenko**, Y.*; Wignall, G.*; Cole, D.*; Frielinghaus, H.
Adsorption of supercritical CO₂ in aerogels as studied by small-angle neutron scattering and neutron transmission techniques
Journal of Chemical Physics **124** (2006), 204711
332. **Neupane**, K.*; Cohn, J.*; Terashita, H.; Neumeier, J.*
Doping dependence of polaron hopping energies in La_{1-x}Ca_xMnO₃
Physical Review B **74** (2006), 144428-1 - 144428-5
333. **Oh**, I.*; Merz, M.*; Mattauch, S.; Heger, G.*
Structural phase transition and hydrogen ordering of TiH₂PO₄ at low temperature
Acta Crystallographica B **62** (2006), 719 - 728
334. **Paul**, A.; Kentzinger, E.; Rücker, U.; Bürgler, D.; Brückel, T.
Field-dependent magnetic domain structure in antiferromagnetically coupled multilayers by polarized neutron scattering
Physical Review B **73** (2006), 094441-1 - 094441-8
335. Paul, A.; Kentzinger, E.; Rücker, U.; Brückel, T.
Magnetization reversal with variation of the ratio of the

- anisotropy energies in exchange bias systems
Physical Review B **74** (2006), 054424-1 - 054424-6
336. Paul, A.; Kentzinger, E.; Rücker, U.; Brückel, T.
Symmetry and asymmetry during magnetization reversal in exchange biased multilayers and bilayers
Physical Review B **73** (2006), 092410-1 - 092410-4
337. Paul, A.; Wingbermühle, J.
Surface morphology for ion-beam sputtered Al layer with varying sputtering conditions
Applied Surface Science **252** (2006), 8151 - 8155
338. Paul, A.; Kentzinger, E.; Rücker, U.; Brückel, T.
The angular dependence of the magnetization reversal in exchange biased multilayers
J. Phys.: Condens. Matter **18** (2006), L149 - L153
339. Plakhty, V.*; Wosnitza, J.*; Kulda, J.*; Brückel, T.; Schweika, W.; Visser, D.*; Gavrilov, S.*; Moskvin, E.*; Kremer, R.*; Banks, M.*
Polarized neutron scattering studies of chiral criticality, and new universality classes of phase transitions
Physica B **385 - 386** (2006), 288 - 294
340. Scheweins, R.*; Goerigk, G.; Huber, K.*
Shrinking of anionic polyacrylate coils induced by Ca²⁺, Sr²⁺ and Ba²⁺: A combined light scattering and ASAXS study
Eur. Phys. J. E **21** (2006), 99 - 110
341. Theis-Bröhl, K.*; Wolff, M.*; Westphalen, A.*; Zabel, H.*; McCord, J.*; Höink, V.*; Schmalhorst, J.*; Reiss, G.*; Weis, T.*; Engel, D.*; Ehresmann, A.*; Rücker, U.; Toperverg, B.*
Exchange-bias instability in a bi-layer with an ion beam imprinted stripe pattern of ferromagnetic/antiferromagnetic interfaces
Physical Review B **73** (2006), 174408-1 - 174408-14
342. Varga, Z.*; Bóta, A.*; Goerigk, G.
Localization of Dibromophenol in DPPC/Water Liposomes Studied by Anomalous Small-Angle X-ray Scattering
The Journal of Physical Chemistry B Letters **110** (2006), 11029 - 11032
343. Vetter, S.*; Abetz, V.*; Goerigk, G.; Buder, I.*; Pereira Nunes, S.*
Polyetherketones for fuel cell application
Desalination **199** (2006), 289 - 290
344. Voigt, J.; Kentzinger, E.; Rücker, U.; Schweika, W.; Wermeille, D.*; Schmidt, W.; Brückel, T.
Structural and magnetic properties of [Er/Tb] multilayers
Eur. Phys. J. B **49** (2006), 441 - 451
345. Walter, G.*; Goerigk, G.; Rüssel, C.*
The structure of phosphate glass evidenced by small angle X-ray scattering
Journal of Non-Crystalline Solids **352** (2006), 4051 - 4061
346. Walterfang, M.*; Keune, W.*; Trounov, K.*; Peters, R.*; Rücker, U.; Westerholz, K.*
Magnetic and structural properties of epitaxial c-FeSi-films grown on MgO (100)
Physical Review B **73** (2006), 214423-1 - 214423-10
- 2005**
347. Bauer, G.
Accelerator driven neutron sources - then and now
Report "Development opportunities for small and medium scale accelerator driven neutron sources", IAEA-TECDOC-1439 (2005), 31 - 39
348. Bedanta, S.*; Petracic, O.*; Kentzinger, E.; Kleemann, W.*; Rücker, U.; Paul, A.; Brückel, T.; Cardoso, S.*; Freitas, P.*
Superferromagnetic domain state of a discontinuous metal insulator multilayer
Physical Review B **72** (2005), 024419-1 - 024419-7
349. Blügel, S.; Brückel, T.; Schneider, C. (Eds.)
Magnetism goes Nano
Schriften des FZ Jülich, Materie und Material **26** (2005)
350. Brückel, T.
Elastic Scattering from Many-Body Systems
Schriften des FZ Jülich, Materie und Material **28** (2005), 3-1 - 3-28
351. Brückel, T. (Ed.)
Forschung mit Neutronen in Deutschland - Status und Perspektiven
Strategiepapier des Komitees "Forschung mit Neutronen" KFN (2005)
352. Brückel, T.; Heger, G.; Richter, D.; Zorn, R. (Eds.)
Laboratory Course Neutron Scattering
Schriften des FZ Jülich, Materie und Material **28** (2005)
353. Brückel, T.
Magnetism
Schriften des FZ Jülich, Materie und Material **28** (2005), 16-1 - 19
354. Brückel, T.; Richter, D.; Zorn, R. (Eds.)
Neutron Scattering at FRJ-2: Experimental Reports 2004
355. Brückel, T.
Scattering Techniques II: Magnetic X-Ray Scattering
Schriften des FZ Jülich, Materie und Material **26** (2005), B5.1 - B5-34
356. Chen, J.; Jung, P.; Rödig, M.; Ullmaier, H.; Bauer, G.
Ductility recovery in structural materials for spallation targets by post-irradiation annealing
Journal of Nuclear Materials **343** (2005), 227 - 235
357. Chen, J.; Jung, P.; Ullmaier, H.
Stresses, strains and cracks in a helium-implanted SiC/C composite
Journal of Nuclear Materials **336** (2005), 194 - 200
358. Conrad, H.
Neutron Sources
Schriften des FZ Jülich, Materie und Material **28** (2005), 1-1 - 1-22
359. Conrad, H.
Spectroscopy: 1. The Triple-axis Spectrometer; 2. The Back-scattering Spectrometer
Schriften des FZ Jülich, Materie und Material **28** (2005), 9.1-1 - 9.2-7
360. Dohmen, L.; Thelen, J.; Alefeld, B.
The Neutron Velocity Selector at the Focussing Small Angle Scattering Instrument in Jülich
Journal of Neutron Research **13** (2005), 275 - 280
361. Fröhlich-Schlapp, M.; Ioffe, A.; Conrad, H.; Brückel, T.; Fueß, H.*; von Seggern, H.*
Novel materials and concepts for neutron image plates
Nuclear Instruments & Methods in Physics Research A **551** (2005), 46 - 51
362. Gardner, J.*; Cornelius, A.*; Chang, L.; Prager, M.; Brückel, T.; Ehlers, G.*
Spin dynamics in Ho₂Ru₂O₇
Journal of Physics: Condensed Matter **17** (2005), 7089 - 7095
363. Hecker, M.*; Schneider, C. M.; Mertins, H.*; Rücker, U.; Kentzinger, E.
Magnetic order in Co/Cu multilayers studied by polarized soft X-rays and neutrons
JMMM **286** (2005), 416 - 419
364. Hermann, R.*; Schweika, W.; Leupold, O.*; Rüffer, R.*; Nolas, G.*; Grandjean, F.*; Long, G.*
Neutron and nuclear inelastic scattering study of the Einstein oscillators in Ba, Sr, and Eu-filled germanium clathrates
Physical Review B **72** (2005), 174301-1 - 174301-6
365. Herms, M.*; Irmer, G.*; Verma, P.*; Goerigk, G.
Nondestructive characterization of nanoparticles in solids by Raman spectroscopy and small angle x-ray scattering
Proc. SPIE, Vol. 5766, Testing, Reliability, and Application of Micro- and Nano-Material Systems III; R. E. Geer, N. Meyendorf, G. Y. Baaklini, B. Michel; Eds. (2005), 32 - 39
366. Hirsch, S.; Klein, H.; Jung, P.
Dimensional changes of silica-, borosilicate- and germania-glasses and quartz under irradiation
Journal of Non-Crystalline Solids **351** (2005), 3279 - 3288
367. Jiang, J. Z.*; Roseker, W.*; Gerward, L.*; Goerigk, G.
Is there phase separation in Cu₆₀Ti₂₀Zr₂₀ alloy?
Journal Metastable & Nanocrystalline Materials **24 - 25** (2005), 647-652
368. Jung, P.
Radiation damage in general
Journal of Nuclear Materials **343** (2005), 368 - 369
369. Jung, P.; Henry, J.*; Chen, J.
Tensile properties of candidate structural materials for high power spallation sources at high helium contents
Journal of Nuclear Materials **343** (2005), 275 - 284
370. Kentzinger, E.; Rücker, U.; Paul, A.; Brückel, T.
Layer resolved magnetisation correlations in multilayers
Neutron News **16** (2005), 26 - 29
371. Kravtsov, E.*; Brucas, R.*; Hjörvarsson, B.*; Hoser, A.; McIntyre, G.*; Nefedov, A.*; Radu, F.*; Remhof, A.*; Zabel, H.*
Proximity effect of vanadium on strain and spin-density waves in thin Cr films
JMMM **286** (2005), 425 - 431
372. Köbler, U.; Hoser, A.; Schäfer, W.*
On the temperature dependence of the magnetic excitations
Physica B **364** (2005), 55 - 70

373. Köbler, U.; Hoser, A.
Stable magnetic universality classes for $T \rightarrow 0$
Physica B **362** (2005), 295 - 305
374. Köbler, U.; Kawakami, M.*; Schnelle, W.*
Universal behaviour of the magnetic heat capacity for $T \rightarrow 0$
Physica B **367** (2005), 255 - 266
375. Köbler, U.; Hoser, A.*; Bos, J.; Schäfer, W.*; Pohlmann, L.
Weak ferromagnets with integer and half-integer spin quantum numbers
Physica B **355** (2005), 90 - 99
376. Koppitz, T.; Jung, P.; Müller, G.*; Weisenburger, A.*;
Futakawa, M.*; Ikeda, Y.*
Improved cavitation resistance of structural materials in pulsed liquid metal targets by surface hardening
Journal of Nuclear Materials **343** (2005), 92 - 100
377. Lippmann, M.
The microstructure of confined and thin polymer films
Dissertation (2005), RWTH Aachen
378. Masalovich, S.; Ioffe, A.; Schlapp, M.; von Seggern, H.*;
Küssel, E.; Brückel, T.
Optimization of a neutron image plate detector with low gamma-sensitivity
Nuclear Instr. and Methods in Physics Research A **539** (2005), 236 - 249
379. Narros, A.*; Arbe, A.*; Alvarez, F.*; Colmenero, J.*; Zorn, R.;
Schweika, W.; Richter, D.
Partial Structure Factors in 1,4-Polybutadiene. A Combined Neutron Scattering and Molecular Dynamics Study
Macromolecules **38** (2005), 9847 - 9853
380. Paul, A.; Bürgler, D.; Grünberg, P.
Enhanced exchange bias in ferromagnet/antiferromagnet multilayers
JMMM **286** (2005), 216 - 219
381. Paul, A.; Kentzinger, E.; Rücker, U.; Bürgler, D.; Grünberg, P.
Measurement and simulation of polarised neutron reflectivity and off-specular scattering from evolving magnetic domain structure in Co/Cu multilayers
Physica B **356** (2005), 31 - 35
382. Paul, A.; Kentzinger, E.; Rücker, U.; Bürgler, D.; Grünberg, P.
Nonuniform and sequential magnetisation reversal via domain structure formation for multilayered system with grain size induced enhanced exchange bias
Eur. Phys. J. B **45** (2005), 249 - 260
383. Paul, A.; Kentzinger, E.; Rücker, U.; Bürgler, D.; Grünberg, P.
Polarised neutron scattering from polycrystalline, exchange-biased magnetic multilayers
Physica B **356** (2005), 26 - 30
384. Paul, A.; Buchmeier, M.; Bürgler, D.; Grünberg, P.
Quantitative investigation of FeMn-based spin-valves by rotating field magnetoresistance measurements
JMMM **286** (2005), 258 - 261
385. Paul, A.; Buchmeier, M.; Bürgler, D.; Grünberg, P.
Rotating-field magnetoresistance of exchange-biased spin valves
Journal of Applied Physics **97** (2005), 023910-1 - 023910-6
386. Prado, L.*; Goerigk, G.; Ponce, M.*; Garamus, V.*; Wittich, H.*; Willumeit, R.*; Schulte, K.*; Nunes, S.*
Characterization of Proton-Conducting Organic-Inorganic Polymeric Materials by ASAXS
Journal of Polymer Science B: Polymer Physics **43** (2005), 2981 - 2992
387. Radulescu, A.; Kentzinger, E.; Stellbrink, J.; Dohmen, L.; Alefeld, B.; Rücker, U.; Heiderich, M.; Schwahn, D.; Brückel, T.; Richter, D.
KWS-3: The New (Very) Small-Angle Neutron Scattering Instrument Based on Focusing-Mirror-Optics
Neutron News **16** (2005), 18 - 21
388. Rücker, U.
Magnetisation Configurations and Dynamics
Schriften des FZ Jülich, Materie und Material **26** (2005), D4.1 - D4.30
389. Schneider, C.; Blügel, S.; Brückel, T.
Introduction
Schriften des FZ Jülich, Materie und Material **26** (2005), I-1 - I-12
390. Schweika, W.
Magnetic Excitations and Scattering Experiments
Schriften des FZ Jülich, Materie und Material **26** (2005), D3.1 - D3.16
391. Schweika, W.
Polarisation Analysis
Schriften des FZ Jülich, Materie und Material **28** (2005), 4-1 - 4-25
392. Schweika, W.; Easton, S.; Neumann, K.*
Vector Polarisation Analysis on DNS
Neutron News **16** (2005), 14 - 17
393. Seeck, O.; Kentzinger, E.
Continuum Description: Grazing Incidence Neutron Scattering
Schriften des FZ Jülich, Materie und Material **28** (2005), 6-1 - 6-26
394. Su, Y.
Ordering Phenomena in Complex Transition-Metal Oxides (CTMO)
Schriften des FZ Jülich, Materie und Material **26** (2005), A8.1 - A8.22
395. Tatchev, D.*; Goerigk, G.; Valova, E.*; Dille, J.*; Kranold, R.*; Armanov, S.*; Delplancke, J.*
Investigation of the primary crystallization of Ni-17 at.% P alloy by ASAXS
J. Appl. Cryst. **38** (2005), 787 - 794
396. Tietze-Jaensch, H.; Zorn, R.; Brückel, T.; Richter, D.
Neutron Scattering at the Research Center Jülich
Neutron News **16** (2005), 11 - 13
397. Torma, V.*; Peterlik, H.*; Bauer, U.*; Rupp, W.*; Hüsing, N.*; Bernstorff, S.*; Steinhart, M.*; Goerigk, G.; Schubert, U.*
Mixed Silica Titania Materials Prepared from a Single-Source Sol-Gel Precursor: A Time-Resolved SAXS Study of the Gelation, Aging, Supercritical Drying, and Calcination Processes Chemistry of Materials **17** (2005), 3146 - 3153
398. Udyansky, A.*; Bugaev, V.*; Schweika, W.; Shchyglo, O.*; Reichert, H.*; Dosch, H.*
Analytical correlation correction of the chemical potential of solid solutions
Physical Review B **71** (2005), 140201-1 - 140201-4
399. Yao, Z.; Liu, C.; Jung, P.
Diffusion and permeation of deuterium in EUROFER97: Effect of irradiation and of implanted helium
Fusion Science and Technology **48** (2005), 1285 - 1291
- 2004**
400. Bedanta, S.*; Chen, X.*; Sahoo, S.*; Kleemann, W.*; Kentzinger, E.; Nordblad, P.*; Cardoso, S.*; Freitas, P.*
Collective magnetic states of ferromagnetic nanoparticles in the superspin limit
Phys. Stat. Sol. (c) **1**, **12** (2004), 3288 - 3296
401. Bronstein, L.*; Goerigk, G.; Kostylev, M.*; Pink, M.*; Khotina, I.*; Valetsky, P.*; Matveeva, V.*; Sulman, E.*; Sulman, M.*; Bykov, A.*; Lakina, N.*; Spontak, R.*
Structure and Catalytic Properties of Pt-Modified Hyper-Cross-Linked Polystyrene Exhibiting Hierarchical Porosity
J. Phys. Chem. B **108** (2004), 18234 - 18242
402. Chang, L. J.; Mueller, R.; Appelt, S.; Häsing, W.; Ioffe, A.; Brückel, T.
Progress of ^3He spin-exchange for neutron polarization in Jülich
Physica B: Condensed Matter **350** (2004), e707 - e710
403. Chatterji, T.*; Liß, K.*; Tschentscher, T.*; Janossy, B.*; Stremper, J.*; Brückel, T.*
High-energy non-resonant X-ray magnetic scattering from EuAs
Solid State Communications **131** (2004), 713 - 717
404. Chatterji, T.*; Siemensmeyer, K.*; Welzel, S.*; Caliebe, W.
Temperature and field dependence of the magnetic properties of $\text{Nd}_{2-x}\text{Ce}_x\text{CuO}_4$
Eur. Phys. J. B **42** (2004), 205 - 217
405. Conrad, H.; Kuhs, W.*; Nünighoff, K.; Pohl, C.; Prager, M.; Schweika, W.
Inelastic scattering and spectral measurements of advanced cold moderator media
Physica B **350** (2004), e647 - e650
406. Conrad, H.; Nünighoff, K.*; Pohl, C.*; Prager, M.; Kuhs, W. F.*
Inelastic neutron scattering and spectral measurements of advanced cold moderator materials
Schriften des FZ Jülich, Reihe Materie und Material **20** (2004), 113 - 121
407. Conrad, H. (Ed.)
Proceedings of the 6th International Workshop on Advanced Cold Moderators
Schriften des FZ Jülich, Materie und Material **20** (2004)
408. Eckold, G.*; Caspary, D.*; Elter, P.*; Güthoff, F.*; Hoser, A.; Schmidt, W.
Time-resolved phonons as a microscopic probe for demixing processes
Physica B **350** (2004), 83 - 86
409. Fendt, R.*; Sprung, M.*; Gutt, C.*; Seeck, O. H.; Tolan, M.*
X-ray reflectivity study of the influence of temperature

- fluctuations on the density profile of thin liquid films
Z. Kristallogr. **219** (2004), 205 - 209
410. Feygenson, M.; Toperverg, B. P.; Rücker, U.; Kentzinger, E.; Brückel, T.
Neutron quantum well states in Fe/Co/Fe trilayers
Physica B **350** (2004), e233 - e235
411. Goerigk, G.; Schweins, R.*; Huber, K.*
Evidence for Pearl-Necklace Structure in Aqueous Solution of Polyacrylate Chains with Sr²⁺-Counterions
HASYLAB Newsletter 2004-10-01 (2004), http://www-hasylab.desy.de/newsletter/2004_10_01.htm
412. Goerigk, G.; Schweins, R.*; Huber, K.*; Ballauff, M.*
The distribution of Sr²⁺ counterions around polyacrylate chains analyzed by anomalous small-angle X-ray scattering
Europhysics Letters **66** (2004), 331 - 337
413. Ioffe, A.; Manoshin, S.*
A neutron spin-echo spectrometer based upon thin magnetic film flippers: the simulation of performance
Physica B **345** (2004), 235 - 238
414. Ioffe, A.; Brückel, T.; Bodnarchuk, V.*; Yaradajkin, S.*; Belushkin, A.*
Development of NSE-based methods of medium-resolution neutron spectroscopy at IBR-2
Proc. German-JINR User Meeting "Condensed Matter Physics with Neutrons at the IBR-2 pulsed reactor", Dubna, Russia, (2004), 12 - 18
415. Ioffe, A.; Bussmann, K.; Dohmen, L.; Axelrod, L.*; Gordeev, G.*; Brückel, T.
LAP-ND: a new instrument for vector polarisation analysis and neutron depolarisation measurements at FRJ-2
Physica B **350** (2004), e815 - e818
416. Ioffe, A.; Manoshin, S.*
Larmor labelling by thin spin flippers with rotating magnetic field: simulations of performance of neutron scattering instruments
Nuclear Instruments & Methods in Physics Research A **529** (2004), 45-49
417. Ioffe, A.
Larmor labelling, polarisation analysis and its applications
Nuclear Instruments & Methods in Physics Research A **529** (2004), 39-44
418. Ioffe, A.
Neutron speed echo add-on to TAS: an increase in energy resolution without the use of polarized neutrons
JMMM **272 - 276** (2004), 2136 - 2137
419. Jung, P.; Panaitov, G.
Development of off-beam pressure pulse generators
ISSN 1433-559X; ESS 03-168-T (2004)
420. Kentzinger, E.; Dohmen, L.; Alefeld, B.; Rücker, U.; Stellbrink, J.; Ioffe, A.; Richter, D.; Brückel, T.
KWS-3, the new focusing-mirror ultra small-angle neutron scattering instrument and reflectometer at Jülich
Physica B **350** (2004), e779 - e781
421. Knaapila, M.*; Kisko, K.*; Lyons, B.*; Stepanyan, R.*; Foreman, J.*; Seeck, O.; Vainio, U.*; Pålsson, L.*; Serimaa, R.*; Torkkeli, M.*; Monkman, A.*
Influence of Molecular Weight on Self-Organisation, Uniaxial Alignment, and Surface Morphology of Hairy-Rodlike Polyfluorene in Thin Films
J. Phys. Chem. B **108** (2004), 10711 - 10720
422. Köbler, U.; Hoser, A.
Universal temperature dependence of the magnetic excitations
JMMM **272 - 276** (2004), 342 - 343
423. Krause, B.*; Dürr, A.*; Schreiber, F.*; Dosch, H.*; Seeck, O.
Late growth stages and post-growth diffusion in organic epitaxy. PTCDA on Ag(111)
Surface Science **572** (2004), 385 - 395
424. Krause, B.*; Schreiber, F.*; Dosch, H.*; Pimpinelli, A.*; Seeck, O.
Temperature dependence of the 2D-3D transition in the growth of PTCDA on Ag(111): A real-time X-ray and kinetic Monte-Carlo study
Europhys. Lett. **65** (2004), 372 - 378
425. Liu, C.; Klein, H.; Jung, P.
Embrittlement of RAFM EUROFER97 by Implanted Hydrogen
Journal of Nuclear Materials **335** (2004), 77 - 82
426. Mehaddene, T.*; Kentzinger, E.; Hennion, B.*; Tanaka, K.*; Numakura, H.*; Marty, A.*; Parasote, V.*; Cadeville, M. C.*; Zemirli, M.*; Pierron-Bohnes, V.*
Lattice dynamics and migration enthalpies in CoPt₃ and FePd
Physical Review B **69** (2004), 024304-1 - 024304-13
427. Nünighoff, K.; Pohl, Ch.; Bollini, V.; Bubak, A.; Conrad, H.; Filges, D.; Glückler, H.; Goldenbaum, F.; Hansen, G.; Lensing, B.; Neef, R.; Paul, N.; Prasuhn, D.; Pysz, K.; Schaaf, H.; Soltner, H.; Stelzner, H.; Tietze-Jaensch, H.; Bernnat, W.*; Keinert, J.*; Mattes, M.*; Ninaus, W.*; Koulikov, S.*; Smirnov, A.*; Wohlmuther, M.*
Ice moderator experiments at very low temperatures
Eur. Phys. J. A **22** (2004), 519 - 528
428. Nünighoff, K.; Conrad, H.; Filges, D.; Goldenbaum, F.; Neef, R.; Pohl, Ch.; Schaaf, H.; Stelzner, H.; Tietze-Jaensch, H.; Paul, N.; Wohlmuther, W.; Ninaus, W.*; Smirnov, A.*
The JESSICA Experiment I: Improvements of the JESSICA-Experiment
Schriften des FZ Jülich, Materie und Material **20** (2004), 155 - 160
429. Paul, A.; Kentzinger, E.; Rücker, U.; Bürgler, D.; Grünberg, P.
Sequence, symmetry and magnetic fluctuations of the magnetisation reversal in exchange-biased multilayers
Physical Review B **70** (2004), 224410-1 - 224410-5
430. Pohl, Ch.; Conrad, H.; Filges, D.; Goldenbaum, F.; Neef, R.; Nünighoff, K.; Schaaf, H.; Stelzner, H.; Tietze-Jaensch, H.; Paul, N.; Wohlmuther, W.; Ninaus, W.*; Smirnov, A.*
The JESSICA Experiment - Part II: Results from the JESSICA-Experiment
Schriften des FZ Jülich, Materie und Material **20** (2004), 175 - 181
431. Rücker, U.; Demokritov, S.*; Nassar, J.*; Grünberg, P.
Magnetic interlayer coupling across semiconducting EuS layers
Europhys. Lett. **66** (2004), 736 - 742
432. Sato, K.*; Schweika, W.; Dederichs, P. H.; Katayama-Yoshida, H.*
Low-temperature ferromagnetism in (Ga, Mn)N: Ab initio calculations
Physical Review B **70** (2004), 201202-1 - 201202-4
433. Schlapp, M.*; Hoelzel, M.*; Gilles, R.*; Ioffe, A.; Brückel, T.; Fuess, H.*; von Seggern, H.*
Novel type of neutron image plates based on KCl:Eu²⁺ - LiF
Physica B **350** (2004), e861 - e864
434. Schlapp, M.; Conrad, H.; von Seggern, H.*
Pixelated Neutron Image Plates
J. Phys. D: Appl. Phys. **37** (2004), 2607 - 2612
435. Schweika, W.
Scattering Experiments
Schriften des FZ Jülich, Materie und Material **19** (2004), B1.1 - B1.29
436. Schweika, W.; Reichert, H.*; Babik, W.; Klein, O.*; Engemann, S.*
Strain-induced incomplete wetting at CuAu (001)-surfaces
Physical Review B **70** (2004), 041401-1 - 041401-4
437. Steriotis, T.*; Stefanopoulos, K.*; Kanellopoulos, N.*; Mitropoulos, A.*; Hoser, A.
Structure of adsorbed CO₂ in carbon nanopores: a neutron diffraction study
Colloids and Surfaces A: Physicochem. Eng. Aspects **241** (2004), 239-244
438. Stremper, J.*; Rütt, U.*; Bayrakci, S. P.*; Brückel, T.; Jauch, W.*
Magnetic properties of transition metal fluorides MF₂ (M = Mn, Fe, Co, Ni) via high-energy photon diffraction
Physical Review B **69** (2004), 014417-1 - 014417-9
439. Su, Y.; Istomin, K.; Wermeille, D.*; Fattah, A.; Foucart, P.; Meuffels, P.; Hupfeld, D.; Brückel, T.
Re-examination of charge and orbital ordering in lightly doped La_{1-x}Sr_xMnO₃ by X-ray scattering
JMMM **272 - 276** (2004), e291 - e292
440. Voigt, J.; Kentzinger, E.; Rücker, U.; Wermeille, D.*; Hupfeld, D.; Schweika, W.; Schmidt, W.; Brückel, T.
Direct observation of the interlayer exchange coupling mechanism in a magnetic [Er/Tb] multilayer
Europhys. Lett. **65** (2004), 560 - 566
441. Walter, G.*; Hoppe, U.*; Vogel, J.*; Hartmann, P.*; Goerigk, G.
A structural study of anomalous phosphate glasses
Proceedings of the XX ICG in Kyoto (2004), 1 - 6

2003

442. Andreassen, J.*; Rasmussen, O.*; Feidenhans, R.*; Berg Rasmussen, F.*; Christensen, R.*; Molenbroek, A.*; Goerigk, G.
An in situ cell for small-angle scattering experiments on nano-structured catalysts
J. Appl. Cryst. **36** (2003), 812 - 813
443. Babik, W.
Grenzflächenmorphologie von GMR- und TMR-

- Schichtsystemen
Berichte des FZ Jülich **4034** (2003)
444. Babik, W.
Grenzflächenmorphologie von GMR- und TMR-Schichtsystemen
Dissertation RWTH Aachen (2003)
445. Brückel, T.
Elastic Scattering from Many-Body Systems
Schriften des FZ Jülich, Reihe Materie und Material **15** (2003), 3-1 - 3-28
446. Brückel, T.; Heger, G.; Richter, D.; Zorn, R. (Eds.)
Laboratory Course Neutron Scattering
Schriften des FZ Jülich, Reihe Materie und Material **15** (2003)
447. Brückel, T.
Magnetic X-ray Scattering: Status and Perspectives
Proc. Workshop Scientific Applications of Energy-Recovery-Linac-Driven Synchrotron Light Sources, Univ. Erlangen (27. - 29.09.2002), 187 - 203
448. Brückel, T.
Magnetism
Schriften des FZ Jülich, Materie und Material **15** (2003), 16-1 – 16-19
449. Brückel, T.; Richter, D.; Tietze-Jaensch, H.; Zorn, R. (Eds.)
Neutron Scattering at FRJ-2: Experimental Reports 2003
450. Brückel, T.
Neutrons in Germany and Europe: Quo Vadis?
Neutron News **14** (2003), 2 - 3
451. Brückel, T.
Proceedings of the Fourth International Workshop on Polarised Neutrons for Condensed Matter Investigations PNCMI 2002 held in Julich, Germany 16-19 September 2002 - Preface
Physica B: Condensed Matter **335** (2003), VII
452. Brückel, T.; Eccleston, R.*; Lauter, H.*; Maleyev, S.*; Rekveldt, T.*; Schreyer, A.*; Schweizer, J.*; Toperverg, B.
Polarized neutron methods and instrumentation for pulsed sources
Physica B **335** (2003), 143 - 146
453. Byloos, C.
On the Structural Integrity of the Container for a Liquid Metal Spallation Target under High Power Pulsed Proton Irradiation
Berichte des Forschungszentrums Jülich **4039** (2003)
454. Caspary, D.*; Eckold, G.*; Elter, P.*; Gibhardt, H.*; Güthoff, F.*; Demmel, F.*; Hoser, A.; Schmidt, W.; Schweika, W.
The influence of demixing on the dynamics of ionic solids: inelastic neutron scattering from $\text{Ag}_x\text{Na}_{1-x}\text{Cl}$ single crystals
J. Phys.: Condens. Matter **15** (2003), 6415 - 6426
455. Conrad, H.; Matzerath, T.*; Soukhanov, V.*; Stelzer, H.*
A concept for horizontal moderator handling and exchangeable decouplers between the ESS cold and thermal moderators
Proceedings of the 16th Meeting of the International Collaboration on Advanced Neutron Sources (2003), 613 - 616
456. Conrad, H.
Experiments on Neutron Leakage Currents and Moderator Storage Times of Various Spallation Target - Moderator - reflector Assemblies
Journal of Neutron Research **11** (2003), 69 - 82
457. Conrad, H.; Kuhs, W. F.*; Nünighoff, K.*; Pohl, C.*; Prager, M.
Inelastic neutron scattering and spectral measurements of advanced cold moderator materials
Proceedings of the 16th Meeting of the International Collaboration on Advanced Neutron Sources (2003), 921 - 929
458. Conrad, H.
Neutron Sources
Schriften des FZ Jülich, Reihe Materie und Material **15** (2003), 1-1 - 1-15
459. Danilkin, S.*; Skomorokhov, A.*; Hoser, A.; Fuess, H.*; Rajevac, V.*; Bickulova, N.*
Crystal structure & lattice dynamics of superionic copper selenide $\text{Cu}_{2.6}\text{Se}$
Journal of Alloys and Compounds **361** (2003), 57 - 61
460. Dingenuots, N.*; Merkle, R.*; Guo, X.*; Narayanan, T.*; Goerigk, G.; Ballauff, M.*
Use of anomalous small-angle X-ray scattering for the investigation of highly charged colloids
J. Appl. Cryst. **36** (2003), 578 - 582
461. Duerr, A.*; Schreiber, F.*; Kelsch, M.*; Carstanjen, H.*; Dosch, H.*; Seeck, O.
Morphology and interdiffusion behavior of evaporated metal films on crystalline diindenoperylene films
Journal of Applied Physics **93** (2003), 5201 - 5209
462. Goerigk, G.; Haubold, H.; Lyon, O.*; Simon, J.*
Anomalous small-angle X-ray scattering in materials science
J. Appl. Cryst. **36** (2003), 425 - 429
463. Hense, K.*; Gratz, E.*; Lindbaum, A.*; Michor, H.*; Nowotny, H.*; Güthoff, F.; Hoser, A.; Knoll, P.*
Lattice dynamics of YC_2
Journal of Alloys and Compounds **349** (2003), 28 - 36
464. Hermann, R.*; Jin, R.*; Schweika, W.; Grandjean, F.*; Mandrus, D.*; Sales, B.*; Long, G.*
Einstein Oscillators in Thallium Filled Antimony Skutterudites
Physical Review Letters **90** (2003), 135505-1 - 135505-4
465. Ioffe, A.
Neutron speed echo spectroscopy
in *Neutron Spin Echo Spectroscopy*, Springer Verlag (2003) 142-164. eds. F. Mezei, C. Pappas, T. Gutberlet
466. Ioffe, A.; Brückel, T.
Polarized Neutron School and Workshop Held in Jülich
Neutron News **14** (2003), 13 - 14
467. Ioffe, A.
Wide angle high-resolution spectroscopy at pulsed neutron sources
Physica B **335** (2003), 169 - 173
468. Istomin, K.
Interplay between Charge, Spin and Orbital Ordering in $\text{La}_{1-x}\text{Sr}_x\text{MnO}_3$ Manganites
Dissertation Physik, RWTH Aachen (2003)
469. Jung, P.; Henry, J.*; Chen, J.; Brachet, J.*
Effect of implanted helium on tensile properties and hardness of 9 % Cr martensitic stainless steels
Journal of Nuclear Materials **318** (2003), 241 - 248
470. Kampmann, R.*; Haese-Seiller, M.*; Kudryashov, V.*;
Deriglazov, V.*; Syromiatnikov, V.*; Tristl, M.*; Toperverg, B.; Okorokov, A.*; Schreyer, A.*; Sackmann, E.*
Perspectives for polarised reflectometry at the novel reflectometer REFSANS at FRM-II in Munich/Germany
Physica B **335** (2003), 274 - 277
471. Kentzinger, E.; Rücker, U.; Toperverg, B.; Brückel, T.
Determination of the magnetic fluctuations in an Fe/Cr/Fe trilayer exhibiting a neutron resonance state
Physica B **335** (2003), 89 - 94
472. Kentzinger, E.; Rücker, U.; Toperverg, B.
Simulations of off-specular scattering of polarized neutrons from laterally patterned magnetic multilayers
Physica B **335** (2003), 82 - 88
473. Klimko, S.*; Stadler, C.*; Böni, P.*; Currat, R.*; Demmel, F.*; Fäk, B.*; Gähler, R.*; Mezei, F.*; Toperverg, B.
Implementation of a zero-field spin-echo option at the three-axis spectrometer IN3 (ILL, Grenoble) and first application for measurements of phonon line widths in superfluid ^4He
Physica B **335** (2003), 188 - 192
474. Knaapila, M.*; Torkkeli, M.*; Jokela, K.*; Kisko, K.*; Horsburgh, L.*; Palsson, L.*; Seeck, O.; Dolbnja, I.*; Bras, W.*; ten Brinke, G.*; Monkman, A.*; Ikkala, O.*; Serimaa, R.*
Diffraction analysis of highly ordered smectic supramolecules of conjugated rodlike polymers
Journal of Applied Crystallography **36** (2003), 702 - 707
475. Knaapila, M.*; Lyons, B.*; Kisko, K.*; Foreman, J.*; Vainio, U.*; Mihaylova, M.; Seeck, O.; Pålsson, L.*; Serimaa, R.*; Torkkeli, M.*; Monkman, A.*
X-ray Diffraction Studies of Multiple Orientation in Poly(9,9-bis(2-ethylhexyl)fluorene-2,7-diyl) Thin Films
J. Phys. Chem. B **107** (2003), 12425 - 12430
476. Köbler, U.; Hoser, A.; Hupfeld, D.
A complete description of the order parameter of Heisenberg-type magnets for $0 < T < T_c$
Physica B **328** (2003), 276 - 282
477. Köbler, U.; Englisch, J.*; Hupe, O.*; Hesse, J.*
Effective spin quantum numbers in iron, cobalt and nickel
Physica B **339** (2003), 156 - 163
478. Koga, T.*; Seo, Y.*; Jerome, J.*; Ge, S.*; Rafailovich, M.*; Sokolov, J.*; Chu, B.*; Seeck, O.; Tolan, M.*; Kolb, R.*
Low-density polymer thin film formation in supercritical carbon dioxide
Applied Physics Letters **83** (2003), 4309 - 4311
479. Koppitz, T.; Jung, P.
Surface hardening of martensitic steels to reduce cavitation erosion in the target container wall
ESS 03-157-T (2003) ISSN 1433-559X
480. Kranold, R.*; Kriesen, S.*; Haselhoff, M.*; Weber, H.*; Goerigk, G.
Small-angle X-ray scattering study of the growth kinetics of CuCl nanocrystals in NaCl
J. Appl. Cryst. **36** (2003), 410 - 414
481. Krause, B.*; Dürr, A.*; Schreiber, F.*; Dosch, H.*; Seeck, O.
Thermal stability and partial dewetting of crystalline organic thin

- films: 3,4,9,10-perylenetetracarboxylic dianhydride on Ag(111) Journal of Chemical Physics **110** (2003), 3429 - 3435
482. Lauter,H.*;Lauter-Pasyuk,V.*;Toperverg,B.;Romashev,L.*; Milyaev, M.*; Krinitsina,T.*; Kravtsov,E.*; Ustinov,V.*; Petrenko,A.*; Aksenov, V.* Domains and interface roughness in Fe/Cr multilayers: influence on the GMR effect JMMM **258 - 259** (2003), 338 - 341
483. Lauter, H.*; Lauter-Pasyuk, V.*; Toperverg, B.; Rücker, U.; Milyaev, M.*; Romashev, L.*; Krinitsyna, T.*; Ustinov, V.* Layer magnetization evolution in an Fe/Cr multilayer with uniaxial anisotropy Physica B **335** (2003), 59 - 62
484. Lauter-Pasyuk, V.*; Lauter, H.*; Toperverg, B.; Romashev, L.*; Milyaev, M.*; Petrenko, A.*; Aksenov, V.*; Ustinov, V.* Ordering in magnetic multilayers by off-specular neutron scattering JMMM **258 - 259** (2003), 382 - 387
485. Lee, W.*; Klose, F.*; Yin, H.*; Toperverg, B. Measuring lateral magnetic structures in thin films using time-of-flight polarized neutron reflectometry Physica B **335** (2003), 77 - 81
486. Lee, D.*; Shin, K.*; Seeck, O.; Kim, H.*; Seo, Y.*; Tolan, M.*; Rafailovich, M.*; Sokolov, J.*; Sinha, S.* X-ray scattering from freestanding polymer films with geometrically curved surfaces Physical Review Letters **90** (2003), 185503-1 - 185503-4
487. Lima, E.*; Wegener, J.*; Dalle Donne, C.*; Goerigk, G.; Wroblewski, T.*; Buslaps, T.*; Pyzalla, A.*; Reimers, W.* Dependence of the microstructure, residual stresses and texture of AA 6013 friction stir welds on the welding process Z. Metallkd. **94** (2003), 908 - 915
488. Mank, G.; Conrad, H. ICANS-XVI Book of Abstracts (2003)
489. Mank, G.; Conrad, H. ICANS-XVI Proceedings of the 16th Meeting of the International Collaboration on Advanced Neutron Sources (2003), Vol. I - III
490. Mueller, R.; Chang, L.; Appelt, S.; Haesing, W.; Horriar-Esser, C.; Ioffe, A.; Brückel, T. Progress in the production of polarized ³He in Jülich Physica B **335** (2003), 278 - 281
491. Nünighoff, K.*; Bayer, N.*; Bernnat, W.*; Bollini, V.*; Bubak, A.*; Conrad, H.; Filges, D.*; Goldenbaum, F.*; Hinssen, H.*; Neef, R.*; Ninaus, W.*; Pyzs, K.*; Keinert, J.*; Kuolikov, S.*; Lensing, B.*; Mattes, M.*; Matzerath, Th.*; Paul, N.*; Pohl, C.*; Schaal, H.*; Smirnov, A.*; Soltner, H.*; Stelzer, H.*; Tietze-Jaensch, H.*; Wohlmuther, M.*; Wolters, J.* Investigation of the Neutronic Performance of Advanced Cold Moderators and Validation of New Evaluated S(α,β) Neutron Scattering Kernels Proceedings of the 16th Meeting of the International Collaboration on Advanced Neutron Sources (2003), 883 - 891
492. Prado, L.*; Wittich, H.*; Schulte, K.*; Goerigk, G.; Garamus, V.*; Willumeit, R.*; Vetter, S.*; Ruffmann, B.*; Nunes, S.* Anomalous Small-Angle X-Ray Scattering Characterization of Composites Based on Sulfonated Poly(ether ether ketone), Zirconium Phosphates, and Zirconium Oxide Journal of Polymer Science: Part B: Polymer Physics **42** (2003), 567 - 575
493. Ritva, S.*; Torkkeli, M.*; Paananen, A.*; Linder, M.*; Kisko, K.*; Knaapila, M.*; Ikkala, O.*; Vnorimaa, E.*; Lemmetyinen, H.*; Seeck, O. Self-assembled structure of hydrophobins HFBI and HFBII Journal of Applied Crystallography **36** (2003), 499 - 502
494. Schlapp, M. Entwicklung hocheffizienter, gamma-insensitiver Detektormaterialien und Bildplatten für Neutronen Dissertation Materialwissenschaften, TU Darmstadt (2003)
495. Schlapp, M. Entwicklung hocheffizienter, gamma-insensitiver Detektormaterialien und Bildplatten für Neutronen Berichte des Forschungszentrums Jülich **4076** (2003)
496. Schwahn, D.; Schweika, W. Neutron Scattering Experiments at the Research Reactor in Jülich Forschungszentrum Jülich (2003)
497. Schweika, W. Polarization Analysis Schriften des FZ Jülich, Reihe Materie und Material **15** (2003), 4-1 - 4-25
498. Schweika, W. Time-of-flight and Vector Polarization Analysis for Diffuse Neutron Scattering Proc. 16th Meeting of the Internat. Collaboration on Advanced Neutron Sources (2003), 199 - 206
499. Schweika, W. Time-of-flight and vector polarization analysis for diffuse neutron scattering Physica B **335** (2003), 157 - 163
500. Seeck, O. Analysis by Diffraction and Fluorescence Methods Nanoelectronics and Information Technology, Wiley-VCH, Weinheim (2003) ed. by R. Waser, 275 - 296
501. Seeck, O. Continuum Description: Grazing Incidence Neutron Scattering Schriften des FZ Jülich, Reihe Materie und Material **15** (2003), 6-1 - 6-18
502. Tietze-Jaensch, H.*; Butzek, M.*; Clausen, K.*; Conrad, H.; Eccleston, R. S.*; Filges, D.*; Goldenbaum, F.*; Gutberlet, T.*; Mezei, F.* The ESS Moderator Concept and Instrument Layout of the Short Pulse and Long Pulse Target Station Proceedings of the 16th Meeting of the International Collaboration on Advanced Neutron Sources (2003), 267 - 278
503. Toperverg, B. Optical theorem, depolarization and vector tomography Physica B **335** (2003), 174 - 182
504. Voigt, J. Magnetische Strukturen in [Er/Tb]-Schichtsystemen: Einfluß der magnetischen Nachbarschaft und konkurrierender Anisotropien Dissertation RWTH Aachen (2003)
505. Voigt, J. Magnetische Strukturen in [Er/Tb]-Schichtsystemen: Einfluß der magnetischen Nachbarschaft und konkurrierender Anisotropien Berichte des FZ Jülich **4087** (2003)
506. Vorobiev, A.*; Axelrod, L.*; Gordeev, G.*; Major, J.*; Zabenkin, V.*; Toperverg, B. Ferrofluid magnetization in the bulk and in the vicinity of an interface to Si Physica B **335** (2003), 95 - 98
507. Walter, G.*; Kranold, R.*; Enke, D.*; Goerigk, G. Small-angle X-ray scattering characterization of porous glasses J. Appl. Cryst. **36** (2003), 592 - 596
508. Wild, E.*; Wang, L.*; Hasse, B.*; Wroblewski, T.*; Goerigk, G.; Pyzalla, A.* Microstructure alterations at the surface of a heavily corrugated rail with strong ripple formation Wear **254** (2003), 876 - 883
509. Ziegenhagen, N.; Rücker, U.; Kentzinger, E.; Lehmann, R.*; van der Hart, A.*; Toperverg, B.; Brückel, T. Magnetic properties of laterally structured Fe/Cr multilayers Physica B **335** (2003), 50 - 53
- ## 2002
510. Angermund, K.*; Bühl, M.*; Dinjus, E.*; Endruschat, U.*; Gassner, F.*; Haubold, H.-G.; Hormes, J.*; Köhl, G.*; Mauschick, F.*; Modrow, H.*; Mörtel, R.*; Mynott, R.*; Tesche, B.*; Vad, T.; Waldöfner, N.*; Bönnemann, H.* Nanoscopic Pt Colloids in the "Embryonic State" Angew. Chem. Int. Ed. **41** (2002), 4041 - 4044
511. Angermund, K.*; Bühl, M.*; Dinjus, E.*; Endruschat, U.*; Gassner, F.*; Haubold, H.; Hormes, J.*; Köhl, G.*; Mauschick, F.*; Modrow, H.*; Mörtel, R.*; Mynott, R.*; Tesche, B.*; Vad, T.; Waldöfner, N.*; Bönnemann, H.* Nanoskopische Pt-Kolloide im "embryonalen Stadium" Angew. Chemie **114** (2002), 4213 - 4216
512. Becker, P.*; Bettin, H.*; Kuettgens, U.*; Basile, G.*; Riemann, H.*; Ammon, W. V.*; Goerigk, G. The influence of hydrogen and nitrogen on the floating zone growth of ultra-pure silicon crystals Conference Digest - Conference on Precision Electromagnetic Measurements, 23rd, Ottawa, ON, Canada, (2002), 564-565; Publisher: Institute of Electrical and Electronics Engineers, New York, N. Y.
513. Bönnemann, H.*; Waldöfner, N.*; Haubold, H.; Vad, T. Preparation and Characterization of Three-Dimensional Pt Nanoparticle Networks Chem. Mater. **14** (2002), 1115 - 1120
514. Bóta, A.*; Goerigk, G.; Drucker, T.*; Haubold, H.; Petró, J.* Anomalous Small-Angle X-Ray Scattering on a New, Nonpyrophoric Raney-Type Ni Catalyst Journal of Catalysis **205** (2002), 354 - 357

515. Brückel, T.
Magnetic x-ray and polarised neutron scattering
Schriften des FZ Jülich, Materie und Material **12** (2002) 323 - 357
516. Brückel, T.; Schweika, W. (Eds.)
Polarised neutron scattering: lectures
Schriften des FZ Jülich, Materie und Material **12** (2002)
517. Brückel, T.
Scattering
Schriften des FZ Jülich, Materie und Material **10** (2002), A1.1 - A1.35
518. Chen, J.; Romanzetti, S.*; Sommer, W. F.*; Ullmaier, H.
Helium bubble formation in 800 MeV proton-irradiated 304L stainless steel and alloy 718 during post-irradiation annealing
Journal of Nuclear Materials **304** (2002), 1 - 7
519. Doan, T.*; Ott, F.*; Menelle, A.*; Humbert, P.*; Fermon, C.*; Prejbeanu, I.*; Rücker, U.
New evanescent neutron wave diffractometer at LLB
Appl. Phys. A **74** (2002), S186 - S188
520. Elter, P.*; Eckold, G.*; Caspary, D.*; Güthoff, F.*; Hoser, A.
Time-evolution of phonon spectra during decomposition in Ag_{1-x}Br ionic crystals
Appl. Phys. A **74** (2002), S1169 - S1171
521. Fermon, C.; Suck, J.; Toperverg, B.; Vettier, C.; Zabel, H.
Microsystems and Information Technologies
New Science and Technology for the 21st Century, The ESS Project Volume II (2002), 6 - 7
522. Guilleaume, B.*; Blaup, J.*; Ballauff, M.*; Wittemann, M.*; Rehahn, M.*; Goerigk, G.
The distribution of counterions around synthetic rod-like polyelectrolytes in solution
Eur. Phys. J. E **8** (2002), 299 - 309
523. Henry, J.*; Jung, P.; Chen, J.; Brachet, J.*
Tensile properties and microstructure of 9Cr-1Mo martensitic steels containing a high helium concentration
J. Phys. IV France **12** (2002), Pr8-103 - Pr8-120
524. Herms, M.*; Irmer, G.*; Goerigk, G.; Bedel, E.*; Claverie, A.*
Precipitation in low temperature grown GaAs
Materials Science and Engineering **B91 - 92** (2002), 466 - 469
525. Hoelzel, M.*; Danilkin, S. A.*; Hoser, A.; Ehrenberg, H.*; Wieder, T.*; Fuess, H.*
Phonon dispersion in austenitic stainless steel Fe-18Cr-12Ni-2Mo
Appl. Phys. A **74** (2002), S1013 - S1015
526. Hupfeld, D.; Schweika, W.; Strempfer, J.*; Caliebe, W.; Köbler, U.; Mattenberger, K.*; McIntyre, G.*; Yakhou, V.*; Brückel, T.
Element-specific magnetic long- and short-range order and competing interactions in Gd_xEu_{1-x}S
Eur. Phys. J. B **26** (2002), 273 - 289
527. Hupfeld, D.; Seeck, O.; Voigt, J.; Bos, J.; Fischer, K.; Brückel, T.
X-ray resonance exchange scattering from ferromagnets: A new approach and its application to EuS
Europhys. Lett. **59** (2002), 284 - 290
528. Ihrlinger, J.; Brückel, T.
Wolfram Prandtl (1935 - 2001)
J. Appl. Cryst. **35** (2002), 143
529. Ioffe, A.; Vrana, M.*
A new neutron interferometry approach in the determination of the neutron-electron interaction amplitude
Appl. Phys. A **74** (2002), S314 - S316
530. Ioffe, A.; Conrad, H.; Zeiske, T.; Mueller, R.; Küssel, E.; Massalovitch, S.; Schlapp, M.; Schmitz, B.; Brückel, T.
A new thermal neutron spectrometer / diffractometer for polarisation analysis (SV30) at the research reactor FRJ-2
Applied Physics A **74** (2002), S107 - S108
531. Jung, P.
Irradiation effects and consequences on in-service properties under proton and neutron mixed spectra: An overview
J. Phys. IV France **12** (2002), Pr8-59 - Pr8-62
532. Jung, P.
Radiation effects in structural materials of spallation targets
J. Nucl. Mater. **301** (2002), 15 - 22
533. Köbler, U.
Temperature dependence of the spontaneous magnetisation of body-centred-cubic bulk iron, amorphous iron and thin iron films
Journal of Physics: Condensed Matter **14** (2002), 8861 - 8880
534. Köbler, U.; Hoser, A.; Fischer, K.; Beyss, M.
The impact of fourth-order exchange interactions on the thermal variation of the order parameter
Appl. Phys. A **74** (2002), S604 - S606
535. Kolb, R.*; Schlapp, M.; Hesse, S.*; Schmeichel, R.*; von Seggern, H.*; Fasel, C.*; Riedel, R.*; Ehrenberg, H.*; Fueß, H.*
The quasi-binary phase diagram BaF₂-BaBr₂ and its relation to the x-ray storage phosphor BaFBr:Eu²⁺
Journal of Physics D: Applied Physics **35** (2002), 1914-1918
536. Lauter, H.; Lauter-Pasyuk, V.; Toperverg, B.; Romashev, L.; Ustinov, V.; Kravtsov, E.; Vorobiev, A.; Nikonorov, O.; Major, J.
Spin-resolved unpolarised neutron off-specular scattering for magnetic multilayer studies
Appl. Phys. A **74** (2002), S1557 - S1559
537. Lauter-Pasyuk, V.*; Lauter, H.*; Toperverg, B.; Petrenko, A.*; Schubert, D.*; Schreiber, J.*; Burcin, M.*; Aksenen, V.*
Interface and surface formation in self-assembled polymer multilayers by off-specular neutron scattering
Appl. Phys. A **74** (2002), S528 - S530
538. Lauter-Pasyuk, V.*; Lauter, H.*; Toperverg, B.; Romashev, L.*; Ustinov, V.*
Transverse and Lateral Structure of the Spin-Flop Phase in Fe/Cr Antiferromagnetic Superlattices
Physical Review Letters **89** (2002), 167203-1 - 167203-4
539. Mackowski, S.*; Sobczak, E.*; Nietubyc, R.*; Goerigk, G.; Kret, S.*; Deuzewski, P.*; Szczepanska, A.*; Janik, E.*; Kossut, J.*; Karczewski, G.*
Three-Dimensional Quantum Dot "Crystal" Formation in CdTe/ZnTe Superlattices
phys. stat. sol. (b) **229** (2002), 445 - 448
540. Massalovitch, S.; Ioffe, A.; Küssel, E.; Schlapp, M.; Brückel, T.
Development of Image Plate Based Neutron Detector
Internat. Workshop on Position-Sensitive Neutron Detectors- Status and Perspectives, Vol. 2, ISSN 1433-559 (2002) 569 - 571
541. Massalovitch, S.; Ioffe, A.; Küssel, E.; Schlapp, M.; von Seggern, H.*; Brückel, T.
Development of neutron image plate for low-flux measurements
Applied Physics A **74** (2002), S118 - S120
542. Olligs, D.; Bürgler, D.; Wang, Y.; Kentzinger, E.; Rücker, U.; Schreiber, R.; Brückel, T.; Grünberg, P.
Roughness-induced enhancement of giant magnetoresistance in epitaxial Fe/Cr/Fe(001) trilayers
Europhysics Letters **59** (2002), 458 - 464
543. Polizzi, S.*; Riello, P.*; Goerigk, G.; Benedetti, A.*
Quantitative investigations of supported metal catalysts by ASAXS
J. Synchrotron Rad. **9** (2002), 65 - 70
544. Rücker, U.; Kentzinger, E.; Toperverg, B.; Ott, F.*; Brückel, T.
Layer-by-layer magnetometry of polarizing supermirrors
Applied Physics A **74** (2002), S607 - S609
545. Schlapp, M.; von Seggern, H.*; Massalovitch, S.; Ioffe, A.; Conrad, H.; Brückel, T.
Materials for neutron-image plates with low γ -sensitivity
Applied Physics A **74** (2002), S109 - S111
546. Schweika, W.
Introduction to Polarised Neutron Scattering
Schriften des FZ Jülich, Materie und Material, Vol. 12 (2002) 5 - 30
547. Schweika, W.; Maleyev, S.; Brückel, T.; Plakhty, V.; Regnault, L.*
Longitudinal spin fluctuations in the antiferromagnet MnF₂ studied by polarized neutron scattering
Europhysics Letters **60** (2002), 446 - 452
548. Seeck, O.
Capillary waves on polymer thin films
Schriften des FZ Jülich, Materie und Material **10** (2002), S. B7.1 - B7.15
549. Seeck, O.; Kim, H.*; Lee, D.*; Shu, D.*; Kaendler, I.*; Basu, J.*; Sinha, S.*
Observation of thickness quantization in liquid films confined to molecular dimensions
Europhysics Letters **60** (2002), 376 - 382
550. Seydel, T.*; Tolan, M.*; Ocko, B.*; Seeck, O.; Weber, R.*; DiMasi, E.*; Press, W.*
Freezing of capillary waves at the glass transition
Physical Review B **65** (2002), 184207 - 184213
551. Toperverg, B.
Off-specular polarised neutron scattering from magnetic fluctuations in thin films and multilayers
Appl. Phys. A **74** (2002), S1560 - S1562
552. Toperverg, B.
Polarised neutron reflection and off-specular scattering
Schriften des FZ Jülich, Materie und Material **12** (2002) 247 - 288

553. Toperverg, B.
Supermatrix formalism to model off-specular neutron scattering
Proc. of the 7th internat. conference on surface x-ray and neutron
scattering, Lake Tahoe, USA, 23. - 27.09.2002 (2002) 51
554. Vad, T.; Haubold, H.; Waldöfner, N.*; Bönnemann, H.*
Three-dimensional Pt-nanoparticle networks studied by
anomalous small-angle X-ray scattering and X-ray absorption
spectroscopy
J. Appl. Cryst. **35** (2002), 459 - 470
555. Voigt, J.; Kentzinger, E.; Rücker, U.; Schmidt, W.; Ohl, M.;
Hupfeld, D.; Brückel, T.
Interlayer coupling in [Er/Tb] superlattices
Applied Physics A **74** (2002), S1517 - S1519
556. Voigt, J.; Rücker, U.; Nerger, S.; Kentzinger, E.; Hupfeld, D.;
Schmidt, W.; Brückel, T.
Structural and magnetic properties of [Er/Tb] superlattices
JMMM **240** (2002) 559 - 561
557. Vorobiev, A.*; Gordeev, G.*; Major, J.*; Toperverg, B.; Dosch,
H.*
The structure of ferrofluids in the vicinity of an interface with
silicon
Appl. Phys. A **74** (2002), S817 - S819
- 2001**
558. Brückel, T.; Hupfeld, D.; Strempfer, J.*; Caliebe, W.;
Mattenberger, K.*; Stunault, A.*; Bernhoeft, N.*; McIntyre, G.*
Antiferromagnetic order and phase transitions in GdS as studied
with X-ray resonance-exchange scattering
Eur. Phys. J. B **19** (2001), 475 - 490
559. Brückel, T.
Elastic scattering from many-body systems
Schriften des FZ Jülich, Materie und Material **9** (2001) 3-1 - 3-
28
560. Brückel, T.
Magnetism
Schriften des FZ Jülich, Materie und Material **9** (2001) 16-1 -
16-20
561. Brückel, T.; Heger, G.; Richter, D.; Zorn, R. (Eds.)
Laboratory Course Neutron Scattering
Schriften des FZ Jülich, Materie und Material **9** (2001)
562. Brückel, T.; Strempfer, J.*
Non-resonant Magnetic Diffraction at High X-ray Energies
Synchrotron Radiation News **14** (2001), 16 - 20
563. Conrad, H.
German Neutron Users Meet in Jülich
Neutron News **12** (2001), 4
564. Conrad, H.
Neutron sources
Schriften des FZ Jülich, Materie und Material **9** (2001) 1-1 - 1-
15
565. Conrad, H.; Ullmaier, H.
Overview of the ESS Target and Moderator R&D
Proc. ICANS-XV, Tsukuba, Japan, 06. - 09.11.2000 (2001)
1137 - 1145
566. Conrad, H.
Status report on the Jülich ESS related activities
Proc. ICANS-XV, Tsukuba, Japan, 06. - 09.11.2000 (2001) 89 -
92
567. Dai, Y.*; Jia, X.*; Chen, J.; Sommer, W.*; Victoria, M.*; Bauer,
G.*
Microstructure of both as-irradiated and deformed 304L stainless
steel irradiated with 800 MeV protons
Journal of Nuclear Materials **296** (2001), 174 - 182
568. Goerigk, G.; Williamson, D.*
Characterisation of Solar Cell Materials from Anomalous Small
Angle X-Ray Scattering Studies
HASYLAB-Broschüre: Research at HASYLAB (2001), 18 - 20
569. Goerigk, G.; Williamson, D.*
Comparative anomalous small-angle x-ray scattering study of
hotwire and plasma grown amorphous silicon-germanium alloys
Journal of Applied Physics **90** (2001), 5808 - 5811
570. Goerigk, G.; Williamson, D.*
Quantitative ASAXS of germanium inhomogeneities in
amorphous silicon-germanium alloys
Journal of Non-Crystalline Solids **281** (2001), 181 - 188
571. Guilleaume, B.*; Ballauff, M.*; Goerigk, G.; Wittemann,M.*;
Rehahn,M.*
Correlation of counterions with rodlike macroions as assessed by
anomalous small-angle X-ray scattering
Colloid Polym Sci **279** (2001), 829 - 835
572. Haubold, H.; Vad, T.; Jungbluth, H.; Hiller, P.
Nano structure of NAFION: a SAXS study
Electrochimica Acta **46** (2001), 1559 - 1563
573. Ioffe, A.; Mezei, F.*
4π-symmetry of the neutron wave function under space rotation
Physica B **297** (2001), 303 - 306
574. Jung, P.; Liu, C.; Chen, J.
Retention of implanted hydrogen and helium in martensitic
stainless steels and their effects on mechanical properties
Journal of Nuclear Materials **296** (2001), 165 - 173
575. Kim, H.; Seeck, O.; Lee, D.; Kaendler, I.; Shu, D.; Basu, J.;
Sinha, S.
Synchrotron X-ray Studies of Molecular Ordering in Confined
Liquids
Material Research Society Symposium Proceedings 651, T2.1.1
- T2.1.7 (2001)
576. Köbler, U.; Mueller, R.; Brown, P.*; Arons, R.; Fischer, K.
Experimental identification of fourth-order exchange
interactions in magnets with pure spin moments
Journal of Physics: Condensed Matter **13** (2001), 6835 - 6852
577. Köbler, U.; Hoser, A.*; Kawakami, M.*; Abens, S.*
Observation of a spin wave exponent of $\delta/2$ in the uniaxial
antiferromagnet MnF₂
Physica B **307** (2001), 175 - 183
578. Köbler, U.; Hoser, A.*; Englisch, J.*; Snezhko, A.*; Kawakami,
M.*; Beys, M.; Fischer, K.
On the Failure of the Bloch-Kubo-Dyson Spin Wave Theory
Journal of the Physical Society of Japan **70** (2001), 3089 - 3097
579. Köbler, U.; Fischer, K.
The impact of fourth-order exchange interactions on the critical
temperatures of Eu_x Sr_{1-x} S and Eu_x Sr_{1-x} Te
J. Phys.: Condens. Matter **13** (2001), 123 - 139
580. Lauter-Pasyuk, V.*; Lauter, H. J.*; Toperverg, B.; Nikonov,
O.*; Petrenko, A.*; Schubert, D.*; Petry, W.*; Aksenov, V.*
Off-specular neutron scattering studies of the interface and
surface formation in self-assembled polymer multilayers
Proc. ILL millennium symposium & european user meeting
(2001), 84 - 85
581. Mezei, F.*; Drabkin, G.*; Ioffe, A.
Polarimetric neutron spin echo
Physica B **297** (2001), 9 - 13
582. Mueller, R.
The Yb fiber laser for metastable ³He optical pumping at Jülich
Physica B **297** (2001), 277 - 281
583. Nerger, S.; Kentzinger, E.; Rücker, U.; Voigt, J.; Ott, F.*; Seeck,
O.; Brückel, T.
Proximity effects in Fe_{1-x} Co_x/Mn/Fe_{1-x} Co_x trilayers
Physica B **297** (2001), 185 - 188
584. Nietubyc, R.*; Sobczak, E.*; Pelka, J.*; Mackowski, S.*; Janik,
E.*; Karczewski, G.*; Goerigk, G.
Anomalous small angle X-ray scattering study of CdTe quantum
dots in ZnTe
Journal of Alloys and Compounds **328** (2001), 206 - 210
585. Pelka, J.*; Paszkowicz, W.*; Dluzewski, P.*; Dynowska, E.*;
Wawro, A.*; Baczewski, L.*; Koslowski, M.*; Wisniewski, A.*;
Seeck, O.; Messoloras, S.*; Gamari-Seale, H.*
Structural and magnetic study of Co/Gd multilayers deposited on
Si and Si-N substrates
J. Phys. D: Appl. Phys. **34** (2001), A208 - A213
586. Pelka, J.*; Paszkowicz, W.*; Wawro, A.*; Baczewski, L.*;
Seeck, O.
Structural study of Co/Gd multilayers by X-ray diffraction and
GIXR
Journal of Alloys and Compounds **328** (2001), 253 - 258
587. Pinnow, C. U.*; Bicker, M.*; Geyer, U.*; Schneider, S.*;
Goerigk, G.
Decomposition and nanocrystallization in reactively sputtered
amorphous Ta-Si-N thin films
Journal of Applied Physics **90** (2001), 1986 - 1991
588. Plakhty, V.; Schweika, W.; Brückel, T.; Kulda, J.*; Gavrilov,
S.*; Regnault, L.*; Visser, D.*
Chiral criticality in helimagnet Ho studied by polarized neutron
scattering
Physical Review B **64** (R) (2001), 100402-1 - 100402-4
589. Plakhty, V.*; Maleyev, S.*; Kulda, J.*; Visser, E.*; Wosnitza,
J.*; Moskvin, E.*; Brückel, T.; Kremer, R.*
Spin chirality and polarised neutron scattering
Physica B **297** (2001), 60 - 66
590. Richter, D.; Monkenbusch, M.; Schwahn, D.; Schweika, W.
Scattering experiments relevant for polymer research at the
neutron guide laboratory of the Jülich Research Center

- Abstracts of Papers of the American Chemical Society **222** (2001), U357
591. **de Robillard, Q.*; Guo, X.*; Dingenaots, N.*; Ballauff, M.*; Goerigk, G.**
Application of Anomalous Small-Angle X-Ray Scattering to Spherical Polyelectrolyte Brushes
Macromol. Symp. **164** (2001), 81 - 90
592. **Rücker, U.; Bergs, W.; Alefeld, B.; Kentzinger, E.; Brückel, T.**
Polarization analysis for the 2D position-sensitive detector of the HADAS reflectometer in Jülich
Physica B **297** (2001), 140 - 142
593. **Schweika, W.**
Polarization analysis
Schriften des FZ Jülich, Materie und Material **9** (2001) 4-1 - 4-24
594. Schweika, W.; Böni, P.*
The instrument DNS: polarization analysis for diffuse neutron scattering
Physica B **297** (2001), 155 - 159
595. **Seeck, O.**
Analytical methods of Investigating Advanced Materials
Schriften des FZ Jülich, Materie und Material **7** (2001) B4.1 - B4.21
596. Seeck, O.
Continuum description: grazing incidence neutron scattering
Schriften des FZ Jülich, Materie und Material **9** (2001) 6-1 - 6-18
597. Seeck, O.; Sinha, S.; Kaendler, I.; Shu, D.; Shin, K.; Rafailovich, M.; Sokolov, J.; Tolan, M.
Interfacial properties of soft matter thin films studied by x-ray scattering
in: *Interfacial Properties on Submicron Scale*, ACS/Oxford Press (2001) ed. by J. Frommer, R. Overney
598. Seeck, O.; Mihaylova, M.; Shin, K.*
Investigation of Thin-Film Layer Systems with Synchrotron Radiation: Studies of Low-Contrast Polymer Interfaces Research at HASYLAB (2001), 44 - 46
599. **Sobczak, E.*; Nietubyc, R.*; Pelka, J.*; Mackowski, S.*; Janik, E.*; Karczewski, G.*; Goerigk, G.**
Anomalous Small Angle X-Ray Scattering Study of Self-Assembled Quantum Dots
Appl. Crystallogr. **18** (2001), 112 - 115
600. **Syromyatnikov, V.*; Toperverg, B.; Kentzinger, E.; Deriglazov, V.*; Kampmann, R.*; Pleshakov, N.*; Pusenkov, V.*; Schebetov, A.*; Siebrecht, R.*; Ul'yanov, V.***
Off-specular polarized neutron scattering from periodic Co/Ti and aperiodic Fe/Al magnetic multilayer
Physica B **297** (2001), 175 - 179
601. **Tietze-Jaensch, H.; Conrad, H.; Dietrich, J.; Filges, D.; Haft, B.; Hansen, G.; Maier, R.; Paul, N.; Pohl, C.; Prasuhn, D.; Smirnov, A.; Stelzer, K.; Ullmaier, H.**
JESSICA, ESS-like target/reflector mock-up & cold moderator test facility
Proc. ICANS-XV, Tsukuba, Japan, 06. - 09.11.2000 (2001) 829 - 834
602. **Toperverg, B.**
Specular reflection and off-specular scattering of polarized neutrons
Physica B **297** (2001), 160 - 168
603. Toperverg, B.; Nikonorov, O.*; Lauter-Pasyuk, V.*; Lauter, H.*
Towards 3D polarization analysis in neutron reflectometry
Physica B **297** (2001), 169 - 174
604. **Vorobiev, A.*; Gordeev, G.*; Donner, W.*; Dosch, H.*; Nickel, B.*; Toperverg, B.**
Reflectivity and off-specular neutron scattering from the free ferrofluid surface and silicon-ferrofluid interface
Physica B **297** (2001), 194 - 197
605. **Weber, R.; Zimmermann, K.; Tolan, M.; Stettner, J.; Press, W.; Seeck, O.; Erichsen, J.; Zaporotchenko, V.; Strunkus, T.; Faupel, F.**
X-ray reflectivity study on the surface and bulk glass transition of polystyrene
Physical Review E **64** (2001), 61508 - 61512
- 2000**
606. **Alefeld, B.; Dohmen, L.; Heidemann, A.**
GaAs as a backscattering crystal
Physica B **283** (2000) 299 - 301
607. Alefeld, B.; Dohmen, L.; Richter, D.; Brückel, T.
Space technology from X-ray telescopes for focusing SANS and reflectometry
Physica B **276 - 278** (2000), 52 - 54
608. **Alefeld, B.; Dohmen, L.; Richter, D.; Brückel, T.**
X-ray space technology for focusing small-angle neutron scattering and neutron reflectometry
Physica B **283** (2000) 330 - 332
609. **Brückel, T.; Eberhardt, W.**
Dynamik in kondensierter Materie
Schriften des FZ Jülich, Materie und Material **3** (2000), 1 - 32
610. Brückel, T.
Elastic scattering from many-body systems
Schriften des FZ Jülich, Materie und Material **5** (2000) 3-1 - 3-18
611. Brückel, T.; Eberhardt, W. (Eds.)
Femtosekunden und Nano-eV: Dynamik in kondensierter Materie
Schriften des FZ Jülich, Materie und Material **3** (2000)
612. Brückel, T.
Magnetism
Schriften des FZ Jülich, Materie und Material **5** (2000) 16-1 - 16-19
613. Brückel, T.; Heger, G.; Richter, D. (Eds.)
Laboratory Course Neutron Scattering
Schriften des FZ Jülich, Materie und Material **5** (2000)
614. **Conrad, H.**
Die Europäische Spallations-Neutronenquelle ESS - Spallationsmethoden
Vorlesungsmanuskripte des 31. IFF-Ferienkurses vom 13. - 24.03.2000 (2000), *Schriften des FZ Jülich, Materie und Material/Matter and Materials* **3**, ISBN 3-89336-256-8, B4.1 - 20
615. Conrad, H.
Neutron sources
Schriften des FZ Jülich, Materie und Material **5** (2000) 1-1 - 1-15
616. **Futakawa, M.*; Kikuchi, K.*; Conrad, H.; Stechemesser, H.**
Pressure and stress waves in a spallation neutron source mercury target generated by high-power proton pulses
Nuclear Instruments and Methods in Physics Research A **439** (2000), 1 - 7
617. **Hohlwein, D.*; Zeiske, T.**
Paramagnetic short-range order in MnF₂ beyond the critical region
Physica B **276 - 278** (2000), 584 - 585
618. **Hupfeld, D.; Schweika, W.; Strempfer, J.*; Mattenberger, K.*; McIntyre, G.*; Brückel, T.**
Element-specific magnetic order and competing interactions in Gd_{0.8}Eu_{0.2}S
Europhys. Lett. **49** (2000), 92 - 98
619. **Kentzinger, E.; Schober, H.**
Migration energies in L₁₂ intermetallic compounds
J. Phys.: Condens. Matter **12** (2000), 8145 - 8158
620. Kentzinger, E.; Rücker, U.; Caliebe, W.; Goerigk, G.; Werges, F.; Nerger, S.; Voigt, J.; Schmidt, W.; Alefeld, B.; Fermon, C.; Brückel, T.
Structural and magnetic characterization of Fe/δ-Mn thin films
Physica B **276 - 278** (2000) 586 - 587
621. **Kümmerle, E.; Güthoff, F.; Schweika, W.; Heger, G.***
Single-Crystal Neutron Diffraction Investigations on the Phase Transitions in CeO_{1.800} and CeO_{1.765}
Journal of Solid State Chemistry **153** (2000), 218 - 230
622. **Meier, G.*; Pawelzik, U.*; Schweika, W.; Kockelmann, W.***
The static structure factor S(Q) of partially deuterated ethyl- and hexylmethacrylate polymers
Physica B **276 - 278** (2000), 369 - 370
623. **Nerger, S.**
Struktur und magnetische Kopplung in Fe_xCo_{1-x}/Mn/Fe_xCo_{1-x}-Schichtsystemen
Diplomarbeit RWTH Aachen (2000)
624. **Reif, T.; Doerr, M.*; Loewenhaupt, M.*; Rotter, M.*; Svoboda, P.*; Welzel, S.***
Magnetic structure of DyCu₂ in the virgin and in the converted state
Physica B **276 - 278** (2000), 600 - 601
625. **Rücker, U.; Alefeld, B.; Kentzinger, E.; Brückel, T.**
Monochromator design for the HADAS reflectometer in Jülich
Physica B **283** (2000), 422 - 425
626. Rücker, U.; Alefeld, B.; Bergs, W.; Kentzinger, E.; Brückel, T.
The new polarized neutron reflectometer in Jülich
Physica B **276 - 278** (2000), 95 - 97
627. **Schweika, W.; Ice, G.*; Robertson, J.*; Sparks, C.*; Bai, J.***
Diffuse Scattering of Cu₃Au: Displacements and Fermi Surface Effects
Properties of Complex Inorganic Solids **2** (2000), 329 - 341

628. Schweika, W.
Polarization analysis
Schriften des FZ Jülich, Materie und Material **5** (2000) 4-1 - 4-19
629. Schweika, W.
Quellen und Eigenschaften der Neutronen- und Synchrotronstrahlung
Schriften des FZ Jülich, Materie und Material **3** (2000), B1.1 - 20
630. Seeck, O.
Continuum description: grazing incidence neutron scattering
Schriften des FZ Jülich, Materie und Material **5** (2000) 6-1 - 6-18
631. Seeck, O.; Sinha, S.; Kaendler, I.; Shu, D.; Shin, K.; Rafailovich, M.; Sokolov, J.; Tolan, M.
Interfacial properties of soft matter thin films studied by x-ray scattering
in: *Interfacial Properties on the Submicron Scale*, ACS/Oxford Press (2000) ed. by J. Frommer, R. Overney
632. Seeck, O.; Sinha, S.; Kaendler, I.; Wang, J.
Investigation of confined liquids with x-ray and neutron scattering
in: *Exploration of subsurface phenomena by particle scattering*, IAS Press (2000) ed. by N.Q.Lam, C.A.Melendres, S.K.Sinha
633. Stremper, J.*; Brückel, T.; Caliebe, W.; Verne, A.*; Ebert, H.*; Prandl, W.*; Schneider, J.*
Form-factor measurements on chromium with high-energy synchrotron radiation
Eur. Phys. J. B **14** (2000), 63 - 72
634. Tolan, M.; Seeck, O.; Wang, J.; Sinha, S. K.; Rafailovich, M.; Sokolov, J.
Surface structure of soft-matter thin films probes by diffuse x-ray scattering
in: *Exploration of subsurface phenomena by particle scattering*, IAS Press (2000) ed. by N.Q.Lam, C.A.Melendres, S.K.Sinha
635. Vasiliu-Doloc, L.*; Osborn, R.*; Rosenkranz, S.*; Mesot, J.*; Mitchell, J.*; Sinha, S.*; Seeck, O.; Lynn, J.*; Islam, Z.*
Polaron Ordering in Ferromagnetic Colossal Magnetoresistive Oxides
International Journal of Modern Physics B **14** (2000), 3711 - 3718
636. Voigt, J.
Elementspezifische MagnetisierungsdichteVerteilung in Seltener-Erd-Übergittern
Diplomarbeit RWTH Aachen (2000)
637. Zeiske, T.; Hagdorn, K.*; Hohlwein, D.*; Ihringer, J.*; Prandl, W.*; Ritter, H.*
Structure and magnetism of $\text{Ho}_{0.2}\text{Ca}_{0.8}\text{MnO}_3$
Physica B **276 - 278** (2000), 624 - 625
645. Gawronski, M.; Park, J.*; Magee, A.*; Conrad, H.
Microfibrillar Structure of PGG-Glucan in Aqueous Solution as Triple-Helix Aggregates by Small Angle X-Ray Scattering Biopolymers **50** (1999), 569 - 578
646. Haubold, H.; Hiller, P.; Jungbluth, H.; Vad, T.
Characterization of Electrocatalysts by In Situ SAXS and XAS Investigations
Jpn. J. Appl. Phys. **38** (1999), 36 - 39
647. Köbler, U.; Hoser, A.*; Kawakami, M.*; Chatterji, T.*; Rebizant, J.*
An unified view of the spin dynamics in two- and three-dimensional magnetic systems
JMMM **205** (1999), 343 - 356
648. Köbler, U.; Hupfeld, D.*; Schnelle, W.*; Mattenberger, K.*; Brückel, T.
Fourth-order exchange interactions in $\text{Gd}_x\text{Eu}_{1-x}\text{S}$
JMMM **205** (1999), 90 - 104
649. Köbler, U.; Hoser, A.*; Graf, H.*; Fernandez-Diaz, M.*; Fischer, K.; Brückel, T.
Investigations of the sublattice magnetizations $M_{\text{sub}}(T)$ in antiferromagnets with fourth-order exchange interactions: $\text{Eu}_x\text{Sr}_{1-x}\text{Te}$
Eur. Phys. J. B **8** (1999), 217 - 224
650. Lemke, U.*; Hoell, A.*; Kranold, R.*; Müller, R.*; Schüppel, W.*; Goerigk, G.; Gilles, R.*; Wiedemann, A.*
Formation of magnetic nanocrystals in a glass ceramic studied by small-angle scattering
Journal of Applied Physics **85** (4) (1999), 2279 - 2286
651. Malis, O.*; Ludwig, K.*; Schweika, W.; Ice, G.*; Sparks, C.*
Temperature dependence of the diffuse-scattering fine structure in equiatomic CuAu
Physical Review B **59** (1999), 11105 - 11108
652. Mueller, R.; Köbler, U.; Fischer, K.
On the T^2 Bloch law in magnets with fourth-order exchange interaction
Eur. Phys. J. B **8** (1999), 207 - 216
653. Schiffmann, K.*; Fryda, M.*; Goerigk, G.; Lauer, R.*; Hinze, P.*; Bulack, A.*
Sizes and distances of metal clusters in Au-, Pt-, W- and Fe-containing diamond-like carbon hard coating: a comparative study by small angle X-ray scattering, wide angle X-ray diffraction, transmission electron microscopy and scanning tunnelling microscopy
Thin Solid Films **347** (1999), 60 - 71
654. Schmid, H.; Ihringer, J.; Knorr, K.; Prandl, W.; Ritter, H.; Zeiske, T.
Magnetization and magnetic phases in metallic and semiconducting $\text{Ho}_x\text{Ca}_{1-x}\text{MnO}_3$
J. Mag. Soc. Japan **23** (1999), 525 - 527
655. Schweika, W.
Schichtpräparation mit Sputterverfahren
Vorlesungsmanuskripte des 30. IFF-Ferienkurses "Magnatische Schichtsysteme in Forschung und Anwendung" (1999),
Schriften des FZ Jülich, Materie und Material **2**, A5.1 - A5.21
656. Stremper, J.*; Brückel, T.; McIntyre, G.*; Tasset, F.*; Zeiske, T.*; Burger, K.*; Prandl, W.*
A reinvestigation of the field-induced magnetic form factor of chromium
Physica B **267 - 268** (1999), 56 - 59
657. Stunaute, A.*; de Bergevin, F.*; Wermeille, D.*; Vettier, C.*; Brückel, T.; Bernhoeft, N.*; McIntyre, G.*; Henry, J.*
K-edge resonant x-ray magnetic scattering from RbMnF_3
Phys. Rev. B **60** (1999), 10170 - 10179
658. Zeiske, T.
Magnetismus und magnetische Neutronenstreuung
Neutronenpraktikum, Forschungszentrum Jülich (1999), 17-1 - 17-17

1999

638. Benedetti, A.*; Bertoldo, L.*; Canton, P.*; Goerigk, G.; Pinna, F.*; Riello, P.*; Polizzi, S.*
ASAXS study of Au, Pd and Pd-Au catalysts supported on active carbon
Catalysis Today **49** (1999), 485 - 489
639. Braun, A.*; Bärtsch, M.*; Schnyder, B.*; Kötz, R.*; Haas, O.*; Haubold, H.; Goerigk, G.*
X-ray scattering & adsorption studies of thermally oxidized glassy carbon
Journal of Non-Crystalline Solids **260** (1999), 1 - 14
640. Brückel, T.
Elastische Streuung an Vielteilchensystemen
Neutronenpraktikum, Forschungszentrum Jülich (1999), 4-1 - 4-19
641. Brückel, T.
Magnetische Streuung und Polarisationsanalyse
Neutronenpraktikum, Forschungszentrum Jülich (1999), 5-1 - 5-20
642. Brückel, T.; Kentzinger, E.
Streumethoden zur Untersuchung von Dünnschichtsystemen
Schriften des FZ Jülich, Materie und Material **2** (1999), B3.1 - B3.48
643. Brückel, T.; Kentzinger, E.
Streuung unter streifendem Einfall
Neutronenpraktikum (1999), 7-1 - 7-17
644. Conrad, H.
Neutronenquellen - Von Radium-Beryllium zur Spallationsneutronenquelle
Neutronenpraktikum, Forschungszentrum Jülich (1999), 2-1 - 2-16

1998

659. Brückel, T.; Stremper, J.*; Hupfeld, D.*; Schneider, J.*; Mattenberger, K.*
Synchrotron Radiation Diffraction Studies of Antiferromagnetic Materials
Proc. 2nd Russian-German Workshop Synchrotron Radiation Res. in Atomic, Molecular & Material Science **8-9** (1998), 112-117
660. Caliebe, W.; Kao, C.; Krisch, M.; Oversluizen, T.; Montanez, P.; Hastings, J.
Optical Design and Performance of the Phase II Inelastic Scattering Beamline at the National Synchrotron Light Source 1-56396-742-1 288 pages illustrated cloth (AIP Conference Proceedings #417)

661. Conrad, H.
Es muß nicht immer Spaltung sein
Physik in unserer Zeit **2** (1998), 69 - 78
662. Conrad, H.
The European Spallation Source (ESS) Technical Study
Proceedings of the 2nd International Topical Meeting on Nuclear Applications of Accelerator Technology (1998), 13 - 21
663. Fischer, P.; Zeller, R.; Schütz, G.; Goerigk, G.; Haubold, H.; Pruegl, K.; Bayreuther, G.
Probing the magnetic microstructure of an amorphous GdFe system with magnetic anomalous small angle x-ray scattering
Journal of applied physics **83** (1998), 7088 - 7090
664. Gawronski, M., Conrad, H., Springer, T.
Proton-Deuteron and H₂O-D₂O Exchange in Polysaccharides by X-ray and Small-Angle Neutron Scattering
Macromolecules **31** (1998), 2549 - 2551
665. Göcking, K., Monkenbusch, M.
Neutron scattering investigation of a macroscopic single crystal of a lyotropic L_a phase
Europ. Lett. **43** (1998), 135 - 140
666. Goerigk, G., Williamson, D.*
Nanostructured Ge Distribution in α -SiGe: H Alloys from Anomalous Small-Angle X-Ray Scattering Studies
Solid State Communications **108** (1998), 419 - 424
667. Hupfeld, D.; Caliebe, W.; Reif, T.; Hulliger, F.
Determination of the magnetic structure of SmBi with resonance exchange scattering
HASYLAB Jahresbericht, 943 - 944, 1998
668. Köbler, U., Mueller, R., Schnelle, W.*; Fischer, K.
Critical magnetic behaviour of a ferromagnet with antiferromagnetic fourth-order exchange interactions: GdMg
JMMM **188** (1998), 333 - 345
669. Kümmel, E.
Sauerstoffleerstellen-Ordnung in CeOy-Neutronenstreuuntersuchungen an Einkristallen
Berichte des Forschungszentrum Jülich **3576** (1998)
670. Schweika, W.
Disordered Alloys, Diffuse Scattering and Monte Carlo Simulations
Springer Tracts in Modern Physics **141**, G. Höhler (Ed.), Springer, Heidelberg (1998)
671. Schweika, W., Pionke, M.
Neutron Scattering and Monte Carlo Studies of Disorder in Oxides and Hydrides
in: Local Structure from Diffraction, M.F. Thorpe and S. Billinge (Eds.), Fundamental Materials Science Series, Plenum Press, New York, (1998), 85 - 100
672. Alefeld, B.; Hayes, C.*; Mezei, F.*; Richter, D.; Springer, T.
High-resolution focusing SANS with a toroidal neutron mirror
Physica B **234-236** (1997), 1052 - 1054
673. Alefeld, B.
High Resolution SANS and NSE with Focusing Mirrors
PSI-Proceedings 97-01, (1997), 245 - 260
674. Benedetti, A.*; Polizzi, S.*; Riello, P.*; Pinna, F.*; Goerigk, G.
Note ASAXS Investigation of a Au/C Catalyst
Journal of Catalysis **171** (1997), 345 - 348
675. Conrad, H.
Experimental Source Performances: Consequences for Proton Pulse Durations and Rep Rates
J. Neutron Research **6** (1997), 63 - 77
676. Fischer, P., Zeller, R. Schütz, G., Goerigk, G., Haubold, H.
Magnetic Small Angle X-Ray Scattering
J. PHYS. IV FRANCE **7** (1997) ColloqueC2, Supplément au Journal de Physique III d'avril 1997
677. Gawronski, M.*; Donkai, N.*; Fukuda, T.*; Miyamoto, T.*; Conrad, H., Springer, T.
Triple Helix of the Polysaccharide Cinerean in Aqueous Solutions
Macromolecules **30** (1997), 6994 - 6996
678. Goerigk, G., Haubold, H., Schilling, W.
Kinetics of Decomposition in Copper-Cobalt: a Time-Resolved ASAXS Study
J. Appl. Cryst. **30** (1997), 1041 - 1047
679. Haemaelainen, K.; Manninen, S.; Caliebe, W.; Kao, C.; Hastings, J.
Inelastic X-ray Scattering Including Resonance Phenomena X-Ray and Inner-Shell Processes, American Institute of Physics Proceedings 389, Woodbury, NY, (1997), 671 - 687
680. Hahn, W.*; Schweika, W.
Focusing polarisation analysis at the diffuse neutron scattering spectrometer (DNS) in Jülich
Physica B **234 - 236** (1997), 1165 - 1167
681. Haubold, H., Wang, X., Goerigk, G., Schilling, W.
In Situ Anomalous Small-Angle X-ray Scattering Investigation of Carbon-Supported Electrocatalysts
J. Appl. Cryst. **30** (1997), 653 - 658
682. Köbler, U., Schweizer, J.*; Chieux, P.*; Lorenz, T.*; Büchner, B.*; Schnelle, W.*; Deloie, F.; Zinn, W.
Evidence for biquadratic exchange interactions in GdAg_{1-x}Zn_x
JMMM **170** (1997), 110 - 128
683. Müller-Hartmann, E.*; Köbler, U.; Smardz, L.
Competing non-Heisenberg interactions in Eu_xSr_{1-x}S
JMMM **173** (1997), 133 - 140
684. Pionke, M.; Mono, T.; Schweika, W.; Springer, T.; Schober, H.*
Investigation of the hydrogen mobility in a mixed perovskite Ba[Ca_{(1+x)/3}Nb_{(2-x)/3}]O_{3-x/2} by quasielastic neutron scattering
Solid State Ionics **97** (1997), 497 - 504
685. Pionke, M.; Schweika, W.; Springer, T.
Neutron Scattering Studies of the Structural and Dynamical Properties of Disordered Oxides
Neutron News **8** (1997), 28 - 31
686. Pionke, M.; Mono, T.; Schweika, W.; Schober, H.*; Springer, T.
Proton Diffusion in Ba[Ca_{(1+x)/3}Nb_{(2-x)/3}]O_{3-x/2} studied by quasielastic neutron scattering
Physica B **234 - 236** (1997), 95 - 96
687. Pyka, N.*; Loewenhaupt, M.*; Metz, A.; Hien, N.*
Magnetic correlations in heavy fermion Nd_{1.85}Ce_{0.15}CuO₄
Physica B **234-236** (1997), 808 - 809
688. Reif, T.*; Loewenhaupt, M.*; Svoboda, P.*; Schweika, W.; Gratz, E.*; Rotter, M.*; McIntyre, G.*
Diffuse magnetic neutron scattering in NdCu₂
Physica B **234 - 236** (1997), 640 - 641
689. Schiffmann, K.*; Fryda, M.*; Goerigk, G.
Study of Metal Containing Hydrogenated Carbon Films by STM/AFM and SAXS*
Mikrochim. Acta **125** (1997), 107 - 113
690. Schweika, W., Landau, D.
Monte Carlo studies of surface induced ordering in Cu₃Au-type alloy models
in: Computer Simulation Studies in Condensed Matter Physics X, Springer, Heidelberg (1997), 186 - 190

1997

672. Alefeld, B.; Hayes, C.*; Mezei, F.*; Richter, D.; Springer, T.
High-resolution focusing SANS with a toroidal neutron mirror
Physica B **234-236** (1997), 1052 - 1054
673. Alefeld, B.
High Resolution SANS and NSE with Focusing Mirrors
PSI-Proceedings 97-01, (1997), 245 - 260
674. Benedetti, A.*; Polizzi, S.*; Riello, P.*; Pinna, F.*; Goerigk, G.
Note ASAXS Investigation of a Au/C Catalyst
Journal of Catalysis **171** (1997), 345 - 348
675. Conrad, H.
Experimental Source Performances: Consequences for Proton Pulse Durations and Rep Rates
J. Neutron Research **6** (1997), 63 - 77
676. Fischer, P., Zeller, R. Schütz, G., Goerigk, G., Haubold, H.
Magnetic Small Angle X-Ray Scattering
J. PHYS. IV FRANCE **7** (1997) ColloqueC2, Supplément au Journal de Physique III d'avril 1997
677. Gawronski, M.*; Donkai, N.*; Fukuda, T.*; Miyamoto, T.*; Conrad, H., Springer, T.
Triple Helix of the Polysaccharide Cinerean in Aqueous Solutions
Macromolecules **30** (1997), 6994 - 6996
678. Goerigk, G., Haubold, H., Schilling, W.
Kinetics of Decomposition in Copper-Cobalt: a Time-Resolved ASAXS Study
J. Appl. Cryst. **30** (1997), 1041 - 1047
679. Haemaelainen, K.; Manninen, S.; Caliebe, W.; Kao, C.; Hastings, J.
Inelastic X-ray Scattering Including Resonance Phenomena X-Ray and Inner-Shell Processes, American Institute of Physics Proceedings 389, Woodbury, NY, (1997), 671 - 687
680. Hahn, W.*; Schweika, W.
Focusing polarisation analysis at the diffuse neutron scattering