List of Publications

Parts of this thesis were published in the following articles:

J. Schlipf, M. Jarrell, P. G. J. van Dongen, N. Blümer, S. Kehrein, Th. Pruschke, and D. Vollhardt, "*Absence of Hysteresis at the Mott-Hubbard Metal-Insulator Transition in Infinite Dimensions*", Phys. Rev. Lett. **82**, 4890 (1999).

I. A. Nekrasov, K. Held, N. Blümer, A. I. Poteryaev, V. I. Anisimov, and D. Vollhardt, "*Calculation of photoemission spectra of the doped Mott insulator* $La_{1-x}Sr_xTiO_3$ *using LDA+DMFT(QMC)*", Eur. Phys. J. B **18**, 55 (2000).

K. Held, I. A. Nekrasov, N. Blümer, V. I. Anisimov, and D. Vollhardt, "*Realistic Modeling of Strongly Correlated Electron Systems: An Introduction to the LDA+DMFT Approach*", Int. J. Mod. Phys. B **15**, 2611 (2001).

N. Blümer, K. Held, G. Keller, and D. Vollhardt, "*Metal-Insulator Transitions and Realistic Modelling of Strongly Correlated Electron Systems*", in NIC-Symposium 2001, eds. H. Rollnik and D. Wolf, NIC Series Vol. **9**, p. 347 (Forschungszentrum Jülich, 2002).

K. Held, I. A. Nekrasov, G. Keller, V. Eyert, N. Blümer, A. K. McMahan, R. T. Scalettar, T. Pruschke, V. I. Anisimov, and D. Vollhardt, "*The LDA+DMFT Approach to Materials with Strong Electronic Correlations*" in Quantum Simulations of Complex Many-Body Systems: From Theory to Algorithms, eds. J. Grotendorst, D. Marx and A. Muramatsu, NIC Series Vol. **10**, p. 175 (Forschungszentrum Jülich, 2002) and preprint cond-mat/0112079.

Calculations of the optical conductivity based on the programs developed as part of this thesis appeared in:

K. Held and D. Vollhardt, "*Electronic Correlations in Manganites*", Phys. Rev. Lett. **84**, 1568 (2000).