

List of publications of Claudio Verdozzi

Articles published in scientific journals

Articles submitted

- 54. E. Boström and C. Verdozzi, *Steering Magnetic Skyrmions with Nonequilibrium Green's Functions*, submitted to Physica Status Solidi b, in occasion of the proceedings of the conference PNGFVII.
- 53. E. Boström, M. Gisselbrecht, T. Brage, C.-O. Almbladh, A. Mikkelsen, and C. Verdozzi, *Time-Stretched Spectroscopy by Quantum Zeno Effect: The Case of the Auger Decay*, submitted to Physical Review Letters, arXiv:1804.06605.

Articles accepted for publication

- 52. M. Hopjan and C. Verdozzi, *Initial correlated states for the Generalized Kadanoff–Baym Ansatz without adiabatic switching-on of interactions in closed systems*, to appear in *Non-equilibrium dynamics*, proceedings of the FQMT17 conference, EPJST.

Peer-reviewed articles

- 51. T. Rössler, C. Verdozzi, and C.-O. Almbladh, *A v_0 -representability issue in lattice ensemble-DFT and its signature in lattice TDDFT*, Eur. Phys. J. B **91**, 219 (2018) .
- 50. S. Ydman, M. Hopjan, and C. Verdozzi, *Controlling Nonequilibrium Kondo-vs-RKKY Scenarios in Nanoclusters*, EPL **123**, 47001 (2018).
- 49. M. Hopjan, E. Perfetto, G. Stefanucci, and C. Verdozzi, *Molecular Junctions and Molecular Motors: Including Electronic Correlations via Nonequilibrium Green's Functions*, Phys. Rev. **B 98**, 041405(R) (2018).
- 48. D. Karlsson, M. Hopjan, and C. Verdozzi, *Systems with disorder, interactions, and out of equilibrium: The exact independent-particle picture from density functional theory*, Phys. Rev. **B 97**, 125151 (2018).
- 47. E. Boström, A. Mikkelsen, C. Verdozzi, E. Perfetto, and G. Stefanucci, *Charge separation in donor-C60 complexes with real-time Green's functions: The importance of nonlocal correlations*, Nano Lett. **18**, 785 (2018).
- 46. E. Mårzell, E. Boström, A. Harth, A. Losquin, C. Guo, Y.-C. Cheng, E. Lorek, S. Lehmann, G. Nylund, M. Stankovski, C. L. Arnold, M. Miranda, K. A. Dick, J. Mauritsson, C. Verdozzi, A. L'Huillier, and A. Mikkelsen, *Spatial Control of Multiphoton Electron Excitations in InAs Nanowires by Varying Crystal Phase and Light Polarization*, Nano Lett. **18**, 907 (2018).
- 45. M. Hopjan, D. Karlsson, S. Ydman, C. Verdozzi, and C.-O. Almbladh, *Merging features from Green's functions and time dependent density functional theory: A route to the description of correlated materials out of equilibrium?*, Phys. Rev. Lett. **116**, 236402 (2016).
- 44. E. Boström, A. Mikkelsen, and C. Verdozzi, *Time-resolved spectroscopy at surfaces and adsorbate dynamics: insights from a model-system approach*, Phys. Rev. **B 93**, 195416 (2016).
- 43. N. Schlünzen, S. Hermanns, M. Bonitz, C. Verdozzi, *Dynamics of strongly correlated fermions: Ab initio results for two and three dimensions*, Phys. Rev. **93** , 035107 (2016).
- 42. D. Karlsson and C. Verdozzi, *Transport of Correlated Electrons through Disordered Chains: A Perspective on Entanglement, Conductance, and Disorder Averaging*, Phys. Rev. **B 90**, 201109(R), (2014).

41. M. Hopjan and C. Verdozzi, *Probing Strongly Correlated Materials in Nonequilibrium: Basic Concepts and Possible Future Trends in First Principle Approaches*, Topics in Current Chemistry **347**, 347 (2014).
40. A. Kartsev, C. Verdozzi, G. Stefanucci, *Nonadiabatic Van der Pol oscillations in molecular transport*, The European Physical Journal B **87**, 1 (2014)
39. A. Kartsev, D. Karlsson, A. Privitera, C. Verdozzi, *Three-dimensional dynamics of a fermionic Mott wedding-cake in clean and disordered optical lattices*, Sci. Rep. **3**, 2570 (2013).
38. V. Vettchinkina, A. Kartsev, D. Karlsson, C. Verdozzi, *Interacting fermions in 1D disordered lattices: Exploring localization and transport properties with lattice density-functional theories*, Phys. Rev. B, 115115 (2013).
37. D. Karlsson, A. Privitera and C. Verdozzi, *Time Dependent Density Functional Theory meets Dynamical Mean Field Theory: Real-Time Dynamics for the 3D Hubbard Model*, Phys. Rev. Lett. **106**, 116401 (2011).
36. M. Puig von Friesen, C. Verdozzi, C.-O. Almbladh, *Can we always get the entanglement entropy from the Kadanoff-Baym equations? The case of the T-matrix approximation*, EPL **95**, 27005 (2011).
35. C. Verdozzi, D. Karlsson, M. Puig von Friesen, C.-O. Almbladh, U. von Barth, *Some open questions in TDDFT: Clues from lattice models and Kadanoff-Baym dynamics*, Chemical Physics **391**, 37 (2011).
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30. C. Verdozzi, *"Time-Dependent-Density-Functional-Theory and Strongly Correlated Systems: Insight From Numerical Studies*, Phys. Rev. Lett. **101**, 166401 (2008)
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21. C.Verdozzi, M.Cini, A.Marini, *Auger Spectroscopy of Strongly Correlated Systems: present status and future trends*, J. of Electron Spectroscopy and Related Phenomena, 117-118, 41(2001).
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8. D. O. Winge, M. Franckie, C. Verdozzi, A. Wacker and M. F. Pereira *Simple electron-electron scattering in non-equilibrium Greens function simulations* J. Phys. Conf. Ser, **696**, 012013 (2016).
7. E. Boström, M. Hopjan, A. Kartsev, C. Verdozzi, and C.-O. Almbladh, *Nonequilibrium Green's functions and atom-surface dynamics: Simple views from a simple model system*, J. Phys. Conf. Ser, **696**, 012007 (2016)
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2. C.Verdozzi, *Solid state perspective in the theory of Auger decay*, in (e,2e) and related processes NATO ASI series, Academic Publishers, Holland (1993)
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Monographs

1. C.Verdozzi, *Exact diagonalization studies of strongly correlated clusters*, Lecture notes for the Doctorate Programme in Materials Science, University of Milano-Bicocca, Italy (2005).

Other publications

Papers that are available on the Los-Alamos preprint archive <http://xxx.lanl.gov/>

2. M. Puig von Friesen, C. Verdozzi, C.-O. Almbladh, *Kadanoff-Baym equations and approximate double occupancy in a Hubbard dimer*, arXiv:1009.2917
1. C.Verdozzi and C.-O Almbladh *Lanczos-adapted time evolution for open boundary quantum transport*, arXiv:0808.1643