Szymon Åmiga

List of Publications by Year in descending order

32 papers	520 citations	623734 14 h-index	677142 22 g-index
32 all docs	32 docs citations	32 times ranked	240 citing authors

#	Article	IF	Citations
1	Boosting the OEP2-sc method with spin-component scaling. Molecular Physics, 2022, 120, .	1.7	2
2	Improving the applicability of the Pauli kinetic energy density based semilocal functional for solids. New Journal of Physics, 2021, 23, 063007.	2.9	13
3	Accurate density functional made more versatile. Journal of Chemical Physics, 2021, 155, 024103.	3.0	15
4	Plasmon Couplings from Subsystem Time-Dependent Density Functional Theory. Journal of Physical Chemistry A, 2021, 125, 7246-7259.	2.5	9
5	Benchmark test of a dispersion corrected revised Taoâ€“Mo semilocal functional for thermochemistry, kinetics, and noncovalent interactions of molecules and solids. Journal of Chemical Physics, 2021, 155, 114102.	3.0	4
6	Random-Phase Approximation in Many-Body Noncovalent Systems: Methane in a Dodecahedral Water Cage. Journal of Chemical Theory and Computation, 2021, 17, 804-817.	5.3	6
7	Self-Consistent Range-Separated Density-Functional Theory with Second-Order Perturbative Correction via the Optimized-Effective-Potential Method. Journal of Chemical Theory and Computation, 2020, 16, 211-223.	5.3	15
8	Generalizing Double-Hybrid Density Functionals: Impact of Higher-Order Perturbation Terms. Journal of Chemical Theory and Computation, 2020, 16, 7413-7430.	5.3	12
9	Improved solid stability from a screened range-separated hybrid functional by satisfying semiclassical atom theory and local density linear response. Physical Review B, 2020, 102, .	3.2	19
10	Unveiling the Physics Behind Hybrid Functionals. Journal of Physical Chemistry A, 2020, 124, 5606-5614.	2.5	23
11	The ab initio density functional theory applied for spin-polarized calculations. Journal of Chemical Physics, 2020, 152, 054109.	3.0	19
12	Modified Interaction-Strength Interpolation Method as an Important Step toward Self-Consistent Calculations. Journal of Chemical Theory and Computation, 2020, 16, 4983-4992.	5.3	14
13	Methods to generate reference total and Pauli kinetic potentials. Physical Review B, 2020, 101, .	3.2	14
14	Insights from the density functional performance of water and waterâ€“solid interactions: SCAN in relation to other meta-GGAs. Journal of Chemical Physics, 2020, 153, 214116.	3.0	14
15	From simple molecules to nanotubes. Reliable predictions of ionization potentials from the Î”MP2-SCS methods. New Journal of Physics, 2020, 22, 083084.	2.9	4
16	The Role of the Reduced Laplacian Renormalization in the Kinetic Energy Functional Development. Computation, 2019, 7, 65.	2.0	13
17	Investigation of the Exchange-Correlation Potentials of Functionals Based on the Adiabatic Connection Interpolation. Journal of Chemical Theory and Computation, 2019, 15, 1006-1015.	5.3	26
18	Spin-Component-Scaled Î”MP2 Parametrization: Toward a Simple and Reliable Method for Ionization Energies. Journal of Chemical Theory and Computation, 2018, 14, 4780-4790.	5.3	21

#	Article	IF	Citations
19	Density-Based Analysis of Spin-Resolved MP2 Method. Advances in Quantum Chemistry, 2018, , 279-293.	0.8	4
20	Jellium-with-gap model applied to semilocal kinetic functionals. Physical Review B, 2017, 95, .	3.2	26
21	Laplacian-dependent models of the kinetic energy density: Applications in subsystem density functional theory with meta-generalized gradient approximation functionals. Journal of Chemical Physics, 2017, 146, 064105.	3.0	44
22	Approximate solution of coupled cluster equations: application to the coupled cluster doubles method and non-covalent interacting systems. Physical Chemistry Chemical Physics, 2017, 19, 30249-30260.	2.8	9
23	Self-consistent double-hybrid density-functional theory using the optimized-effective-potential method. Journal of Chemical Physics, 2016, 145, 144102.	3.0	25
24	Accurate Kohnâ€“Sham ionization potentials from scaledâ€oppositeâ€spin secondâ€order optimized effective potential methods. Journal of Computational Chemistry, 2016, 37, 2081-2090.	3.3	24
25	The Correlation Effects in Density Functional Theory Along the Dissociation Path. Advances in Quantum Chemistry, 2016, 73, 263-283.	0.8	7
26	Subsystem density functional theory with meta-generalized gradient approximation exchange-correlation functionals. Journal of Chemical Physics, 2015, 142, 154121.	3.0	23
27	Orbital-dependent second-order scaled-opposite-spin correlation functionals in the optimized effective potential method. Journal of Chemical Physics, 2014, 141, 024113.	3.0	35
28	Density-Dependent Exchangeâ€“Correlation Potentials Derived From highly Accurate Ab initio Calculations. Advances in Quantum Chemistry, 2014, 68, 125-151.	0.8	11
29	OEP Orbitals as a Reference for Ab Initio Many-Body Calculations. Advances in Quantum Chemistry, 2014, 68, 105-123.	0.8	1
30	A density difference based analysis of orbital-dependent exchange-correlation functionals. Molecular Physics, 2014, 112, 700-710.	1.7	25
31	Comparing ab initio density-functional and wave function theories: The impact of correlation on the electronic density and the role of the correlation potential. Journal of Chemical Physics, 2011, 135, 114111.	3.0	39
32	Solid-state performance of a meta-GGA screened hybrid density functional constructed from Pauli kinetic enhancement factor dependent semilocal exchange hole. Journal of Chemical Physics, 0, , .	3.0	4