Mikhail M Otrokov

List of Publications by Citations

60 papers	2,036 citations	23 h-index	44 g-index
63 ext. papers	2,855 ext. citations	6.5 avg, IF	4.67 L-index

#	Paper	IF	Citations
60	Prediction and observation of an antiferromagnetic topological insulator. *Nature*, **2019**, 576, 416-422	50.4	333
59	Unique Thickness-Dependent Properties of the van der Waals Interlayer Antiferromagnet MnBi_{2}Te_{4} Films. *Physical Review Letters*, **2019**, 122, 107202	7.4	217
58	Highly-ordered wide bandgap materials for quantized anomalous Hall and magnetoelectric effects. *2D Materials*, **2017**, 4, 025082	5.9	125
57	Spatial variation of a giant spin□orbit effect induces electron confinement in graphene on□Pb□islands. *Nature Physics*, **2015**, 11, 43-47	16.2	110
56	Surface states and Rashba-type spin polarization in antiferromagnetic MnBi2Te4(0001). *Physical Review B*, **2019**, 100,	3.3	86
55	Novel ternary layered manganese bismuth tellurides of the MnTe-Bi2Te3 system: Synthesis and crystal structure. *Journal of Alloys and Compounds*, **2019**, 789, 443-450	5.7	79
54	Observation of single-spin Dirac fermions at the graphene/ferromagnet interface. *Nano Letters*, **2015**, 15, 2396-401	11.5	67
53	Spin-Orbit Coupling Induced Gap in Graphene on Pt(111) with Intercalated Pb Monolayer. *ACS Nano* , **2017**, 11, 368-374	16.7	57
52	Exchange interaction and its tuning in magnetic binary chalcogenides. *Physical Review B*, **2014**, 89,	3.3	54
51	Tunable 3D/2D magnetism in the (MnBi2Te4)(Bi2Te3)m topological insulators family. *Npj Quantum Materials*, **2020**, 5,	5	53
50	Band structure engineering in topological insulator based heterostructures. *Nano Letters*, **2013**, 13, 6064-9	11.5	49
49	Magnetic extension as an efficient method for realizing the quantum anomalous hall state in topological insulators. *JETP Letters*, **2017**, 105, 297-302	1.2	47
48	Competing rhombohedral and monoclinic crystal structures inMnPn2Ch4compounds: An ab-initio study. *Journal of Alloys and Compounds*, **2017**, 709, 172-178	5.7	43
47	Epitaxial B-Graphene: Large-Scale Growth and Atomic Structure. *ACS Nano*, **2015**, 9, 7314-22	16.7	42
46	Large-Scale Sublattice Asymmetry in Pure and Boron-Doped Graphene. *Nano Letters*, **2016**, 16, 4535-43	11.5	41
45	Manipulating the Topological Interface by Molecular Adsorbates: Adsorption of Co-Phthalocyanine on Bi2Se3. *Nano Letters*, **2016**, 16, 3409-14	11.5	41
44	Tuning the Dirac point position in Bi(2)Se(3)(0001) via surface carbon doping. *Physical Review Letters*, **2014**, 113, 116802	7.4	40

43	Visualizing spin-dependent bulk scattering and breakdown of the linear dispersion relation in Bi2Te3. *Physical Review B*, **2013**, 88,	3.3	33
42	New Universal Type of Interface in the Magnetic Insulator/Topological Insulator Heterostructures. *Nano Letters*, **2018**, 18, 6521-6529	11.5	33
41	Atomic relaxations at the (0001) surface of Bi2Se3 single crystals and ultrathin films. *Physical Review B*, **2014**, 90,	3.3	32
40	Surface alloying and iron selenide formation in Fe/Bi2Se3(0001) observed by x-ray absorption fine structure experiments. *Physical Review B*, **2015**, 92,	3.3	29
39	Spectroscopic perspective on the interplay between electronic and magnetic properties of magnetically doped topological insulators. *Physical Review B*, **2017**, 96,	3.3	28
38	Signatures of temperature driven antiferromagnetic transition in the electronic structure of topological insulator MnBi2Te4. *APL Materials*, **2020**, 8, 021105	5.7	23
37	Atomic and electronic structure of bismuth-bilayer-terminated Bi2Se3(0001) prepared by atomic hydrogen etching. *Physical Review B*, **2015**, 91,	3.3	23
36	Nature of the Dirac gap modulation and surface magnetic interaction in axion antiferromagnetic topological insulator [Formula: see text]. *Scientific Reports*, **2020**, 10, 13226	4.9	23
35	Magneto-Spin-Orbit Graphene: Interplay between Exchange and Spin-Orbit Couplings. *Nano Letters* , **2018**, 18, 1564-1574	11.5	22
34	Spin Orientation of Two-Dimensional Electrons Driven by Temperature-Tunable Competition of Spin-Orbit and Exchange-Magnetic Interactions. *Nano Letters*, **2017**, 17, 811-820	11.5	20
33	Robust and tunable itinerant ferromagnetism at the silicon surface of the antiferromagnet GdRh2Si2. *Scientific Reports*, **2016**, 6, 24254	4.9	20
32	Natural sulfur-containing minerals as topological insulators with a wide band gap. *JETP Letters*, **2012**, 96, 322-325	1.2	19
31	Fabrication of a novel magnetic topological heterostructure and temperature evolution of its massive Dirac cone. *Nature Communications*, **2020**, 11, 4821	17.4	19
30	Evidence of large spin-orbit coupling effects in quasi-free-standing graphene on Pb/Ir(1 1 1). *2D Materials*, **2018**, 5, 035029	5.9	18
29	Breaking time-reversal symmetry at the topological insulator surface by metal-organic coordination networks. *Physical Review B*, **2015**, 92,	3.3	17
28	Efficient step-mediated intercalation of silver atoms deposited on the Bi2Se3 surface. *JETP Letters*, **2013**, 96, 714-718	1.2	16
27	Mn-Rich MnSb Te : A Topological Insulator with Magnetic Gap Closing at High Curie Temperatures of 45-50 K. *Advanced Materials*, **2021**, 33, e2102935	24	16
26	Electronic structure and dielectric function of Mn-Bi-Te layered compounds. *Journal of Vacuum Science and Technology B:Nanotechnology and Microelectronics*, **2019**, 37, 062910	1.3	14

25	Low-coverage surface diffusion in complex periodic energy landscapes: Analytical solution for systems with symmetric hops and application to intercalation in topological insulators. *Physical Review B*, **2016**, 93,	3.3	11
24	Giant Magnetic Band Gap in the Rashba-Split Surface State of Vanadium-Doped BiTeI: A Combined Photoemission and Ab Initio Study. *Scientific Reports*, **2017**, 7, 3353	4.9	11
23	Ab initio study of the magnetic ordering in Si/Mn digital alloys. *Physical Review B*, **2011**, 84,	3.3	11
22	Topological Magnetic Materials of the (MnSbTe)[(SbTe) van der Waals Compounds Family. *Journal of Physical Chemistry Letters*, **2021**, 12, 4268-4277	6.4	11
21	Strong spin-orbit coupling in the noncentrosymmetric Kondo lattice. *Physical Review B*, **2018**, 98,	3.3	10
20	Instability of the topological surface state in Bi2Se3 upon deposition of gold. *Physical Review B*, **2017**, 95,	3.3	9
19	Magnetic ordering in digital alloys of group-IV semiconductors with 3d-transition metals. *Journal of Experimental and Theoretical Physics*, **2011**, 112, 625-636	1	8
18	Domain wall induced spin-polarized flat bands in antiferromagnetic topological insulators. *Physical Review B*, **2021**, 103,	3.3	8
17	Ab initio study of the adsorption, diffusion, and intercalation of alkali metal atoms on the (0001) surface of the topological insulator Bi2Se3. *Journal of Experimental and Theoretical Physics*, **2015**, 121, 465-476	1	7
16	Intralayer magnetic ordering in Ge/Mn digital alloys. *Physical Review B*, **2011**, 83,	3.3	7
15	Native point defects and their implications for the Dirac point gap at MnBi2Te4(0001). *Npj Quantum Materials*, **2022**, 7,	5	6
14	Sample-dependent Dirac-point gap in MnBi2Te4 and its response to applied surface charge: A combined photoemission and ab initio study. *Physical Review B*, **2021**, 104,	3.3	6
13	Geometric and electronic structure of the Cs-doped Bi2Se3(0001) surface. *Physical Review B*, **2017**, 95,	3.3	5
12	Search for stable ferromagnets among AIV/Fe digital alloys (AIV= Si, Ge) using first-principles calculations. *Physical Review B*, **2012**, 86,	3.3	5
11	TCNQ Physisorption on the Topological Insulator Bi Se. *ChemPhysChem*, **2018**, 19, 2405-2410	3.2	5
10	Magnetic Properties of Metal?Organic Coordination Networks Based on 3d Transition Metal Atoms. *Molecules*, **2018**, 23,	4.8	4
9	Digital magnetic heterostructures based on Si and Fe. *Physics of the Solid State*, **2010**, 52, 1680-1687	0.8	4
8	Infrared study of the multiband low-energy excitations of the topological antiferromagnet MnBi2Te4. *Physical Review B*, **2021**, 103,	3.3	4

List of Publications

7	Classical and cubic Rashba effect in the presence of in-plane 4f magnetism at the iridium silicide surface of the antiferromagnet GdIr2Si2. *Physical Review B*, **2021**, 103,	3.3	4
6	Origin of two-dimensional electronic states at Si- and Gd-terminated surfaces of GdRh2Si2(001). *Physical Review B*, **2019**, 100,	3.3	3
5	Low-coverage surface diffusion in complex periodic energy landscapes. II. Analytical solution for systems with asymmetric hops. *Physical Review B*, **2016**, 93,	3.3	3
4	Large Perpendicular Magnetic Anisotropy in Nanometer-Thick Epitaxial Graphene/Co/Heavy Metal Heterostructures for Spin□rbitronics Devices. *ACS Applied Nano Materials*, **2021**, 4, 4398-4408	5.6	3
3	Reply to "Comment on ‖Spin-Orbit Coupling Induced Gap in Graphene on Pt(111) with Intercalated Pb Monolayer‖". *ACS Nano*, **2017**, 11, 10630-10632	16.7	1
2	Persistence of the Topological Surface States in Bi2Se3 against Ag Intercalation at Room Temperature. *Journal of Physical Chemistry C*, **2021**, 125, 1784-1792	3.8	0
1	The Charge Transport Mechanism in a New Magnetic Topological Insulator MnBi0.5Sb1.5Te4. *Physics of the Solid State*, **2021**, 63, 1120-1125	0.8	0