Baozeng Zhou

List of Publications by Year in Descending Order

47 papers	563 citations	15 h-index	22 g-index
52 ext. papers	744 ext. citations	4.5 avg, IF	4.43 L-index

#	Paper	IF	Citations
47	Conduction band-edge valley splitting in two-dimensional ferroelectric AgBiPS by magnetic doping: towards electron valley-polarized transport.. *RSC Advances*, **2022**, 12, 13765-13773	3.7	0
46	Controllable spin direction in nonmagnetic BX/MX2 (M = Mo or W; X = S, Se and Te) van der Waals heterostructures by switching between the Rashba splitting and valley polarization. *Journal of Materials Chemistry C*, **2021**, 10, 312-320	7.1	1
45	Tunable electronic structure and magnetic characteristics of two-dimensional graphyne/VI3 van der Waals heterostructures. *Superlattices and Microstructures*, **2021**, 160, 107081	2.8	1
44	Structure distortion related magnetic anisotropy in 5d transition-metal dimer adsorbed g-C3N4 monolayers. *Physica E: Low-Dimensional Systems and Nanostructures*, **2021**, 130, 114697	3	0
43	Heterostructure Engineering of Core-Shelled Sb@Sb O Encapsulated in 3D N-Doped Carbon Hollow-Spheres for Superior Sodium/Potassium Storage. *Small*, **2021**, 17, e2006824	11	23
42	Electronic properties, contact types and Rashba splitting of two-dimensional graphyne/WSeTe van der Waals heterostructures. *Journal of Alloys and Compounds*, **2021**, 875, 160048	5.7	7
41	Prediction of high spin polarization and perpendicular magnetic anisotropy in two dimensional ferromagnetic Mn2CXX□(X, X?=F, Cl, Br, I) Janus monolayers. *Physica E: Low-Dimensional Systems and Nanostructures*, **2021**, 134, 114932	3	0
40	Architectured interfacial interlocking structure for enhancing mechanical properties of Al matrix composites reinforced with graphene nanosheets. *Carbon*, **2021**, 183, 685-701	10.4	4
39	Biaxial strain, electric field and interlayer distance-tailored electronic structure and magnetic properties of two-dimensional g-CN/Li-adsorbed CrGeTe van der Waals heterostructures. *Physical Chemistry Chemical Physics*, **2021**, 23, 6171-6181	3.6	1
38	Low consumption two-terminal artificial synapse based on transfer-free single-crystal MoS memristor. *Nanotechnology*, **2020**, 31, 265202	3.4	20
37	Theoretical investigation of nonvolatile electrical control behavior by ferroelectric polarization switching in two-dimensional MnCl3/CuInP2S6 van der Waals heterostructures. *Journal of Materials Chemistry C*, **2020**, 8, 4534-4541	7.1	12
36	Ferroelectric Rashba semiconductors, AgBiPX (X = S, Se and Te), with valley polarization: an avenue towards electric and nonvolatile control of spintronic devices. *Nanoscale*, **2020**, 12, 5533-5542	7.7	8
35	Controllable synthesis of millimeter-size single crystal WS2. *Applied Surface Science*, **2020**, 504, 144378	6.7	6
34	Electric polarization related Dirac half-metallicity in Mn-trihalide Janus monolayers. *Physical Chemistry Chemical Physics*, **2020**, 22, 26468-26477	3.6	1
33	Boron-Doped Graphene Directly Grown on Boron-Doped Diamond for High-Voltage Aqueous Supercapacitors. *ACS Applied Energy Materials*, **2019**, 2, 1526-1536	6.1	30
32	Tunable valley splitting and an anomalous valley Hall effect in hole-doped WS by proximity coupling with a ferromagnetic MnO monolayer. *Nanoscale*, **2019**, 11, 13567-13575	7.7	23
31	Superior spin-polarized electronic structure in MoS/MnO heterostructures with an efficient hole injection. *Physical Chemistry Chemical Physics*, **2019**, 21, 10706-10715	3.6	3

30	Triferroic Material and Electrical Control of Valley Degree of Freedom. *ACS Applied Materials & Interfaces*, **2019**, 11, 12675-12682	9.5	26
29	Strain-tunable magnetic anisotropy in two-dimensional Dirac half-metals: nickel trihalides.. *RSC Advances*, **2019**, 9, 35614-35623	3.7	7
28	Low-Operating-Voltage Resistive Memory Based on BiFeZn)O□Films. *Journal of Nanoscience and Nanotechnology*, **2019**, 19, 231-234	1.3	
27	Proximity effect induced spin filtering and gap opening in graphene by half-metallic monolayer Cr2C ferromagnet. *Carbon*, **2018**, 132, 25-31	10.4	23
26	Effect of growth temperature on large surface area, ultrathin MoS2 nanofilms fabrication and photovoltaic efficiency. *Solar Energy*, **2018**, 159, 88-96	6.8	8
25	Hittorf's violet phosphorene as a promising candidate for optoelectronic and photocatalytic applications: first-principles characterization. *Physical Chemistry Chemical Physics*, **2018**, 20, 11967-11975	3.6	32
24	Superior electronic structure of two-dimensional 3d transition metal dicarbides for applications in spintronics. *Journal of Materials Chemistry C*, **2018**, 6, 4290-4299	7.1	15
23	Tuning electronic and magnetic properties of V-, Cr-, and Mn-doped PbS via strain engineering: A first-principles proposal. *Materials Science and Engineering B: Solid-State Materials for Advanced Technology*, **2018**, 228, 1-6	3.1	8
22	Tunable interlayer coupling and Schottky barrier in graphene and Janus MoSSe heterostructures by applying an external field. *Physical Chemistry Chemical Physics*, **2018**, 20, 24109-24116	3.6	63
21	First-Principles Studies on d 0 Magnetism in Zinc-Blende IV-IV Compounds-Based Short-Period Heterostructures (SiC)1/(KC)1, (GeC)1/(KC)1, (SiC)1/(CaC)1, and (GeC)1/(CaC)1. *Journal of Superconductivity and Novel Magnetism*, **2017**, 30, 1619-1628	1.5	
20	An sd hybridized transition-metal monolayer with a hexagonal lattice: reconstruction between the Dirac and kagome bands. *Physical Chemistry Chemical Physics*, **2017**, 19, 8046-8054	3.6	4
19	First-principles prediction of magnetic salts: Case study of NaCl bulk and (0 0 1) surface doped with light non-metallic 2 p -block elements. *Computational Materials Science*, **2017**, 132, 10-18	3.2	2
18	Prediction of two-dimensional d-block elemental materials with normal honeycomb, triangular-dodecagonal, and square-octagonal structures from first principles. *Applied Surface Science*, **2017**, 419, 484-496	6.7	4
17	Tunable gap opening and spin polarization of two dimensional graphene/hafnene van der Waals heterostructures. *Carbon*, **2017**, 120, 121-127	10.4	28
16	Tailoring electronic structure of □AlH 3 to enhance spin polarization: Insights from density functional calculations. *Journal of Physics and Chemistry of Solids*, **2017**, 108, 9-14	3.9	1
15	Spin-gapless and half-metallic ferromagnetism in potassium and calcium □doped GaN digital magnetic heterostructures for possible spintronic applications: insights from first principles. *Applied Physics A: Materials Science and Processing*, **2017**, 123, 1	2.6	4
14	In situ visualization and detection of surface potential variation of mono and multilayer MoS under different humidities using Kelvin probe force microscopy. *Nanotechnology*, **2017**, 28, 295705	3.4	22
13	First-principles and molecular dynamics studies on structural, electronic, and magnetic characteristics of (CaC)1/(SiC)1 and (KC)1/(SiC)1 in wurtzite structure. *Physica Status Solidi (B): Basic Research*, **2016**, 253, 1734-1742	1.3	2

12	Density functional theory study of the structural, electronic and optical properties of C-doped anatase TiO2 (101) surface. *Physics Letters, Section A: General, Atomic and Solid State Physics*, **2015**, 379, 1666-1670	2.3	24
11	First-principles and Monte Carlo studies on the magnetic stability of half-metallic zinc-blende CaC and similar compounds. *Journal of Magnetism and Magnetic Materials*, **2015**, 378, 469-477	2.8	12
10	Correlation-induced metal-insulator transitions in d0 magnetic superlattices based on alkaline-earth monoxides: Insights from ab initio calculations. *Journal of Magnetism and Magnetic Materials*, **2015**, 384, 33-39	2.8	8
9	First-principles study of sp-electron half-metallic superlattices in wurtzite structure. *Physica Status Solidi (B): Basic Research*, **2014**, 251, 1076-1082	1.3	3
8	Half metallicity and magnetic stability of sp-electron superlattices in rock-salt structure: A first-principles study. *Solid State Communications*, **2014**, 192, 64-70	1.6	5
7	Effects of enhanced electronic correlation on magnetic properties of light non-metallic element (B, C, N, and O)-doped CuCl: A first-principles study. *Physics Letters, Section A: General, Atomic and Solid State Physics*, **2014**, 378, 3001-3005	2.3	9
6	Ferromagnetic spin-order in p-type N-doped SnO2 films prepared by thermal oxidation of SnNx. *Journal of Magnetism and Magnetic Materials*, **2014**, 362, 14-19	2.8	23
5	Ferromagnetic ordering and metallic-like conductivity in sputtered SnNx films. *Journal of Alloys and Compounds*, **2014**, 604, 106-111	5.7	1
4	Effects of electronic modification and structural distortion on ferromagnetism in sputtered CeO2 films with isovalent Sn4+ doping. *RSC Advances*, **2014**, 4, 63228-63233	3.7	4
3	Effects of vacancy and lattice distortion on ferromagnetism in sputtered epitaxial Sn1−KxO2 films. *Journal of Magnetism and Magnetic Materials*, **2014**, 355, 230-234	2.8	9
2	Room-temperature ferromagnetism in epitaxial Mg-doped SnO2 thin films. *Applied Physics Letters*, **2012**, 100, 182405	3.4	55
1	Tunable bandgap and ferromagnetism in sputtered epitaxial Sn1−MgxO2 thin films. *Applied Physics Letters*, **2012**, 101, 182406	3.4	18