R Chandiramouli

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The third column is the impact factor (IF) of the journal, and the fourth column is the number of citations of the article.

224 papers 4,046 citations

31 h-index 41 g-index

230 ext. papers

4,592 ext. citations

2.9 avg, IF

7.31 L-index

#	Paper	IF	Citations
224	Review of CdO thin films. <i>Solid State Sciences</i> , 2013 , 16, 102-110	3.4	110
223	NO adsorption studies on silicene nanosheet: DFT investigation. <i>Applied Surface Science</i> , 2015 , 351, 662	-6 <i>7</i> ₇ 2	70
222	Arsenene nanoribbons for sensing NH3 and PH3 gas molecules [A first-principles perspective. <i>Applied Surface Science</i> , 2019 , 469, 173-180	6.7	63
221	Investigation on graphdiyne nanosheet in adsorption of sorafenib and regorafenib drugs: A DFT approach. <i>Journal of Molecular Liquids</i> , 2019 , 277, 776-785	6	56
220	Borophene nanosheet molecular device for detection of ethanol [A first-principles study. <i>Computational and Theoretical Chemistry</i> , 2017 , 1105, 52-60	2	54
219	Adsorption studies of alcohol molecules on monolayer MoS2 nanosheet A first-principles insights. <i>Applied Surface Science</i> , 2017 , 413, 109-117	6.7	54
218	Investigation of NH3 adsorption behavior on graphdiyne nanosheet and nanotubes: A first-principles study. <i>Journal of Molecular Liquids</i> , 2018 , 249, 24-32	6	51
217	Operating temperature dependent ethanol and formaldehyde detection of spray deposited mixed CdO and MnO2 thin films. <i>RSC Advances</i> , 2015 , 5, 43930-43940	3.7	49
216	Density functional studies on the binding of methanol and ethanol molecules to graphyne nanosheet. <i>Computational and Theoretical Chemistry</i> , 2018 , 1125, 86-94	2	46
215	NO2 adsorption behaviour on germanene nanosheet 🖪 first-principles investigation. <i>Superlattices and Microstructures</i> , 2017 , 101, 160-171	2.8	44
214	First-principles investigation on detection of phosgene gas molecules using phosphorene nanosheet device. <i>Chemical Physics Letters</i> , 2019 , 717, 99-106	2.5	44
213	Adsorption of NO molecules on armchair phosphorene nanosheet for nano sensor applications - A first-principles study. <i>Journal of Molecular Graphics and Modelling</i> , 2017 , 75, 365-374	2.8	43
212	First-principles insights on detection of dimethyl amine and trimethyl amine vapors using graphdiyne nanosheets. <i>Computational and Theoretical Chemistry</i> , 2018 , 1123, 119-127	2	42
211	Interaction of Imuran, Pentasa and Hyoscyamine drugs and solvent effects on graphdiyne nanotube as a drug delivery system - A DFT study. <i>Journal of Molecular Liquids</i> , 2018 , 265, 199-207	6	42
210	Germanane nanosheet as a novel biosensor for liver cirrhosis based on adsorption of biomarker volatiles 🖪 DFT study. <i>Applied Surface Science</i> , 2019 , 475, 990-998	6.7	41
209	Adsorption behavior of NH3 and NO2 molecules on stanene and stanane nanosheets A density functional theory study. <i>Chemical Physics Letters</i> , 2018 , 695, 162-169	2.5	40
208	A study on quercetin and 5-fluorouracil drug interaction on graphyne nanosheets and solvent effects [A first-principles study. <i>Journal of Molecular Liquids</i> , 2019 , 275, 713-722	6	39

207	First-principles investigation on structural and electronic properties of antimonene nanoribbons and nanotubes. <i>Physica E: Low-Dimensional Systems and Nanostructures</i> , 2018 , 97, 98-104	3	39	
206	Borospherene nanostructure as CO and NO sensor 🖪 first-principles study. <i>Vacuum</i> , 2017 , 142, 13-20	3.7	38	
205	Antimonene nanosheet device for detection of explosive vapors IA first-principles inspection. Chemical Physics Letters, 2018 , 708, 130-137	2.5	37	
2 04	Investigation on adsorption properties of CO and NO gas molecules on aluminene nanosheet: A density functional application. <i>Materials Science and Engineering B: Solid-State Materials for Advanced Technology</i> , 2018 , 229, 193-200	3.1	36	
203	Adsorption studies of NH3 molecules on functionalized germanene nanosheet 🗚 DFT study. Chemical Physics Letters, 2016 , 665, 22-30	2.5	36	
202	Sensing properties of monolayer borophane nanosheet towards alcohol vapors: A first-principles study. <i>Journal of Molecular Graphics and Modelling</i> , 2017 , 73, 208-216	2.8	35	
201	Novel Ephosphorene nanosheet device for the detection of tear gas molecules IA first-principles research. <i>Chemical Physics Letters</i> , 2020 , 747, 137353	2.5	35	
200	Graphdiyne nanosheets as a sensing medium for formaldehyde and formic acid IA first-principles outlook. <i>Computational and Theoretical Chemistry</i> , 2020 , 1176, 112751	2	34	
199	TeO2 nanostructures as a NO2 sensor: DFT investigation. <i>Computational and Theoretical Chemistry</i> , 2014 , 1049, 20-27	2	34	
198	Novel bismuthene nanotubes to detect NH3, NO2 and PH3 gas molecules 🖪 first-principles insight. <i>Chemical Physics Letters</i> , 2018 , 712, 102-111	2.5	34	
197	Interaction studies of aniline on pristine and Al-doped EArsenene nanosheets EA first-principles insight. <i>Chemical Physics Letters</i> , 2020 , 752, 137588	2.5	32	
196	Interaction studies of kidney biomarker volatiles on black phosphorene nanoring: A first-principles investigation. <i>Journal of Molecular Graphics and Modelling</i> , 2020 , 97, 107566	2.8	32	
195	Detection of trace level of hazardous phosgene gas on antimonene nanotube based on first-principles method. <i>Journal of Molecular Graphics and Modelling</i> , 2019 , 88, 32-40	2.8	32	
194	Boron trifluoride interaction studies on graphdiyne nanotubes 🖪 first-principles insight. <i>Chemical Physics Letters</i> , 2020 , 738, 136841	2.5	32	
193	Probing cyanogen chloride gas molecules using blue phosphorene nanosheets based on adsorption properties: A first-principles study. <i>Computational and Theoretical Chemistry</i> , 2019 , 1150, 63-70	2	31	
192	MoSe nanosheets for detection of methanol and ethanol vapors: A DFT study. <i>Journal of Molecular Graphics and Modelling</i> , 2018 , 81, 97-105	2.8	31	
191	Alcohol molecules adsorption on graphane nanosheets [A first-principles investigation. <i>Applied Surface Science</i> , 2018 , 441, 734-743	6.7	31	
190	Exploring adsorption mechanism of hydrogen cyanide and cyanogen chloride molecules on arsenene nanoribbon from first-principles. <i>Journal of Molecular Graphics and Modelling</i> , 2019 , 89, 13-21	2.8	30	

189	First-principles investigation on switching properties of spiropyran and merocyanine grafted graphyne nanotube device. <i>Chemical Physics Letters</i> , 2018 , 691, 37-43	2.5	30
188	DFT investigation on CO sensing characteristics of hexagonal and orthorhombic WO3 nanostructures. <i>Superlattices and Microstructures</i> , 2015 , 78, 22-39	2.8	29
187	Quantum chemical studies on CdO nanoclusters stability. <i>Spectrochimica Acta - Part A: Molecular and Biomolecular Spectroscopy</i> , 2013 , 102, 242-9	4.4	29
186	First-Principles Investigation on Interaction of NH3 Gas on a Silicene Nanosheet Molecular Device. <i>IEEE Nanotechnology Magazine</i> , 2017 , 16, 445-452	2.6	28
185	Physisorption of propane and butane vapors on novel Kagome antimonene sheets [A first-principles perception. <i>Chemical Physics Letters</i> , 2020 , 754, 137693	2.5	28
184	Investigation on adsorption properties of HCN and ClCN blood agents on phosphorene nanosheets [A firstprinciples insight. <i>Chemical Physics</i> , 2020 , 538, 110896	2.3	28
183	Methyl and Ethyl mercaptan molecular adsorption studies on novel Kagome arsenene nanosheets - A DFT outlook. <i>Physica B: Condensed Matter</i> , 2020 , 586, 412135	2.8	28
182	Kagome phosphorene molecular device for sensing chloropicrin and phosgene 🖪 first-principles study. <i>Chemical Physics Letters</i> , 2021 , 771, 138472	2.5	28
181	CO and NO monitoring using pristine germanene nanosheets: DFT study. <i>Journal of Molecular Liquids</i> , 2017 , 234, 355-363	6	27
180	Arsenene Nanotube as a Chemical Sensor to Detect the Presence of Explosive Vapors: A First-Principles Insight. <i>Journal of Inorganic and Organometallic Polymers and Materials</i> , 2018 , 28, 2844-2	2853	27
179	Interaction Behavior of Cyanogen Fluoride and Chloride Gas Molecules on Red Phosphorene Nanosheet: A DFT Study. <i>Journal of Inorganic and Organometallic Polymers and Materials</i> , 2019 , 29, 954-	963	27
178	First-principles research on adsorption properties of o-xylene and styrene on 5B phosphorene sheets. <i>Chemical Physics Letters</i> , 2021 , 765, 138244	2.5	27
177	Investigation on bare and hydrogenated Sb-nanosheets as an electrode material for Na-ion battery - A DFT study. <i>Physica B: Condensed Matter</i> , 2019 , 562, 75-81	2.8	26
176	DFT investigation on the adsorption behavior of dimethyl and trimethyl amine molecules on borophene nanotube. <i>Chemical Physics Letters</i> , 2018 , 701, 34-42	2.5	26
175	Detection of nucleobases using 2D germanane nanosheet: A first-principles study. <i>Computational and Theoretical Chemistry</i> , 2018 , 1130, 68-76	2	26
174	NiO nanocone as a CO sensor: DFT investigation. <i>Structural Chemistry</i> , 2014 , 25, 1765-1771	1.8	26
173	Adsorption studies of trimethyl amine and n-butyl amine vapors on stanene nanotube molecular device [A first-principles study. <i>Chemical Physics</i> , 2018 , 501, 78-85	2.3	26
172	H2S and NH3 adsorption characteristics on CoO nanowire molecular device [A first-principles study. <i>Chemical Physics Letters</i> , 2015 , 636, 51-57	2.5	25

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171	Molecular adsorption of o-ethyltoluene and phenyl propane on square-octagon phosphorene nanosheet 🖪 first-principles calculation. <i>Journal of Molecular Liquids</i> , 2021 , 326, 115320	6	25	
170	Adsorption of ammonia molecules and humidity on germanane nanosheet-A density functional study. <i>Journal of Molecular Graphics and Modelling</i> , 2018 , 79, 149-156	2.8	25	
169	Diethanolamine and quaternium-15 interaction studies on antimonene nanosheet based on first-principles studies. <i>Computational and Theoretical Chemistry</i> , 2019 , 1157, 19-27	2	24	
168	Adamsite and chloropicrin molecular adsorption studies on novel green phosphorene nanotube [] First-principles investigation. <i>Chemical Physics</i> , 2020 , 535, 110782	2.3	24	
167	A novel approach for detection of NO 2 and SO 2 gas molecules using graphane nanosheet and nanotubes - A density functional application. <i>Diamond and Related Materials</i> , 2018 , 85, 53-62	3.5	24	
166	Chemisorption of Heptachlor and Mirex molecules on beta arsenene nanotubes IA first-principles analysis. <i>Applied Surface Science</i> , 2021 , 537, 147835	6.7	24	
165	Interaction of alcohols on monolayer stanane nanosheet: A first-principles investigation. <i>Applied Surface Science</i> , 2017 , 419, 9-15	6.7	23	
164	DFT Studies on Interaction of H2S Gas with #e2O3 Nanostructures. <i>Journal of Inorganic and Organometallic Polymers and Materials</i> , 2016 , 26, 394-404	3.2	23	
163	Structural and electronic properties of germanane nanosheet upon molecular adsorption of alcohol and aldehyde molecules: DFT comparative analysis. <i>Journal of Molecular Liquids</i> , 2017 , 242, 571-579	6	23	
162	Perceptions on the adsorption of COPD biomarker vapors on violet phosphorene nanosheet - A first-principles study. <i>Journal of Molecular Graphics and Modelling</i> , 2019 , 91, 22-29	2.8	22	
161	Density functional study on the binding properties of nucleobases to stanane nanosheet. <i>Applied Surface Science</i> , 2018 , 462, 831-839	6.7	22	
160	Investigation on band structure and electronic transport properties of indium nitride nanoribbon A first-principles study. <i>Superlattices and Microstructures</i> , 2014 , 65, 22-34	2.8	22	
159	Molecular adsorption studies of diethyl sulfide and ethyl methyl sulfide vapors on Ephosphorene nanoribbon [A first-principles insight. <i>Applied Surface Science</i> , 2020 , 534, 147597	6.7	22	
158	Silicene nanosheet device with nanopore to identify the nucleobases IA first-principles perspective. <i>Chemical Physics Letters</i> , 2019 , 730, 70-75	2.5	21	
157	Interaction study of amino acid on novel Kagome phosphorene nanotube 🛭 DFT outlook. <i>Computational and Theoretical Chemistry</i> , 2020 , 1186, 112903	2	21	
156	Adsorption behavior of cytosine and guanine nucleobases on graphyne nanosheets: A DFT study. <i>Computational and Theoretical Chemistry</i> , 2019 , 1163, 112514	2	21	
155	Novel green phosphorene sheets to detect tear gas molecules - A DFT insight. <i>Journal of Molecular Graphics and Modelling</i> , 2020 , 100, 107706	2.8	21	
154	Novel method to detect the lung cancer biomarker volatiles using hydrogen vacant silicane nanosheets: A DFT investigation. <i>Computational and Theoretical Chemistry</i> , 2018 , 1138, 107-116	2	20	

153	Nitrogen mustard gas molecules and Barsenene nanosheet interaction studies - A DFT insight. <i>Journal of Molecular Graphics and Modelling</i> , 2019 , 92, 65-73	2.8	20
152	Investigation on electronic properties of functionalized arsenene nanoribbon and nanotubes: A first-principles study. <i>Chemical Physics</i> , 2017 , 495, 35-41	2.3	20
151	A DFT study on adsorption behaviour of CO on Co3O4 nanostructures. <i>Applied Surface Science</i> , 2016 , 385, 113-121	6.7	20
150	Germanene nanosheets as a novel anode material for sodium-ion batteries first-principles investigation. <i>Materials Research Express</i> , 2019 , 6, 035504	1.7	20
149	Red tricycle phosphorene nanoribbon as a removing medium of sulfadiazine and sulfamethoxazole molecules based on first-principles studies. <i>Journal of Molecular Liquids</i> , 2021 , 336, 116294	6	20
148	Adsorption studies of ethanol and butanol on Co3O4 nanostructures IA DFT study. <i>Chemical Physics</i> , 2017 , 491, 61-68	2.3	19
147	Novel gamma arsenene nanosheets as sensing medium for vomiting agents: A first-principles research. <i>Computational and Theoretical Chemistry</i> , 2020 , 1185, 112876	2	19
146	Computational Studies on the Interaction of Formaldehyde Vapor with EPhosphorene Nanosheet: A DFT Insight. <i>ChemistrySelect</i> , 2020 , 5, 3398-3404	1.8	19
145	Exploring adsorption behavior of ethylene dichloride and dibromide vapors on blue phosphorene nanosheets: A first-principles acumens. <i>Journal of Molecular Graphics and Modelling</i> , 2020 , 95, 107505	2.8	19
144	Benzyl alcohol and 2-methyldecalin vapor adsorption studies on Ebismuthene sheets IA DFT outlook. <i>Chemical Physics Letters</i> , 2020 , 755, 137819	2.5	19
143	Germanene nanotube electroresistive molecular device for detection of NO2 and SO2 gas molecules: a first-principles investigation. <i>Journal of Computational Electronics</i> , 2019 , 18, 308-318	1.8	19
142	Investigation of electronic properties and spin-orbit coupling effects on passivated stanene nanosheet: A first-principles study. <i>Superlattices and Microstructures</i> , 2017 , 107, 118-126	2.8	18
141	DFT Study on the Interaction Properties of V-Series Nerve Agent Molecules on Novel Bismuthene Nanotubes. <i>Journal of Inorganic and Organometallic Polymers and Materials</i> , 2019 , 29, 2226-2236	3.2	18
140	Acrylonitrile vapor adsorption studies on armchair arsenene nanoribbon based on DFT study. <i>Applied Surface Science</i> , 2019 , 494, 1148-1155	6.7	18
139	Flutamide drug interaction studies on graphdiyne nanotube [A first-principles study. <i>Computational and Theoretical Chemistry</i> , 2019 , 1167, 112590	2	18
138	Interaction properties of benzyl chloride and chlorobenzene on violet phosphorene sheets IA first-principles perception. <i>Computational and Theoretical Chemistry</i> , 2019 , 1165, 112563	2	18
137	First-principles investigation on transport properties of NiO monowire-based molecular device. <i>Molecular Physics</i> , 2014 , 112, 1954-1962	1.7	18
136	DFT Investigation of Formaldehyde Adsorption Characteristics on MgO Nanotube. <i>Journal of Inorganic and Organometallic Polymers and Materials</i> , 2014 , 24, 1038-1047	3.2	18

135	Toxicants in cigarette smoke adsorbed on red phosphorene nanosheet: A first-principles insight. <i>Chemical Physics</i> , 2020 , 530, 110604	2.3	18	
134	Molecular interaction studies of cumene and toluene on Earsenene nanosheet 🗈 first-principles outlook. <i>Molecular Physics</i> , 2021 , 119, e1800853	1.7	18	
133	Electronic properties of novel bismuthene nanosheets with adsorption studies of G-series nerve agent molecules	2.3	17	
132	Sensing studies of DDT and Toxaphene molecules using chemi-resistive Eantimonene nanotubes based on first-principles insights. <i>Chemical Physics Letters</i> , 2020 , 757, 137895	2.5	17	
131	Investigation on probing explosive nitroaromatic compound vapors using graphyne nanosheet: a first-principle study. <i>Structural Chemistry</i> , 2019 , 30, 657-667	1.8	17	
130	Square-octagon arsenene nanosheet as chemical nanosensor for M-xylene and toluene A DFT outlook. <i>Computational and Theoretical Chemistry</i> , 2021 , 1196, 113088	2	17	
129	Interaction studies of dichlobenil and isoproturon on square-octagon phosphorene nanotube based on DFT frame work. <i>Chemical Physics Letters</i> , 2021 , 778, 138773	2.5	17	
128	Switching properties of quinquephenylene molecular device 🖪 first-principles approach. <i>Chemical Physics Letters</i> , 2017 , 675, 131-136	2.5	16	
127	First-principles studies on transport property and adsorption characteristics of trimethylamine on HoO3 molecular device. <i>Chemical Physics Letters</i> , 2015 , 641, 129-135	2.5	16	
126	Adsorption studies of volatile organic compounds on germanene nanotube emitted from banana fruit for quality assessment - A density functional application. <i>Journal of Molecular Graphics and Modelling</i> , 2018 , 82, 129-136	2.8	16	
125	Influence of fluorine substitution on the properties of CdO nanocluster : a DFT approach. <i>Structural Chemistry</i> , 2014 , 25, 389-401	1.8	16	
124	Arsenic pentafluoride surface adsorption studies on Kagome-phosphorene la DFT outlook. <i>Physics Letters, Section A: General, Atomic and Solid State Physics</i> , 2020 , 384, 126552	2.3	16	
123	First-Principles Insights of CO Adsorption Characteristics on Ge and In Substituted Silicene Nanosheet. <i>Silicon</i> , 2017 , 9, 327-337	2.4	15	
122	Interaction studies of volatiles from jackfruit on Ephosphorene nanosheet DFT outlook. <i>Structural Chemistry</i> , 2020 , 31, 1851-1860	1.8	15	
121	Interaction of volatile organic compounds (VOCs) emitted from banana on stanene nanosheet first-principles studies. <i>Structural Chemistry</i> , 2018 , 29, 1321-1332	1.8	15	
120	First-principles insights on the electronic and field emission properties of Ga and Al doped germanium nanocones. <i>Journal of Electron Spectroscopy and Related Phenomena</i> , 2018 , 227, 15-22	1.7	15	
119	First-principles studies on electronic transport properties of CdS nanoribbon based molecular device. <i>Ceramics International</i> , 2014 , 40, 9211-9216	5.1	15	
118	DFT investigation on structural stability, electronic properties and CO adsorption characteristics on anatase and rutile TiO 2 nanostructures. <i>Ceramics International</i> , 2014 , 40, 16147-16158	5.1	15	

117	First-principles insights on adsorption properties of NH3 on silicane nanoribbon and nanoring. <i>Applied Surface Science</i> , 2017 , 426, 1221-1231	6.7	15
116	Physical Properties of Spray Deposited Mg Doped CdO Thin Films. <i>Journal of Applied Sciences</i> , 2012 , 12, 1754-1757	0.3	15
115	Explosive vapor detection using novel graphdiyne nanoribbons first-principles investigation. <i>Structural Chemistry</i> , 2020 , 31, 709-717	1.8	15
114	Molecular adsorption studies of benzidine on novel Kagome antimonene nanosheets - Insights based on first-principles DFT calculations. <i>Journal of Molecular Liquids</i> , 2020 , 318, 113972	6	15
113	Interaction studies of nitrotoluene and toluidine molecules on novel square-octagon arsenene nanotubes based on DFT method. <i>Journal of Molecular Liquids</i> , 2021 , 325, 115260	6	15
112	Interaction studies of glycine, acetate and methylamine on Etellurene nanoribbon - A first-principles analysis. <i>Journal of Molecular Graphics and Modelling</i> , 2021 , 105, 107895	2.8	15
111	Adsorption studies of nucleobases on Earsenene nanosheet based on first-principles research. Journal of Molecular Graphics and Modelling, 2021 , 103, 107827	2.8	15
110	Alcohol molecular interaction studies on stair phosphorene nanosheets: a first-principles approach. <i>Structural Chemistry</i> , 2021 , 32, 27-36	1.8	15
109	Adsorption behaviour of trichloropropane and tetrachloroethylene on Ephosphorene sheets: A first-principles insight. <i>Computational and Theoretical Chemistry</i> , 2021 , 1203, 113347	2	15
108	Study of Alcohol and Aldehydes Interaction on the Surface of Silicane Nanosheet: Application of Density Functional Theory. <i>Journal of Inorganic and Organometallic Polymers and Materials</i> , 2017 , 27, 1307-1316	3.2	14
107	First-principles analysis of the detection of amine vapors using an antimonene electroresistive molecular device. <i>Journal of Computational Electronics</i> , 2019 , 18, 779-790	1.8	14
106	Exploring electronic transport properties of AlN nanoribbon molecular device 🖪 first-principles investigation. <i>Solid State Sciences</i> , 2015 , 39, 45-51	3.4	14
105	Surface adsorption studies of benzyl bromide and bromobenzyl cyanide vapours on black phosphorene nanosheets ha first-principles perception. <i>Molecular Physics</i> , 2020 , 118, e1737744	1.7	14
104	First-principles investigation on transport properties of (hbox {Zn}_{2}hbox {SnO}_{4}) molecular device and response toward (hbox {NO}_{2}) gas molecules. <i>Journal of Computational Electronics</i> , 2018 , 17, 1-8	1.8	14
103	DFT investigation of NH3 gas interactions on TeO2 nanostructures. <i>Progress in Natural Science: Materials International</i> , 2016 , 26, 129-138	3.6	14
102	Nucleobases adsorption studies on silicane layer: A first-principles investigation. <i>Journal of Molecular Graphics and Modelling</i> , 2018 , 85, 48-55	2.8	14
101	Doped aluminum nanocones as an efficient electron field emitter: A first-principles investigation. <i>Inorganic Chemistry Communication</i> , 2018 , 96, 5-12	3.1	14
100	FIRST-PRINCIPLES INVESTIGATION ON BAND STRUCTURE AND ELECTRONIC TRANSPORT PROPERTY OF GALLIUM NITRIDE NANORIBBON. <i>Nano</i> , 2014 , 09, 1450020	1.1	14

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99	Investigation on the structural stability and electronic properties of InSb nanostructures IA DFT approach. <i>AEJ - Alexandria Engineering Journal</i> , 2014 , 53, 437-444	6.1	14	
98	A DFT study on the structural and electronic properties of ZnTe nanoclusters. <i>EPJ Applied Physics</i> , 2013 , 62, 30101	1.1	14	
97	Molecular interaction studies of styrene on single and double-walled square-octagon phosphorene nanotubes [First-principles investigation. <i>Chemical Physics Letters</i> , 2021 , 785, 139149	2.5	14	
96	N-nitrosodimethylamine interaction studies on gamma phosphorene sheets emitted from rubber fumes [A first-principles study. <i>Physica B: Condensed Matter</i> , 2020 , 577, 411808	2.8	14	
95	Interaction studies of diclofenac and ibuprofen molecules on armchair bismuthene nanotubes: A first-principles study. <i>Chemical Physics</i> , 2021 , 546, 111169	2.3	14	
94	Zipper phosphorene as sensing element towards formaldehyde and acetaldehyde - A first-principles insight. <i>Journal of Molecular Graphics and Modelling</i> , 2021 , 107, 107971	2.8	14	
93	Adsorption behaviour of sulfisoxazole molecules on tricycle arsenene nanoribbon - a first-principles study. <i>Journal of Molecular Liquids</i> , 2021 , 343, 117635	6	14	
92	Novel Earsenene nanosheets for sensing toxic malathion and parathion IA first-principles approach. <i>Computational and Theoretical Chemistry</i> , 2020 , 1190, 112995	2	13	
91	Halomethane Adsorption Studies on Silicane Sheets: A First-Principles Perception. <i>Journal of Inorganic and Organometallic Polymers and Materials</i> , 2020 , 30, 3263-3275	3.2	13	
90	Electronic transport properties and CO adsorption characteristics on TiO2 molecular device IA first-principles study. <i>Microelectronic Engineering</i> , 2016 , 162, 51-56	2.5	13	
89	Methane adsorption characteristics on EGa2O3 nanostructures: DFT investigation. <i>Applied Surface Science</i> , 2015 , 344, 65-78	6.7	13	
88	First-principles insights on mechanical and electronic properties of TiX (X=C,N) in Esi3N4 based ceramics. <i>Processing and Application of Ceramics</i> , 2016 , 10, 153-160	1.4	13	
87	Interaction properties of phenol and styrene from plastic fumes on EArsenene sheets: A first-principles study. <i>Physica B: Condensed Matter</i> , 2020 , 597, 412405	2.8	13	
86	First-principles studies on sensing properties of delta arsenene nanoribbons towards hexane and heptane molecules. <i>Computational and Theoretical Chemistry</i> , 2021 , 1201, 113256	2	13	
85	Interaction Studies of Methanol and Ethanol Vapors on Green Phosphorene Sheets: A First-Principles Study. <i>ChemistrySelect</i> , 2019 , 4, 14237-14243	1.8	13	
84	Surface assimilation studies of ethyl methyl sulfide on gamma phosphorene sheets b DFT outlook. <i>Molecular Physics</i> , 2020 , 118, e1774089	1.7	12	
83	Band structure and transport studies on impurity substituted InSe nanosheet IA first-principles investigation. <i>Superlattices and Microstructures</i> , 2015 , 79, 135-147	2.8	12	
82	Dimethyl and ethyl methyl ether adsorption studies on Eantimonene nanosheets Ea first-principles study. <i>Molecular Simulation</i> , 2020 , 46, 1354-1361	2	12	

81	Molecular interaction of oxytetracycline and sulfapyridine on blue phosphorene nanotubes: A first-principles insight. <i>Physics Letters, Section A: General, Atomic and Solid State Physics</i> , 2021 , 394, 1271	3 8³	12
80	Mechanical and electronic properties under high pressure on ternary AlGaN and InGaN compounds first-principles perspective. <i>Materials Research Express</i> , 2019 , 6, 015052	1.7	12
79	Benzyl Chloride and Chlorobenzene Adsorption Studies on Bismuthene Nanosheet: A DFT Study. Journal of Inorganic and Organometallic Polymers and Materials, 2020 , 30, 1888-1897	3.2	12
78	High-pressure studies on electronic and mechanical properties of FeBO3 (B = Ti, Mn, Cr) ceramics a first-principles study. <i>Phase Transitions</i> , 2018 , 91, 382-397	1.3	12
77	Interaction Studies of Ammonia Gas Molecules on Borophene Nanosheet and Nanotubes: A Density Functional Study. <i>Journal of Inorganic and Organometallic Polymers and Materials</i> , 2018 , 28, 920-931	3.2	12
76	First-principles studies on mechanical properties and band structures of TMO2 (TM = Zr or Hf) nanostructures under high pressure. <i>Physica B: Condensed Matter</i> , 2019 , 559, 1-7	2.8	11
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