Rashid R Valiev

List of Publications by Year in Descending Order

90 papers	1,745 citations	22 h-index	39 g-index
102 ext. papers	2,091 ext. citations	4.3 avg, IF	5.14 L-index

#	Paper	IF	Citations
90	Vibronic Spectra of Bifluorene and Terfluorene. *Russian Physics Journal*, **2022**, 64, 2082-2088	0.7	1
89	Dianthracenylazatrioxa[8]circulene: Synthesis, Characterization and Application in OLEDs. *Chemistry - A European Journal*, **2021**, 27, 11609-11617	4.8	4
88	Fast estimation of the internal conversion rate constant in photophysical applications. *Physical Chemistry Chemical Physics*, **2021**, 23, 6344-6348	3.6	5
87	Molecular mechanism for rapid autoxidation in □pinene ozonolysis. *Nature Communications*, **2021**, 12, 878	17.4	16
86	Franck-Condon factors and vibronic patterns of singlet-triplet transitions of 16O3 molecule falling near the dissociation threshold and above. *Journal of Quantitative Spectroscopy and Radiative Transfer*, **2021**, 273, 107834	2.1	1
85	A hybrid molecular sensitizer for triplet fusion upconversion. *Chemical Engineering Journal*, **2021**, 426, 131282	14.7	0
84	Single-layer polymeric tetraoxa[8]circulene modified by s-block metals: toward stable spin qubits and novel superconductors. *Nanoscale*, **2021**, 13, 4799-4811	7.7	2
83	Aromaticity of Even-Number Cyclo[]carbons (= 6-100). *Journal of Physical Chemistry A*, **2020**, 124, 10849-10855	2.8	12
82	Can Plasmon Change Reaction Path? Decomposition of Unsymmetrical Iodonium Salts as an Organic Probe. *Journal of Physical Chemistry Letters*, **2020**, 11, 5770-5776	6.4	20
81	Interlayer-Sensitized Linear and Nonlinear Photoluminescence of Quasi-2D Hybrid Perovskites Using Aggregation-Induced Enhanced Emission Active Organic Cation Layers. *Advanced Functional Materials*, **2020**, 30, 1909375	15.6	8
80	Theoretical Study of Nonradiative Energy Transfer from Exciplex to Perovskites. *Russian Physics Journal*, **2020**, 62, 1911-1916	0.7	0
79	Photolysis of diatomic molecules as a source of atoms in planetary exospheres. *Astronomy and Astrophysics*, **2020**, 633, A39	5.1	13
78	Competition between the nonadiabatic electronic state-mixing and the Herzberg-Teller vibronic effects in fluorescence process of tetraoxa[8]circulene. *Chemical Physics Letters*, **2020**, 738, 136914	2.5	3
77	Perhalophenyl Three-Coordinate Gold(I) Complexes as TADF Emitters: A Photophysical Study from Experimental and Computational Viewpoints. *Inorganic Chemistry*, **2020**, 59, 14236-14244	5.1	8
76	Application of a 2D Molybdenum Telluride in SERS Detection of Biorelevant Molecules. *ACS Applied Materials & Interfaces*, **2020**, 12, 47774-47783	9.5	14
75	The effect of anion complexation on the aromatic properties of aromatic and antiaromatic porphyrinoids. *New Journal of Chemistry*, **2020**, 44, 20643-20650	3.6	2
74	Is either direct photolysis or photocatalysed H-shift of peroxyl radicals a competitive pathway in the troposphere?. *Royal Society Open Science*, **2020**, 7, 200521	3.3	

73	When are Antiaromatic Molecules Paramagnetic?. *Journal of Physical Chemistry C*, **2020**, 124, 21027-21035	3.7	13
72	Comparing Reaction Routes for (ROOOOOR') Intermediates Formed in Peroxy Radical Self- and Cross-Reactions. *Journal of Physical Chemistry A*, **2020**, 124, 8305-8320	2.8	5
71	First-principles calculations of anharmonic and deuteration effects on the photophysical properties of polyacenes and porphyrinoids. *Physical Chemistry Chemical Physics*, **2020**, 22, 22314-22323	3.6	15
70	Photophysical properties of the triangular [Au(HN[double bond, length as m-dash]COH)] complex and its dimer. *Physical Chemistry Chemical Physics*, **2020**, 22, 10314-10321	3.6	3
69	Thermally activated delayed fluorescence in dibenzothiophene sulfone derivatives: Theory and experiment. *Chemical Physics Letters*, **2019**, 717, 53-58	2.5	7
68	Positional Isomers of Isocyanoazulenes as Axial Ligands Coordinated to Ruthenium(II) Tetraphenylporphyrin: Fine-Tuning Redox and Optical Profiles. *Inorganic Chemistry*, **2019**, 58, 9316-9325	5.1	4
67	2-Iodoxybenzoic acid ditriflate: the most powerful hypervalent iodine(v) oxidant. *Chemical Communications*, **2019**, 55, 7760-7763	5.8	18
66	Electroluminescence of a Zinc Complex Exciplex with a Hole-Transporting Material. *Russian Physics Journal*, **2019**, 62, 140-146	0.7	1
65	Deacetylation of per-acetatylated glycopyranosides: An overall pattern for acidic catalyzis. *Chemical Physics Letters*, **2019**, 723, 123-127	2.5	3
64	Aromaticity and photophysics of tetrasila- and tetragerma-annelated tetrathienylenes as new representatives of the hetero[8]circulene family. *Physical Chemistry Chemical Physics*, **2019**, 21, 9246-9254	3.6	16
63	Photophysical Constants of the Tetraoxa[8]Circulene Molecule. *Russian Physics Journal*, **2019**, 61, 1759-1763	0.7	2
62	The blue vibronically resolved electroluminescence of azatrioxa[8]circulene. *Chemical Physics Letters*, **2019**, 732, 136667	2.5	7
61	Calculating rate constants for intersystem crossing and internal conversion in the Franck-Condon and Herzberg-Teller approximations. *Physical Chemistry Chemical Physics*, **2019**, 21, 18495-18500	3.6	22
60	Intersystem Crossings Drive Atmospheric Gas-Phase Dimer Formation. *Journal of Physical Chemistry A*, **2019**, 123, 6596-6604	2.8	17
59	Ab Initio Study of Phosphorescence of Hetero[8]Circulenes. *Russian Physics Journal*, **2019**, 62, 406-410	0.7	1
58	Impact of heteroatoms (S, Se, and Te) on the aromaticity of heterocirculenes. *New Journal of Chemistry*, **2019**, 43, 12178-12190	3.6	4
57	Cyclo[18]carbon: Insight into Electronic Structure, Aromaticity, and Surface Coupling. *Journal of Physical Chemistry Letters*, **2019**, 10, 6701-6705	6.4	57
56	Computational study of aromaticity, H NMR spectra and intermolecular interactions of twisted thia-norhexaphyrin and its multiply annulated polypyrrolic derivatives. *Physical Chemistry Chemical Physics*, **2019**, 21, 25334-25343	3.6	3

55	First-principles method for calculating the rate constants of internal-conversion and intersystem-crossing transitions. *Physical Chemistry Chemical Physics*, **2018**, 20, 6121-6133	3.6	50
54	A new look at acid catalyzed deacetylation of carbohydrates: A regioselective synthesis and reactivity of 2-O-acetyl aryl glycopyranosides. *Carbohydrate Research*, **2018**, 458-459, 60-66	2.9	5
53	Verdazyl Radical Building Blocks: Synthesis, Structure, and Sonogashira Cross-Coupling Reactions. *European Journal of Organic Chemistry*, **2018**, 2018, 4802-4811	3.2	16
52	Optical tuning of tetrabenzo[8]circulene derivatives through pseudorotational conformational isomerization. *Dyes and Pigments*, **2018**, 151, 372-379	4.6	4
51	Reactions of 1-Arylbenziodoxolones with Azide Anion: Experimental and Computational Study of Substituent Effects. *European Journal of Organic Chemistry*, **2018**, 2018, 640-647	3.2	8
50	Vibronic absorption spectra of the angular fused bisindolo- and biscarbazoloanthracene blue fluorophores for OLED applications. *Chemical Physics*, **2018**, 513, 105-111	2.3	2
49	Computational Studies of Aromatic and Photophysical Properties of Expanded Porphyrins. *Journal of Physical Chemistry A*, **2018**, 122, 4756-4767	2.8	33
48	Photon Upconversion Kinetic Nanosystems and Their Optical Response. *Laser and Photonics Reviews*, **2018**, 12, 1700144	8.3	24
47	Relations between the aromaticity and magnetic dipole transitions in the electronic spectra of hetero[8]circulenes. *Physical Chemistry Chemical Physics*, **2018**, 20, 30239-30246	3.6	10
46	The aromaticity of verdazyl radicals and their closed-shell charged species. *New Journal of Chemistry*, **2018**, 42, 19987-19994	3.6	5
45	Bicycloaromaticity and Baird-type bicycloaromaticity of dithienothiophene-bridged [34]octaphyrins. *Physical Chemistry Chemical Physics*, **2018**, 20, 17705-17713	3.6	17
44	A computational study of aromaticity and photophysical properties of unsymmetrical azatrioxa[8]circulenes. *New Journal of Chemistry*, **2017**, 41, 2717-2723	3.6	15
43	Dye-sensitized lanthanide-doped upconversion nanoparticles. *Chemical Society Reviews*, **2017**, 46, 4150-4167	5.8	203
42	Substituent-sensitive fluorescence of sequentially N-alkylated tetrabenzotetraaza[8]circulenes. *New Journal of Chemistry*, **2017**, 41, 7621-7625	3.6	9
41	Optimization of core–valence states of molecules. *Molecular Physics*, **2017**, 115, 252-259	1.7	1
40	Closed-shell paramagnetic porphyrinoids. *Chemical Communications*, **2017**, 53, 9866-9869	5.8	31
39	Optical and magnetic properties of antiaromatic porphyrinoids. *Physical Chemistry Chemical Physics*, **2017**, 19, 25979-25988	3.6	17
38	Photolysis of metal oxides as a source of atoms in planetary exospheres. *Planetary and Space Science*, **2017**, 145, 38-48	2	6

37	Influence of Molecular Oxygen on Ortho-Para Conversion of Water Molecules. *Russian Physics Journal*, **2017**, 60, 485-493	0.7	1
36	Experimental and theoretical study of photo- and electroluminescence of divinyldiphenyl and divinylphenanthrene derivatives. *Spectrochimica Acta - Part A: Molecular and Biomolecular Spectroscopy*, **2017**, 173, 59-64	4.4	3
35	Ab initio investigation of electric and magnetic dipole electronic transitions in the complex of oxygen with benzene. *Journal of Molecular Modeling*, **2016**, 22, 214	2	4
34	Ab Initio Study of Electronic States of Astrophysically Important Molecules. *Russian Physics Journal*, **2016**, 59, 536-543	0.7	7
33	Efficient Broadband Upconversion of Near-Infrared Light in Dye-Sensitized Core/Shell Nanocrystals. *Advanced Optical Materials*, **2016**, 4, 1760-1766	8.1	85
32	Benzoannelated aza-, oxa- and azaoxa[8]circulenes as promising blue organic emitters. *Physical Chemistry Chemical Physics*, **2016**, 18, 28040-28051	3.6	45
31	Design, synthesis and evaluation of a new Mn □Contrast agent for MR imaging of myocardium based on the DTPA-phenylpentadecanoic acid complex. *Chemical Physics Letters*, **2016**, 665, 111-116	2.5	3
30	Stimulated Emission of Active Media in the Red Spectral Range. *Russian Physics Journal*, **2016**, 59, 1-7	0.7	1
29	Complex Study of Electronic States and Spectra of 3-Nitroformazans. *Russian Physics Journal*, **2016**, 59, 197-203	0.7	1
28	Electroluminescence of Halogen Complexes with Monovalent Copper: OLED Devices and DFT Modeling. *Russian Physics Journal*, **2016**, 58, 1205-1211	0.7	10
27	New insights into aromatic pathways of carbachlorins and carbaporphyrins based on calculations of magnetically induced current densities. *Physical Chemistry Chemical Physics*, **2016**, 18, 11932-41	3.6	26
26	Aromaticity of the doubly charged [8]circulenes. *Physical Chemistry Chemical Physics*, **2016**, 18, 8980-92	3.6	27
25	General and Simple Method for the Synthesis of 3-nitroformazan Using Arenediazonium Tosylates. *Current Organic Synthesis*, **2016**, 13, 623-628	1.9	3
24	DFT simulation of the heteroannelated octatetraenes vibronic spectra with the Franck□Condon and Herzberg□Teller approaches including Duschinsky effect. *Chemical Physics*, **2015**, 459, 65-71	2.3	21
23	The first example of a one-step synthesis of 2SO-acetyl aryl-D-glucopyranosides. *Carbohydrate Research*, **2015**, 409, 36-40	2.9	5
22	Predicting the degree of aromaticity of novel carbaporphyrinoids. *Physical Chemistry Chemical Physics*, **2015**, 17, 14215-22	3.6	24
21	Computational and experimental investigation of the optical properties of the chromene dyes. *Journal of Physical Chemistry A*, **2015**, 119, 1948-56	2.8	20
20	Aromaticity of the completely annelated tetraphenylenes: NICS and GIMIC characterization. *Journal of Molecular Modeling*, **2015**, 21, 136	2	29

19	Energy-Cascaded Upconversion in an Organic Dye-Sensitized Core/Shell Fluoride Nanocrystal. *Nano Letters*, **2015**, 15, 7400-7	11.5	279
18	Aromatic pathways in carbathiaporphyrins. *Journal of Physical Chemistry A*, **2015**, 119, 1201-7	2.8	23
17	Theoretical and experimental investigation of photophysical properties of Zn(DFP SAMQ)2. *Spectrochimica Acta - Part A: Molecular and Biomolecular Spectroscopy*, **2014**, 128, 137-40	4.4	17
16	Ab initio simulation of pyrene spectra in water matrices. *RSC Advances*, **2014**, 4, 42054-42065	3.7	34
15	Theoretical Investigation of the Structural and Spectroscopic Properties of Anthracene Dimers. *Russian Physics Journal*, **2014**, 57, 95-99	0.7	4
14	Aromaticity of the planar hetero[8]circulenes and their doubly charged ions: NICS and GIMIC characterization. *Physical Chemistry Chemical Physics*, **2014**, 16, 15367-74	3.6	59
13	The aromatic character of thienopyrrole-modified 20□electron porphyrinoids. *Physical Chemistry Chemical Physics*, **2014**, 16, 11010-6	3.6	25
12	The computational and experimental investigations of photophysical and spectroscopic properties of BF2 dipyrromethene complexes. *Spectrochimica Acta - Part A: Molecular and Biomolecular Spectroscopy*, **2014**, 117, 323-9	4.4	32
11	Computational and experimental studies of the electronic excitation spectra of EDTA and DTPA substituted tetraphenylporphyrins and their Lu complexes. *Journal of Molecular Modeling*, **2013**, 19, 4631-7	2	4
10	The influence of benzene rings on aromatic pathways in the porphyrins. *International Journal of Quantum Chemistry*, **2013**, 113, 2563-2567	2.1	18
9	Insights into magnetically induced current pathways and optical properties of isophlorins. *Journal of Physical Chemistry A*, **2013**, 117, 9062-8	2.8	37
8	Lasing of pyrromethene 567 in solid matrices. *Chemical Physics Letters*, **2013**, 588, 184-187	2.5	17
7	Electronic absorption spectrum of monoamine tetraphenylporphyrin with the complexon of ethylenediaminetetraacetic acid as substitute. *Spectrochimica Acta - Part A: Molecular and Biomolecular Spectroscopy*, **2012**, 87, 40-5	4.4	12
6	Electronic absorption spectrum of monoaminosubstituted tetraphenylporphyrin with diethylenetriaminepenetaacetic acid for the substitute. *Russian Physics Journal*, **2012**, 55, 378-382	0.7	4
5	Theoretical investigation of fluorescence properties of EDTA and DTPA substituted tetraphenylporphyrin molecules. *Spectrochimica Acta - Part A: Molecular and Biomolecular Spectroscopy*, **2012**, 99, 122-5	4.4	5
4	Computational studies of photophysical properties of porphin, tetraphenylporphyrin and tetrabenzoporphyrin. *Physical Chemistry Chemical Physics*, **2012**, 14, 11508-17	3.6	51
3	Theoretical studies as a tool for understanding the aromatic character of porphyrinoid compounds. *Chemical Modelling*,1-42	2	25
2	Plasmon-assisted MXene grafting: tuning of surface termination and stability enhancement. *2D Materials*,	5.9	6

1 Less is more: on the effect of benzannulation on the solid-state emission of difluoroborates. *Journal of Materials Chemistry C*, 7.1 1