Anthony K Cheetham

List of Publications by Citations

Source: https://exaly.com/author-pdf/7907935/anthony-k-cheetham-publications-by-citations.pdf
Version: 2024-04-27

This document has been generated based on the publications and citations recorded by exaly.com. For the latest version of this publication list, visit the link given above.
The third column is the impact factor (IF) of the journal, and the fourth column is the number of citations of the article.

190 papers	16,746 citations	66 h-index	126 g-index
209 ext. papers	19,029 ext. citations	10.3 avg, IF	7.05 L-index

#	Paper	IF	Citations
190	Structural diversity and chemical trends in hybrid inorganic-organic framework materials. *Chemical Communications*, **2006**, 4780-95	5.8	945
189	Multiferroic behavior associated with an order-disorder hydrogen bonding transition in metal-organic frameworks (MOFs) with the perovskite ABX3 architecture. *Journal of the American Chemical Society*, **2009**, 131, 13625-7	16.4	653
188	Solid-state principles applied to organic–inorganic perovskites: new tricks for an old dog. *Chemical Science*, **2014**, 5, 4712-4715	9.4	610
187	Chemically diverse and multifunctional hybrid organic–inorganic perovskites. *Nature Reviews Materials*, **2017**, 2,	73.3	608
186	Mechanical properties of hybrid inorganic-organic framework materials: establishing fundamental structure-property relationships. *Chemical Society Reviews*, **2011**, 40, 1059-80	58.5	533
185	An extended Tolerance Factor approach for organic-inorganic perovskites. *Chemical Science*, **2015**, 6, 3430-3433	9.4	439
184	Order-disorder antiferroelectric phase transition in a hybrid inorganic-organic framework with the perovskite architecture. *Journal of the American Chemical Society*, **2008**, 130, 10450-1	16.4	389
183	The role of temperature in the synthesis of hybrid inorganic-organic materials: the example of cobalt succinates. *Chemical Communications*, **2004**, 368-9	5.8	369
182	The effect of pressure on ZIF-8: increasing pore size with pressure and the formation of a high-pressure phase at 1.47 GPa. *Angewandte Chemie - International Edition*, **2009**, 48, 7087-9	16.4	363
181	Chemical structure, network topology, and porosity effects on the mechanical properties of Zeolitic Imidazolate Frameworks. *Proceedings of the National Academy of Sciences of the United States of America*, **2010**, 107, 9938-43	11.5	362
180	Amorphous metal-organic frameworks. *Accounts of Chemical Research*, **2014**, 47, 1555-62	24.3	357
179	Carbon with hierarchical pores from carbonized metal-organic frameworks for lithium sulphur batteries. *Chemical Communications*, **2013**, 49, 2192-4	5.8	321
178	Materials science. There's room in the middle. *Science*, **2007**, 318, 58-9	33.3	317
177	Rapid room-temperature synthesis of zeolitic imidazolate frameworks by using mechanochemistry. *Angewandte Chemie - International Edition*, **2010**, 49, 9640-3	16.4	312
176	A high-throughput investigation of the role of pH, temperature, concentration, and time on the synthesis of hybrid inorganic-organic materials. *Angewandte Chemie - International Edition*, **2005**, 44, 7608-11	16.4	264
175	Interplay between defects, disorder and flexibility in metal-organic frameworks. *Nature Chemistry*, **2016**, 9, 11-16	17.6	256
174	Understanding of Electrochemical Mechanisms for CO Capture and Conversion into Hydrocarbon Fuels in Transition-Metal Carbides (MXenes). *ACS Nano*, **2017**, 11, 10825-10833	16.7	236

173	The synthesis, structure and electronic properties of a lead-free hybrid inorganic–organic double perovskite (MA)2KBiCl6 (MA = methylammonium). *Materials Horizons*, **2016**, 3, 328-332	14.4	221
172	Synthesis and Properties of a Lead-Free Hybrid Double Perovskite: (CH3NH3)2AgBiBr6. *Chemistry of Materials*, **2017**, 29, 1089-1094	9.6	217
171	Negative linear compressibility of a metal-organic framework. *Journal of the American Chemical Society*, **2012**, 134, 11940-3	16.4	216
170	Porous Organic Cage Thin Films and Molecular-Sieving Membranes. *Advanced Materials*, **2016**, 28, 2629-37	24	209
169	Controlled thermal oxidative crosslinking of polymers of intrinsic microporosity towards tunable molecular sieve membranes. *Nature Communications*, **2014**, 5, 4813	17.4	199
168	Structure and properties of an amorphous metal-organic framework. *Physical Review Letters*, **2010**, 104, 115503	7.4	198
167	Cobalt oxide and N-doped carbon nanosheets derived from a single two-dimensional metal-organic framework precursor and their application in flexible asymmetric supercapacitors. *Nanoscale Horizons*, **2017**, 2, 99-105	10.8	183
166	Zeolitic imidazole frameworks: structural and energetics trends compared with their zeolite analogues. *CrystEngComm*, **2009**, 11, 2272	3.3	181
165	MOF-derived nanohybrids for electrocatalysis and energy storage: current status and perspectives. *Chemical Communications*, **2018**, 54, 5268-5288	5.8	177
164	Exploring the properties of lead-free hybrid double perovskites using a combined computational-experimental approach. *Journal of Materials Chemistry A*, **2016**, 4, 12025-12029	13	176
163	Hybrid glasses from strong and fragile metal-organic framework liquids. *Nature Communications*, **2015**, 6, 8079	17.4	164
162	Resolving the Physical Origin of Octahedral Tilting in Halide Perovskites. *Chemistry of Materials*, **2016**, 28, 4259-4266	9.6	163
161	Melt-Quenched Glasses of Metal-Organic Frameworks. *Journal of the American Chemical Society*, **2016**, 138, 3484-92	16.4	161
160	Facile mechanosynthesis of amorphous zeolitic imidazolate frameworks. *Journal of the American Chemical Society*, **2011**, 133, 14546-9	16.4	155
159	Reversible pressure-induced amorphization of a zeolitic imidazolate framework (ZIF-4). *Chemical Communications*, **2011**, 47, 7983-5	5.8	152
158	Role of hydrogen-bonding and its interplay with octahedral tilting in CH3NH3PbI3. *Chemical Communications*, **2015**, 51, 6434-7	5.8	146
157	Mechanical tunability via hydrogen bonding in metal-organic frameworks with the perovskite architecture. *Journal of the American Chemical Society*, **2014**, 136, 7801-4	16.4	146
156	Theoretical Calculations on Silica Frameworks and Their Correlation with Experiment. *Chemistry of Materials*, **1994**, 6, 1647-1650	9.6	144

155	Rational Design of Holey 2D Nonlayered Transition Metal Carbide/Nitride Heterostructure Nanosheets for Highly Efficient Water Oxidation. *Advanced Energy Materials*, **2019**, 9, 1803768	21.8	143
154	Mechanical properties of organic–inorganic halide perovskites, CH3NH3PbX3 (X = I, Br and Cl), by nanoindentation. *Journal of Materials Chemistry A*, **2015**, 3, 18450-18455	13	139
153	Janus Membranes: Creating Asymmetry for Energy Efficiency. *Advanced Materials*, **2018**, 30, e1801495	24	135
152	Correlations between 31P n.m.r. chemical shifts and structural parameters in crystalline inorganic phosphates. *Journal of the Chemical Society Chemical Communications*, **1986**, 195		128
151	Defects and disorder in metal organic frameworks. *Dalton Transactions*, **2016**, 45, 4113-26	4.3	125
150	Fundamental Carrier Lifetime Exceeding 1 μs in Cs2AgBiBr6 Double Perovskite. *Advanced Materials Interfaces*, **2018**, 5, 1800464	4.6	114
149	Hierarchical bicontinuous porosity in metal–organic frameworks templated from functional block co-oligomer micelles. *Chemical Science*, **2013**, 4, 3573	9.4	113
148	How Strong Is the Hydrogen Bond in Hybrid Perovskites?. *Journal of Physical Chemistry Letters*, **2017**, 8, 6154-6159	6.4	110
147	Phase Transitions in Zeolitic Imidazolate Framework 7: The Importance of Framework Flexibility and Guest-Induced Instability. *Chemistry of Materials*, **2014**, 26, 1767-1769	9.6	109
146	Mechanical properties of dense zeolitic imidazolate frameworks (ZIFs): a high-pressure X-ray diffraction, nanoindentation and computational study of the zinc framework Zn(Im)2, and its lithium-boron analogue, LiB(Im)4. *Chemistry - A European Journal*, **2010**, 16, 10684-90	4.8	105
145	Oxide phosphors for efficient light upconversion: Yb3+ and Er3+ co-doped Ln2BaZnO5 (Ln = Y, Gd). *Journal of Materials Chemistry*, **2010**, 20, 3989		98
144	Thermochemistry of zeolitic imidazolate frameworks of varying porosity. *Journal of the American Chemical Society*, **2013**, 135, 598-601	16.4	97
143	Yttrium-89 magic angle spinning NMR study of rare-earth pyrochlores: paramagnetic shifts in the solid state. *Journal of the American Chemical Society*, **1990**, 112, 4670-4675	16.4	93
142	Ce3+-Activated α-Ca2SiO4 and Other Olivine-Type ABXO4 Phosphors for Solid-State Lighting. *Chemistry of Materials*, **2014**, 26, 3966-3975	9.6	92
141	Synthesis, crystal structure, and properties of a perovskite-related bismuth phase, (NH4)3Bi2I9. *APL Materials*, **2016**, 4, 031101	5.7	91
140	Efficient oxide phosphors for light upconversion; green emission from Yb3+ and Ho3+ co-doped Ln2BaZnO5 (Ln = Y, Gd). *Journal of Materials Chemistry*, **2011**, 21, 1387-1394		90
139	Epitaxial growth and properties of metastable BiMnO3 thin films. *Applied Physics Letters*, **2004**, 84, 91-93	3.4	89
138	Chemical and Structural Diversity of Hybrid Layered Double Perovskite Halides. *Journal of the American Chemical Society*, **2019**, 141, 19099-19109	16.4	85

137	Dimensionality Trends in Metal Organic Frameworks Containing Perfluorinated or Nonfluorinated Benzenedicarboxylates. *Crystal Growth and Design*, **2010**, 10, 2041-2043	3.5	85
136	Switchable electric polarization and ferroelectric domains in a metal-organic-framework. *Npj Quantum Materials*, **2016**, 1,	5	84
135	Structure and Magnetism of VSB-2, -3, and -4 or Ni4(O3P-(CH2)-PO3)2(H2O)n(n= 3, 2, 0), the First Ferromagnetic Nickel(II) Diphosphonates: Increase of Dimensionality and Multiple Coordination Changes during a Quasi Topotactic Dehydration. *Chemistry of Materials*, **1999**, 11, 2937-2947	9.6	84
134	Thermodynamic and Kinetic Effects in the Crystallization of Metal-Organic Frameworks. *Accounts of Chemical Research*, **2018**, 51, 659-667	24.3	83
133	Liquid exfoliation of alkyl-ether functionalised layered metal-organic frameworks to nanosheets. *Chemical Communications*, **2016**, 52, 10474-7	5.8	78
132	Enhanced H2 adsorption enthalpy in the low-surface area, partially fluorinated coordination polymer Zn5(triazole)6(tetrafluoroterephthalate)2(H2O)2·4H2O. *Journal of Materials Chemistry*, **2009**, 19, 4307		77
131	Phase selection and energetics in chiral alkaline Earth tartrates and their racemic and meso analogues: synthetic, structural, computational, and calorimetric studies. *Journal of the American Chemical Society*, **2009**, 131, 15375-86	16.4	75
130	Rapid Room-Temperature Synthesis of Zeolitic Imidazolate Frameworks by Using Mechanochemistry. *Angewandte Chemie*, **2010**, 122, 9834-9837	3.6	73
129	Anionic Metal Organic Frameworks of Bismuth Benzenedicarboxylates: Synthesis, Structure and Ligand-Sensitized Photoluminescence. *European Journal of Inorganic Chemistry*, **2010**, 2010, 3823-3828	2.3	71
128	Controlled Reduction of Vanadium Oxide Nanoscrolls: Crystal Structure, Morphology, and Electrical Properties. *Chemistry of Materials*, **2008**, 20, 6396-6404	9.6	71
127	Synthesis, structure and optical properties of cerium-doped calcium barium phosphate – a novel blue-green phosphor for solid-state lighting. *Journal of Materials Chemistry C*, **2015**, 3, 204-210	7.1	70
126	Influence of ligand field stabilization energy on the elastic properties of multiferroic MOFs with the perovskite architecture. *Dalton Transactions*, **2012**, 41, 3949-52	4.3	69
125	Extreme Flexibility in a Zeolitic Imidazolate Framework: Porous to Dense Phase Transition in Desolvated ZIF-4. *Angewandte Chemie - International Edition*, **2015**, 54, 6447-51	16.4	66
124	Graphene-wrapped sulfur/metal organic framework-derived microporous carbon composite for lithium sulfur batteries. *APL Materials*, **2014**, 2, 124109	5.7	66
123	Enhanced visible light absorption for lead-free double perovskite CsAgSbBr. *Chemical Communications*, **2019**, 55, 3721-3724	5.8	65
122	Bottom-up Formation of Carbon-Based Structures with Multilevel Hierarchy from MOF-Guest Polyhedra. *Journal of the American Chemical Society*, **2018**, 140, 6130-6136	16.4	62
121	Tunable, Ligand-Based Emission from Inorganic Organic Frameworks: A New Approach to Phosphors for Solid State Lighting and Other Applications. *Chemistry of Materials*, **2010**, 22, 2255-2260	9.6	62
120	Insulator-to-Proton-Conductor Transition in a Dense Metal-Organic Framework. *Journal of the American Chemical Society*, **2015**, 137, 6428-31	16.4	61

119	[Am]Mn(HPOO): A New Family of Hybrid Perovskites Based on the Hypophosphite Ligand. *Journal of the American Chemical Society*, **2017**, 139, 16999-17002	16.4	59
118	Rational approach to guest confinement inside MOF cavities for low-temperature catalysis. *Nature Communications*, **2019**, 10, 1340	17.4	59
117	Role of entropic effects in controlling the polymorphism in formate ABX3 metal-organic frameworks. *Chemical Communications*, **2015**, 51, 15538-41	5.8	59
116	Design Principles for Enhancing Photoluminescence Quantum Yield in Hybrid Manganese Bromides. *Journal of the American Chemical Society*, **2020**, 142, 13582-13589	16.4	59
115	Chemical and Structural Diversity in Chiral Magnesium Tartrates and their Racemic and Meso Analogues. *Crystal Growth and Design*, **2007**, 7, 1522-1532	3.5	58
114	Nanofiller-tuned microporous polymer molecular sieves for energy and environmental processes. *Journal of Materials Chemistry A*, **2016**, 4, 270-279	13	57
113	Factors Influencing the Mechanical Properties of Formamidinium Lead Halides and Related Hybrid Perovskites. *ChemSusChem*, **2017**, 10, 3740-3745	8.3	55
112	Dimethylammonium copper formate [(CH3)2NH2]Cu(HCOO)3: A metal-organic framework with quasi-one-dimensional antiferromagnetism and magnetostriction. *Physical Review B*, **2013**, 87,	3.3	54
111	Bismuth 2,6-pyridinedicarboxylates: assembly of molecular units into coordination polymers, CO2 sorption and photoluminescence. *Dalton Transactions*, **2012**, 41, 4126-34	4.3	54
110	Research Update: Mechanical properties of metal-organic frameworks Influence of structure and chemical bonding. *APL Materials*, **2014**, 2, 123902	5.7	53
109	Role of Amine Cavity Interactions in Determining the Structure and Mechanical Properties of the Ferroelectric Hybrid Perovskite [NH3NH2]Zn(HCOO)3. *Chemistry of Materials*, **2016**, 28, 312-317	9.6	52
108	Guest-dependent mechanical anisotropy in pillared-layered soft porous crystals a nanoindentation study. *Chemical Science*, **2014**, 5, 2392	9.4	52
107	Oxide phosphors for light upconversion; Yb3+ and Tm3+ co-doped Y2BaZnO5. *Journal of Applied Physics*, **2011**, 109, 063104	2.5	52
106	Electric Control of Magnetization and Interplay between Orbital Ordering and Ferroelectricity in a Multiferroic Metal Organic Framework. *Angewandte Chemie*, **2011**, 123, 5969-5972	3.6	50
105	Thermodynamic and kinetic factors in the hydrothermal synthesis of hybrid frameworks: zinc 4-cyclohexene-1,2-dicarboxylates. *Chemical Communications*, **2006**, 2687-9	5.8	50
104	Organised chaos: entropy in hybrid inorganic-organic systems and other materials. *Chemical Science* , **2016**, 7, 6316-6324	9.4	49
103	Functional conductive nanomaterials polymerisation in nano-channels: PEDOT in a MOF. *Materials Horizons*, **2017**, 4, 64-71	14.4	48
102	In Situ Observation of Successive Crystallizations and Metastable Intermediates in the Formation of Metal-Organic Frameworks. *Angewandte Chemie - International Edition*, **2016**, 55, 2012-6	16.4	47

101	Titanium Niobium Oxide: From Discovery to Application in Fast-Charging Lithium-Ion Batteries. *Chemistry of Materials*, **2021**, 33, 4-18	9.6	47
100	Synthesis and Characterization of the Rare-Earth Hybrid Double Perovskites: (CHNH)KGdCl and (CHNH)KYCl. *Journal of Physical Chemistry Letters*, **2017**, 8, 5015-5020	6.4	45
99	3D-Printing of Pure Metal□Organic Framework Monoliths **2019**, 1, 147-153		44
98	Comparison of the relative stability of zinc and lithium-boron zeolitic imidazolate frameworks. *CrystEngComm*, **2012**, 14, 374-378	3.3	43
97	Synthesis, structure and optical properties of europium doped calcium barium phosphate □a novel phosphor for solid-state lighting. *Journal of Materials Chemistry C*, **2014**, 2, 6084	7.1	42
96	The role of static disorder in negative thermal expansion in ReO3. *Journal of Applied Physics*, **2009**, 105, 114901	2.5	42
95	Pore closure in zeolitic imidazolate frameworks under mechanical pressure. *Chemical Science*, **2018**, 9, 1654-1660	9.4	41
94	Structural Diversity in Coordination Polymers Composed of Divalent Transition Metals, 2,2?-Bipyridine, and Perfluorinated Dicarboxylates. *Crystal Growth and Design*, **2009**, 9, 4759-4765	3.5	41
93	Hypophosphite hybrid perovskites: a platform for unconventional tilts and shifts. *Chemical Communications*, **2018**, 54, 3751-3754	5.8	40
92	Microscopic origin of entropy-driven polymorphism in hybrid organic-inorganic perovskite materials. *Physical Review B*, **2016**, 94,	3.3	39
91	Structural Diversity and Energetics in Anhydrous Lithium Tartrates: Experimental and Computational Studies of Novel Chiral Polymorphs and Their Racemic and Meso Analogues. *Crystal Growth and Design*, **2011**, 11, 221-230	3.5	39
90	Near infrared up-conversion in organic photovoltaic devices using an efficient Yb3+:Ho3+ Co-doped Ln2BaZnO5 (Ln = Y, Gd) phosphor. *Journal of Applied Physics*, **2012**, 111, 094502	2.5	39
89	A chemical map of NaSICON electrode materials for sodium-ion batteries. *Journal of Materials Chemistry A*, **2021**, 9, 281-292	13	38
88	Synthesis, structure and magnetic phase transitions of the manganese succinate hybrid framework, MN(C4H4O4). *Chemistry - A European Journal*, **2010**, 16, 7579-85	4.8	35
87	Comparison of chiral and racemic forms of zinc cyclohexane trans-1,2-dicarboxylate frameworks: a structural, computational, and calorimetric study. *Angewandte Chemie - International Edition*, **2008**, 47, 8634-7	16.4	35
86	Processing and Characterization of Thin Films of the Two-Layer Superconducting Phase in the Bi-Sr-Ca-Cu-O System: Evidence for Solid Solution. *Journal of the American Ceramic Society*, **1991**, 74, 123-129	3.8	35
85	Mechanical properties of a metal-organic framework containing hydrogen-bonded bifluoride linkers. *Chemical Communications*, **2013**, 49, 4471-3	5.8	34
84	Perovskite-related ReO3-type structures. *Nature Reviews Materials*, **2020**, 5, 196-213	73.3	33

83	Crystal structures of mixed-valency and mixed-metal salts A2MIII0.5SbV0.5X6 (A = Rb, Cs; M = Sb, Bi, In, Tl, Fe, Rh; X = Cl, Br). A powder neutron diffraction study. *Inorganic Chemistry*, **1985**, 24, 545-552	5.1	32
82	Variable temperature and high-pressure crystal chemistry of perovskite formamidinium lead iodide: a single crystal X-ray diffraction and computational study. *Chemical Communications*, **2017**, 53, 7537-7540	5.8	31
81	Hydrogen Bonding Controls the Structural Evolution in Perovskite-Related Hybrid Platinum(IV) Iodides. *Inorganic Chemistry*, **2018**, 57, 10375-10382	5.1	31
80	Tuneable mechanical and dynamical properties in the ferroelectric perovskite solid solution [NHNH] [NHOH] Zn(HCOO). *Chemical Science*, **2016**, 7, 5108-5112	9.4	31
79	Binder-free 3D printing of covalent organic framework (COF) monoliths for CO2 adsorption. *Chemical Engineering Journal*, **2021**, 403, 126333	14.7	31
78	Intermarriage of Halide Perovskites and Metal-Organic Framework Crystals. *Angewandte Chemie - International Edition*, **2020**, 59, 19434-19449	16.4	30
77	Magnetic catalysts as nanoactuators to achieve simultaneous momentum-transfer and continuous-flow hydrogen production. *Journal of Materials Chemistry A*, **2016**, 4, 4280-4287	13	30
76	An Unusual Phase Transition Driven by Vibrational Entropy Changes in a Hybrid Organic-Inorganic Perovskite. *Angewandte Chemie - International Edition*, **2018**, 57, 8932-8936	16.4	30
75	Mixed-linker solid solutions of functionalized pillared-layer MOFs - adjusting structural flexibility, gas sorption, and thermal responsiveness. *Dalton Transactions*, **2016**, 45, 4230-41	4.3	29
74	Combined single-crystal x-ray diffraction and magic angle spinning NMR study of .alpha.-CaZn2(PO4)2. *Journal of the American Chemical Society*, **1988**, 110, 1140-1143	16.4	29
73	Liquid-phase sintering of lead halide perovskites and metal-organic framework glasses. *Science*, **2021**, 374, 621-625	33.3	29
72	A comparison of the amorphization of zeolitic imidazolate frameworks (ZIFs) and aluminosilicate zeolites by ball-milling. *Dalton Transactions*, **2016**, 45, 4258-68	4.3	28
71	Thermal Amorphization of Zeolitic Imidazolate Frameworks. *Angewandte Chemie*, **2011**, 123, 3123-3127	3.6	28
70	Phase boundary engineering of metal-organic-framework-derived carbonaceous nickel selenides for sodium-ion batteries. *Nano Research*, **2020**, 13, 2289-2298	10	27
69	The competition between mechanical stability and charge carrier mobility in MA-based hybrid perovskites: insight from DFT. *Journal of Materials Chemistry C*, **2018**, 6, 12252-12259	7.1	26
68	High-Throughput Computational Screening of Metal□Organic Frameworks for Thiol Capture. *Journal of Physical Chemistry C*, **2017**, 121, 22208-22215	3.8	25
67	Pressure-Induced Bond Rearrangement and Reversible Phase Transformation in a Metal□Organic Framework. *Angewandte Chemie*, **2014**, 126, 5689-5692	3.6	24
66	Chiral, Racemic, and Meso-Lithium Tartrate Framework Polymorphs: A Detailed Structural Analysis. *Crystal Growth and Design*, **2013**, 13, 3705-3715	3.5	23

65	Coordination polymers of alkali metal trithiocyanurates: structure determinations and ionic conductivity measurements using single crystals. *CrystEngComm*, **2013**, 15, 9400	3.3	23
64	Structural diversity and luminescent properties of lanthanide 2,2- and 2,3-dimethylsuccinate frameworks. *CrystEngComm*, **2013**, 15, 100-110	3.3	23
63	Oriented Two-Dimensional Porous Organic Cage Crystals. *Angewandte Chemie - International Edition*, **2017**, 56, 9391-9395	16.4	23
62	Topotactic reduction of oxide nanomaterials: unique structure and electronic properties of reduced TiO2 nanoparticles. *Materials Horizons*, **2014**, 1, 106-110	14.4	22
61	Anion ordering in mixed valence dicesium hexachloroantimonate (Cs2SbCl6) and related salts. *Journal of the American Chemical Society*, **1983**, 105, 3366-3368	16.4	22
60	Elastic properties and acoustic dissipation associated with a disorder□order ferroelectric transition in a metal□organic framework. *CrystEngComm*, **2015**, 17, 370-374	3.3	21
59	Unzipping of black phosphorus to form zigzag-phosphorene nanobelts. *Nature Communications*, **2020**, 11, 3917	17.4	21
58	Phase Behavior in Rhombohedral NaSiCON Electrolytes and Electrodes. *Chemistry of Materials*, **2020**, 32, 7908-7920	9.6	21
57	Extreme Flexibility in a Zeolitic Imidazolate Framework: Porous to Dense Phase Transition in Desolvated ZIF-4. *Angewandte Chemie*, **2015**, 127, 6547-6551	3.6	20
56	A new look at the structural properties of trisodium uranate Na3UO4. *Inorganic Chemistry*, **2015**, 54, 3552-61	5.1	20
55	Structural Properties and Charge Distribution of the Sodium Uranium, Neptunium, and Plutonium Ternary Oxides: A Combined X-ray Diffraction and XANES Study. *Inorganic Chemistry*, **2016**, 55, 1569-79	5.1	20
54	Cobalt adipate, Co(C6H8O4): antiferromagnetic structure, unusual thermal expansion and magnetoelastic coupling. *Materials Horizons*, **2014**, 1, 332-337	14.4	20
53	Structures and magnetic properties of Mn and Co inorganic□organic frameworks with mixed linear dicarboxylate ligands. *CrystEngComm*, **2012**, 14, 2711	3.3	20
52	Unraveling the Interfacial Structure-Performance Correlation of Flexible Metal-Organic Framework Membranes on Polymeric Substrates. *ACS Applied Materials & Interfaces*, **2019**, 11, 5570-5577	9.5	20
51	Stacking Faults and Mechanical Behavior beyond the Elastic Limit of an Imidazole-Based Metal Organic Framework: ZIF-8. *Journal of Physical Chemistry Letters*, **2013**, 4, 3377-81	6.4	19
50	Manganese Tetraboride, MnB4: High-Temperature Crystal Structure, p-n Transition, (55)Mn NMR Spectroscopy, Solid Solutions, and Mechanical Properties. *Chemistry - A European Journal*, **2015**, 21, 8177-81	4.8	19
49	Evolution of the structures and magnetic properties of the manganese dicarboxylates, Mn2(CO2(CH2)nCO2)(OH)2 and Mn4(CO2(CH2)nCO2)3(OH)2. *Chemical Science*, **2011**, 2, 1929	9.4	19
48	Modeling the Hydrogen Storage Materials with Exposed M2+ Coordination Sites. *Journal of Physical Chemistry C*, **2008**, 112, 16171-16173	3.8	17

47	Hidden negative linear compressibility in lithium l-tartrate. *Physical Chemistry Chemical Physics*, **2017**, 19, 3544-3549	3.6	16
46	Deep red emission in Eu2+-activated Sr4(PO4)2O phosphors for blue-pumped white LEDs. *Journal of Materials Chemistry C*, **2015**, 3, 7356-7362	7.1	16
45	Neutron diffraction study of the magnetic structures of manganese succinate Mn(C4H4O4): A complex inorganic-organic framework. *Physical Review B*, **2010**, 82,	3.3	16
44	Mixed X-Site Formate-Hypophosphite Hybrid Perovskites. *Chemistry - A European Journal*, **2018**, 24, 11309-11313	4.8	15
43	Octahedral connectivity and its role in determining the phase stabilities and electronic structures of low-dimensional, perovskite-related iodoplumbates. *APL Materials*, **2018**, 6, 114202	5.7	15
42	In Situ Observation of Successive Crystallizations and Metastable Intermediates in the Formation of Metal–Organic Frameworks. *Angewandte Chemie*, **2016**, 128, 2052-2056	3.6	14
41	Understanding ligand-centred photoluminescence through flexibility and bonding of anthraquinone inorganic–organic frameworks. *Journal of Materials Chemistry*, **2011**, 21, 6595		14
40	Guided Assembly of Microporous/Mesoporous Manganese Phosphates by Bifunctional Organophosphonic Acid Etching and Templating. *Advanced Materials*, **2019**, 31, e1901124	24	12
39	X-ray Diffraction, Mössbauer Spectroscopy, Magnetic Susceptibility, and Specific Heat Investigations of Na4NpO5 and Na5NpO6. *Inorganic Chemistry*, **2015**, 54, 4556-64	5.1	12
38	Mechanical Properties of a Calcium Dietary Supplement, Calcium Fumarate Trihydrate. *Inorganic Chemistry*, **2015**, 54, 11186-92	5.1	12
37	Synthesis, crystal structure, magnetic and electronic properties of the caesium-based transition metal halide Cs3Fe2Br9. *Journal of Materials Chemistry C*, **2018**, 6, 3573-3577	7.1	12
36	Coordination environments and π-conjugation in dense lithium coordination polymers. *CrystEngComm*, **2016**, 18, 398-406	3.3	11
35	The capricious nature of iodine catenation in I excess, perovskite-derived hybrid Pt(iv) compounds. *Chemical Communications*, **2019**, 55, 588-591	5.8	11
34	Ligand-Directed Control over Crystal Structures of Inorganic–Organic Frameworks and Formation of Solid Solutions. *Angewandte Chemie*, **2013**, 125, 5654-5657	3.6	11
33	Structural Diversity and Magnetic Properties of Hybrid Ruthenium Halide Perovskites and Related Compounds. *Angewandte Chemie - International Edition*, **2020**, 59, 8974-8981	16.4	10
32	Polymorphism in M(HPO) (M = V, Al, Ga) compounds with the perovskite-related ReO structure. *Chemical Communications*, **2019**, 55, 2964-2967	5.8	10
31	Ab initio computation for solid-state P NMR of inorganic phosphates: revisiting X-ray structures. *Physical Chemistry Chemical Physics*, **2019**, 21, 10070-10074	3.6	9
30	Coupling of the local defect and magnetic structure of wüstite Fe1−xO. *Physical Review B*, **2013**, 88,	3.3	8

29	Preparation, magnetism and electronic structures of cadmium technetates. *Journal of Materials Chemistry*, **2011**, 21, 1496-1502		8
28	Structural Diversity and Magnetic Properties of Hybrid Ruthenium Halide Perovskites and Related Compounds. *Angewandte Chemie*, **2020**, 132, 9059-9066	3.6	8
27	Oriented Two-Dimensional Porous Organic Cage Crystals. *Angewandte Chemie*, **2017**, 129, 9519-9523	3.6	8
26	Identifying the best metal–organic frameworks and unravelling different mechanisms for the separation of pentane isomers. *Molecular Systems Design and Engineering*, **2019**, 4, 609-615	4.6	7
25	Insights into the electronic structure of OsO2 using soft and hard x-ray photoelectron spectroscopy in combination with density functional theory. *Physical Review Materials*, **2019**, 3,	3.2	7
24	Why are Double Perovskite Iodides so Rare?. *Journal of Physical Chemistry C*, **2021**, 125, 11756-11764	3.8	7
23	Layered Double Perovskites. *Annual Review of Materials Research*, **2021**, 51, 351-380	12.8	7
22	Structure prediction: Encoding evolution of porous solids. *Nature Chemistry*, **2016**, 9, 6-8	17.6	6
21	Chemical Control of Spin-Orbit Coupling and Charge Transfer in Vacancy-Ordered Ruthenium(IV) Halide Perovskites. *Angewandte Chemie - International Edition*, **2021**, 60, 5184-5188	16.4	5
20	Janus Membrane: Janus Membranes: Creating Asymmetry for Energy Efficiency (Adv. Mater. 43/2018). *Advanced Materials*, **2018**, 30, 1870328	24	5
19	A New Look at the Structural and Magnetic Properties of Potassium Neptunate KNpO Combining XRD, XANES Spectroscopy, and Low-Temperature Heat Capacity. *Inorganic Chemistry*, **2017**, 56, 5839-5850	5.1	4
18	Intermarriage of Halide Perovskites and Metal-Organic Framework Crystals. *Angewandte Chemie*, **2020**, 132, 19602-19617	3.6	4
17	Phase stability and sodium-vacancy orderings in a NaSICON electrode. *Journal of Materials Chemistry A*, **2021**, 10, 209-217	13	4
16	Understanding the Structural and Electronic Properties of Bismuth Trihalides and Related Compounds. *Inorganic Chemistry*, **2020**, 59, 3377-3386	5.1	4
15	Transition metal coordination complexes of chrysazin. *CrystEngComm*, **2016**, 18, 5121-5129	3.3	4
14	An Unusual Phase Transition Driven by Vibrational Entropy Changes in a Hybrid Organic–Inorganic Perovskite. *Angewandte Chemie*, **2018**, 130, 9070-9074	3.6	4
13	Tunable Luminescence in Hybrid Cu(I) and Ag(I) Iodides. *Inorganic Chemistry*, **2020**, 59, 15487-15494	5.1	3
12	Disorder and polymorphism in Cu(II)-polyoxometalate complexes: [Cu1.5(H2O)7.5PW12O40]·4.75H2O, cis- & trans-[Cu2(H2O)10SiW12O40]·6H2O. *CrystEngComm*, **2016**, 18, 5327-5332	3.3	3

11	Mössbauer spectroscopy, magnetization, magnetic susceptibility, and low temperature heat capacity of β-$NaMnPO_4$. *Journal of Physics Condensed Matter*, **2016**, 28, 086002	1.8	3
10	Direct Pyrolysis of a Manganese-Triazolate Metal-Organic Framework into Air-Stable Manganese Nitride Nanoparticles. *Advanced Science*, **2021**, 8, 2003212	13.6	3
9	Stacking Faults Assist Lithium-Ion Conduction in a Halide-Based Superionic Conductor.. *Journal of the American Chemical Society*, **2022**,	16.4	3
8	Preface to Special Topic: Metal-organic framework materials. *APL Materials*, **2014**, 2, 123801	5.7	1
7	Guest-mediated phase transitions in a flexible pillared-layered metal-organic framework under high-pressure. *Chemical Science*, **2021**, 12, 13793-13801	9.4	1
6	Lattice Dynamics in the NASICON NaZr(PO) Solid Electrolyte from Temperature-Dependent Neutron Diffraction, NMR, and Ab Initio Computational Studies.. *Chemistry of Materials*, **2022**, 34, 4029-4038	9.6	0
5	Factors Influencing the Mechanical Properties of Formamidinium Lead Halides and Related Hybrid Perovskites. *ChemSusChem*, **2017**, 10, 3683-3683	8.3	
4	Micro-/Mesoporous Materials: Guided Assembly of Microporous/Mesoporous Manganese Phosphates by Bifunctional Organophosphonic Acid Etching and Templating (Adv. Mater. 25/2019). *Advanced Materials*, **2019**, 31, 1970182	24	
3	Molecular Sieves: Porous Organic Cage Thin Films and Molecular-Sieving Membranes (Adv. Mater. 13/2016). *Advanced Materials*, **2016**, 28, 2652-2652	24	
2	Chemical Control of Spin-Orbit Coupling and Charge Transfer in Vacancy-Ordered Ruthenium(IV) Halide Perovskites. *Angewandte Chemie*, **2021**, 133, 5244-5248	3.6	
1	Tribute to D. D. Sarma. *Journal of Physical Chemistry C*, **2021**, 125, 19049-19052	3.8	