

# John McCloy

## List of Publications by Year in descending order

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184  
papers

4,054  
citations

147801

31  
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168389

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194  
all docs

194  
docs citations

194  
times ranked

4189  
citing authors

#	ARTICLE	IF	CITATIONS
1	Melt Growth of High-Resolution CdZnTe Detectors. , 2022, , 265-284.		1
2	Photodarkening and dopant segregation in Cu-doped $\hat{\text{I}}^2\text{-Ga}_2\text{O}_3$ Czochralski single crystals. Journal of Crystal Growth, 2022, 578, 126419.	1.5	12
3	A MnO <sub>x</sub> enhanced atomically dispersed iron–nitrogen–carbon catalyst for the oxygen reduction reaction. Journal of Materials Chemistry A, 2022, 10, 5981-5989.	10.3	18
4	Correlating Sulfur Solubility with Short-to-Intermediate Range Ordering in the Structure of Borosilicate Glasses. Journal of Physical Chemistry C, 2022, 126, 655-674.	3.1	6
5	Impact of non-framework cation mixing on the structure and crystallization behavior of model high-level waste glasses. Journal of the American Ceramic Society, 2022, 105, 3967-3985.	3.8	3
6	Characterization of vacancy type defects in irradiated UO <sub>2</sub> and CeO <sub>2</sub> . MRS Advances, 2022, 7, 123-127.	0.9	4
7	Scoping studies for low-temperature melting ZnO–Bi <sub>2</sub> O <sub>3</sub> –(B <sub>2</sub> O <sub>3</sub> , SiO <sub>2</sub> ) binder glass. MRS Advances, 2022, 7, 90-94.	0.9	4
8	Cu <sup>2+</sup> and Cu <sup>3+</sup> acceptors in $\hat{\text{I}}^2\text{-Ga}_2\text{O}_3$ crystals: A magnetic resonance and optical absorption study. Journal of Applied Physics, 2022, 131, .	2.5	8
9	Process optimization of caustic scrubber and iodine-129 immobilization in sodalite-based waste forms. MRS Advances, 2022, 7, 110-116.	0.9	9
10	Benefits of using multiple Raman laser wavelengths for characterizing defects in a UO <sub>2</sub> matrix. Journal of Raman Spectroscopy, 2022, 53, 988-1002.	2.5	11
11	Vitrification of wastes: from unwanted to controlled crystallization, a review. Comptes Rendus - Geoscience, 2022, 354, 121-160.	1.2	26
12	Effect of extended defects on photoluminescence of gallium oxide and aluminum gallium oxide epitaxial films. Scientific Reports, 2022, 12, 3243.	3.3	16
13	Persistent Room-Temperature Photodarkening in Cu-Doped $\hat{\text{I}}^2\text{-Ga}_2\text{O}_3$ Crystals. Physical Review Letters, 2022, 128, 077402.	7.81	17
14	Electronic and ionic conductivity in $\hat{\text{I}}^2\text{-Ga}_2\text{O}_3$ single crystals. Journal of Applied Physics, 2022, 131, .	2.5	5
15	Growth and defect characterization of doped and undoped $\hat{\text{I}}^2\text{-Ga}_2\text{O}_3$ crystals. , 2022, , .		2
16	Alloyed $\hat{\text{I}}^2\text{-(Al}_{1-x}\text{Ga}_x)_2\text{O}_3$ bulk Czochralski single $\hat{\text{I}}^2\text{-(Al}_{0.1}\text{Ga}_{0.9})_2\text{O}_3$ and polycrystals	2.5	16
17	Structure and thermodynamics of calcium rare earth silicate oxyapatites, Ca <sub>2</sub> RE <sub>8</sub> (SiO <sub>4</sub> ) <sub>6</sub> O <sub>2</sub> (RE = Pr, Tb, Tm, Er, Yb, Lu, Ho, Gd, Sm, Eu, Dy, Nd, Ce, La). Journal of Materials Chemistry A, 2022, 10, 103459.	0.8	1
18	Assessment of the reason for the vitrification of a wall at a hillfort. The example of Broborg in Sweden. Journal of Archaeological Science: Reports, 2022, 43, 103459.	0.5	1

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19	Major to trace element imaging and analysis of iron age glasses using stage scanning in the analytical dual beam microscope (tandem). <i>Heritage Science</i> , 2022, 10, .	2.3	3
20	Recycled concrete and brick powders as supplements to Portland cement for more sustainable concrete. <i>Journal of Cleaner Production</i> , 2022, 364, 132651.	9.3	59
21	Multivariate analysis: An essential for studying complex glasses. <i>Journal of the American Ceramic Society</i> , 2022, 105, 7196-7210.	3.8	0
22	Syntheses and Crystal Structures of Rare-Earth Oxyapatites $\text{Ca}_2\text{RE}_8(\text{SiO}_4)_6\text{O}_2$ (RE = Pr, Tb, Ho, Tm). <i>Journal of Chemical Crystallography</i> , 2021, 51, 293-300.	1.1	6
23	Niche Partitioning of Microbial Communities at an Ancient Vitrified Hillfort: Implications for Vitrified Radioactive Waste Disposal. <i>Geomicrobiology Journal</i> , 2021, 38, 36-56.	2.0	5
24	Reproduction of melting behavior for vitrified hillforts based on amphibolite, granite, and basalt lithologies. <i>Scientific Reports</i> , 2021, 11, 1272.	3.3	9
25	In situ pair distribution function analysis of crystallizing Fe-silicate melts. <i>Journal of Materials Science</i> , 2021, 56, 5637-5657.	3.7	10
26	Alternatives to Cobalt: Vanadate Glass and Glass-Ceramic Structures as Cathode Materials for Rechargeable Lithium-Ion Batteries. <i>ACS Sustainable Chemistry and Engineering</i> , 2021, 9, 629-638.	6.7	12
27	Machine learning to predict refractory corrosion during nuclear waste vitrification. <i>MRS Advances</i> , 2021, 6, 131-137.	0.9	3
28	<i>In situ</i> crystallization and magnetic measurement of hexaferrite glass-ceramics. <i>AIP Advances</i> , 2021, 11, .	1.3	1
29	Chromium and vanadium incorporation in sulfate-containing sodium aluminoborosilicate glass. <i>MRS Advances</i> , 2021, 6, 138-148.	0.9	4
30	Zn acceptors in $\hat{\Gamma}^2\text{-Ga}_2\text{O}_3$ crystals. <i>Journal of Applied Physics</i> , 2021, 129, .	2.5	22
31	Assessment of positrons for defect studies in $\text{CeO}_2$ materials. <i>MRS Advances</i> , 2021, 6, 119-124.	0.9	4
32	Compensation of Shallow Donors by Gallium Vacancies in Monoclinic $\hat{\Gamma}^2$ - $\text{Ga}_2\text{O}_3$ . <i>Physical Review Applied</i> , 2021, 15, .	0.8	17
33	Electronic and optical properties of Zn-doped $\hat{\Gamma}^2\text{-Ga}_2\text{O}_3$ Czochralski single crystals. <i>Journal of Applied Physics</i> , 2021, 129, .	2.5	23
34	Thermodynamic non-ideality and disorder heterogeneity in actinide silicate solid solutions. <i>Npj Materials Degradation</i> , 2021, 5, .	5.8	9
35	Gallium vacancy formation in oxygen annealed $\hat{\Gamma}^2\text{-Ga}_2\text{O}_3$ . <i>Journal of Applied Physics</i> , 2021, 129, .	2.5	21
36	Zinc-hydrogen and zinc-iridium pairs in $\hat{\Gamma}^2\text{-Ga}_2\text{O}_3$ . <i>Applied Physics Letters</i> , 2021, 119, .	3.3	8

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37	A comparative study on the effect of Zr, Sn, and Ti on the crystallization behavior of nepheline glass. <i>Journal of Non-Crystalline Solids</i> , 2021, 569, 120970.	3.1	1
38	Atomic-scale characterization of structural and electronic properties of Hf doped $\hat{\Gamma}^2$ -Ga <sub>2</sub> O <sub>3</sub> . <i>Applied Physics Letters</i> , 2021, 119, .	3.3	6
39	Structure of amorphous aluminosilicates obtained from mineral transformation: Potential path for partial remediation of alkaline bauxite residues. <i>Environmental Advances</i> , 2021, 6, 100136.	4.8	3
40	Applying laboratory methods for durability assessment of vitrified material to archaeological samples. <i>Npj Materials Degradation</i> , 2021, 5, .	5.8	5
41	Oxidation and anion lattice defect signatures of hypostoichiometric lanthanide-doped UO <sub>2</sub> . <i>Journal of Nuclear Materials</i> , 2020, 530, 151959.	2.7	23
42	Relationship between nanostructure-magnetic property induced by temperature for iron oxide nanoparticles in vacuum, Ar and O <sub>2</sub> environments. <i>Journal of Magnetism and Magnetic Materials</i> , 2020, 498, 166158.	2.3	2
43	Structures of fluoride containing aluminosilicate low activity nuclear waste glasses: A molecular dynamics simulations study. <i>Journal of Non-Crystalline Solids</i> , 2020, 550, 120379.	3.1	4
44	Effect of Ti <sup>4+</sup> on the structure of nepheline (NaAlSiO <sub>4</sub> ) glass. <i>Geochimica Et Cosmochimica Acta</i> , 2020, 290, 333-351.	3.9	10
45	Archaeomagnetic dating of vitrified Broborg hillfort in southeast Uppsala, Sweden. <i>Journal of Archaeological Science: Reports</i> , 2020, 31, 102311.	0.5	2
46	Iodosodalite synthesis with hot isostatic pressing of precursors produced from aqueous and hydrothermal processes. <i>Journal of Nuclear Materials</i> , 2020, 538, 152222.	2.7	18
47	Solâ€“gel synthesis of iodosodalite precursors and subsequent consolidation with a glass binder made from oxides and solâ€“gel routes. <i>Journal of Sol-Gel Science and Technology</i> , 2020, 96, 564-575.	2.4	7
48	Jeankempite, Ca <sub>5</sub> (AsO <sub>4</sub> ) <sub>2</sub> (AsO <sub>3</sub> OH) <sub>2</sub> (H <sub>2</sub> O) <sub>7</sub> , a new arsenate mineral from the Mohawk Mine, Keweenaw County, Michigan, USA. <i>Mineralogical Magazine</i> , 2020, 84, 959-969.	1.4	1
49	Structure of NaFeSiO <sub>4</sub> , NaFeSi <sub>2</sub> O <sub>6</sub> , and NaFeSi <sub>3</sub> O <sub>8</sub> glasses and glass-ceramics. <i>American Mineralogist</i> , 2020, 105, 1375-1384.	1.9	10
50	High-Temperature Thermodynamics of Cerium Silicates, A-Ce <sub>2</sub> Si <sub>2</sub> O <sub>7</sub> , and Ce <sub>4.67</sub> (SiO <sub>4</sub> ) <sub>3</sub> O. <i>ACS Earth and Space Chemistry</i> , 2020, 4, 2129-2143.	2.7	23
51	Partitioning of rare earths in multiphase nuclear waste glassâ€“ceramics. <i>International Journal of Applied Glass Science</i> , 2020, 11, 660-675.	2.0	11
52	Thermal properties of sodium borosilicate glasses as a function of sulfur content. <i>Journal of the American Ceramic Society</i> , 2020, 103, 3610-3619.	3.8	18
53	A dataâ€“driven approach for predicting nepheline crystallization in highâ€“level waste glasses. <i>Journal of the American Ceramic Society</i> , 2020, 103, 4913-4924.	3.8	12
54	Low Temperature Sequential Melting and Anion Retention in Simplified Low Activity Waste. <i>MRS Advances</i> , 2020, 5, 195-206.	0.9	0

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55	Improved Nd distribution in Czochralski grown YAG crystals by implementation of the accelerated crucible rotation technique. <i>Optical Materials Express</i> , 2020, 10, 632.	3.0	8
56	Crystallization behavior of iron and boron containing nepheline ( $\text{Na}_2\text{O} \cdot \text{Al}_2\text{O}_3 \cdot 2\text{SiO}_2$ ) based model high level nuclear waste glasses. <i>Journal of the American Ceramic Society</i> , 2019, 102, 1101-1121.	3.8	28
57	Challenges with vitrification of Hanford High-Level Waste (HLW) to borosilicate glass – An overview. <i>Journal of Non-Crystalline Solids: X</i> , 2019, 4, 100033.	1.2	65
58	Method Development for High Temperature In-Situ Neutron Diffraction Measurements of Glass Crystallization on Cooling from Melt. <i>MRS Advances</i> , 2019, 4, 1009-1019.	0.9	0
59	Structural characterization of $\text{ZnSO}_4\text{-K}_2\text{SO}_4\text{-NaCl}$ glasses. <i>Journal of Non-Crystalline Solids</i> , 2019, 524, 119639.	3.1	3
60	Computational and experimental identification of hydrogen defect vibrational modes in zinc sulfide. <i>Journal of Applied Physics</i> , 2019, 126, 173101.	2.5	0
61	Frontiers in natural and un-natural glasses: An interdisciplinary dialogue and review. <i>Journal of Non-Crystalline Solids: X</i> , 2019, 4, 100035.	1.2	6
62	Lanthanum modification of crystalline phases and residual glass in augite glass ceramics produced with industrial solid wastes. <i>Journal of Non-Crystalline Solids</i> , 2019, 524, 119638.	3.1	31
63	Properties of Pertechnic Acid. <i>Inorganic Chemistry</i> , 2019, 58, 14015-14023.	4.0	9
64	Structural properties of alumina-doped lithium borovanadate glasses and glass-ceramics. <i>Journal of Non-Crystalline Solids</i> , 2019, 521, 119551.	3.1	9
65	Ion irradiation induced changes in defects of iron thin films: Electron microscopy and positron annihilation spectroscopy. <i>Journal of Nuclear Materials</i> , 2019, 526, 151774.	2.7	6
66	Structural Characterization of Ternary Salt Melts for Low Activity Waste Applications. <i>MRS Advances</i> , 2019, 4, 1045-1056.	0.9	4
67	Glass structure and crystallization in boro-alumino-silicate glasses containing rare earth and transition metal cations: a US-UK collaborative program. <i>MRS Advances</i> , 2019, 4, 1029-1043.	0.9	6
68	Synthesis of greigite ( $\text{Fe}_3\text{S}_4$ ) particles via a hydrothermal method. <i>AIP Advances</i> , 2019, 9, .	1.3	17
69	Crystallization study of rare earth and molybdenum containing nuclear waste glass ceramics. <i>Journal of the American Ceramic Society</i> , 2019, 102, 5149-5163.	3.8	11
70	Modeling and experimental determination of physical properties of $\text{Ge}_x\text{Ga}_y\text{Se}_{1-x-y}$ chalcogenide glasses II: Optical and thermal properties. <i>Journal of Non-Crystalline Solids</i> , 2019, 511, 115-124.	3.1	14
71	Luminescence of undoped commercial ZnS crystals: A critical review and new evidence on the role of impurities using photoluminescence and electrical transient spectroscopy. <i>Journal of Applied Physics</i> , 2019, 125, .	2.5	29
72	Boron-speciation and aluminosilicate crystallization in alkali boroaluminosilicate glasses along the $\text{NaAl}_{1-x}\text{B}_x\text{SiO}_4$ and $\text{LiAl}_{1-x}\text{B}_x\text{SiO}_4$ joins. <i>Journal of Non-Crystalline Solids</i> , 2019, 506, 58-67.	3.1	15

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73	Modeling and experimental determination of physical properties of $Gex-Gay-Se_{1-x-y}$ chalcogenide glasses I: Structure and mechanical properties. <i>Journal of Non-Crystalline Solids</i> , 2019, 510, 192-199.	3.1	14
74	Percolation behavior of Ag in $Ge_{16}Sb_{12}Se_{72}$ glassy matrix and its impact on corresponding ionic conductivity. <i>Journal of Alloys and Compounds</i> , 2019, 782, 375-383.	5.5	10
75	Role of short range order on crystallization of tectosilicate glasses: A diffraction study. <i>Journal of Non-Crystalline Solids</i> , 2019, 505, 131-143.	3.1	14
76	Ultrafast Fabrication of Thermoelectric Films by Pulsed Light Sintering of Colloidal Nanoparticles on Flexible and Rigid Substrates. <i>Advanced Engineering Materials</i> , 2019, 21, 1800800.	3.5	26
77	Spin and Ferroic Glasses. <i>Springer Handbooks</i> , 2019, , 687-718.	0.6	0
78	Iodosodalite Waste Forms from Low-Temperature Aqueous Process. <i>MRS Advances</i> , 2018, 3, 1093-1103.	0.9	17
79	Structural dependence of crystallization in glasses along the nepheline ( $NaAlSi_4$ ) $\leftrightarrow$ eucryptite ( $LiAlSi_4$ ) join. <i>Journal of the American Ceramic Society</i> , 2018, 101, 2840-2855.	3.8	24
80	Multiphase magnetic systems: Measurement and simulation. <i>Journal of Applied Physics</i> , 2018, 123, 023902.	2.5	6
81	Magnetic analysis of commercial hematite, magnetite, and their mixtures. <i>AIP Advances</i> , 2018, 8, .	1.3	69
82	Compositional Dependence of Solubility/Retention of Molybdenum Oxides in Aluminoborosilicate-Based Model Nuclear Waste Glasses. <i>Journal of Physical Chemistry B</i> , 2018, 122, 1714-1729.	2.6	41
83	Pre-Viking Swedish hillfort glass: A prospective long-term alteration analogue for vitrified nuclear waste. <i>International Journal of Applied Glass Science</i> , 2018, 9, 540-554.	2.0	13
84	Chemometric analyses of XANES data collected on $^{99}Tc$ bearing silicate glasses. <i>Journal of Radioanalytical and Nuclear Chemistry</i> , 2018, 316, 17-27.	1.5	0
85	Structure and properties of $Na_5FeSi_4O_{12}$ crystallized from $5Na_2O \cdot Fe_2O_3 \cdot 8SiO_2$ glass. <i>Acta Crystallographica Section C, Structural Chemistry</i> , 2018, 74, 1595-1602.	0.5	6
86	Compositional Imaging and Analysis of Late Iron Age Glass from the Broborg Vitrified Hillfort, Sweden. <i>Microscopy and Microanalysis</i> , 2018, 24, 2134-2135.	0.4	2
87	Impact of rare earth ion size on the phase evolution of $MoO_3$ -containing aluminoborosilicate glass-ceramics. <i>Journal of Nuclear Materials</i> , 2018, 510, 539-550.	2.7	35
88	Challenges and Solutions for Handling and Characterizing Alkali-Tc-Oxide Salts. <i>MRS Advances</i> , 2018, 3, 1191-1200.	0.9	1
89	Glass-bonded idiosodalite waste form for immobilization of $^{129}I$ . <i>Journal of Nuclear Materials</i> , 2018, 504, 109-121.	2.7	50
90	Chemical Trends in Solid Alkali Peractinates. <i>Inorganic Chemistry</i> , 2017, 56, 2533-2544.	4.0	26

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91	Effect of defects, magnetocrystalline anisotropy, and shape anisotropy on magnetic structure of iron thin films by magnetic force microscopy. AIP Advances, 2017, 7, .	1.3	4
92	Glass-ceramics for nuclear-waste immobilization. MRS Bulletin, 2017, 42, 233-240.	3.5	91
93	High Temperature Physical and Chemical Stability and Oxidation Reaction Kinetics of Ni <sup>2+</sup> /Cr Nanoparticles. Journal of Physical Chemistry C, 2017, 121, 4018-4028.	3.1	6
94	Synthesis and Characterization of 5- and 6- Coordinated Alkali Perchnetates. MRS Advances, 2017, 2, 525-542.	0.9	3
95	Tetragonal-Like Phase in Core-Shell Iron Iron-Oxide Nanoclusters. Journal of Physical Chemistry C, 2017, 121, 11794-11803.	3.1	3
96	Evaluation of undoped ZnS single crystal materials for x-ray imaging applications. Proceedings of SPIE, 2017, , .	0.8	2
97	Spectroscopic and neutron detection properties of rare earth and titanium doped LiAlO <sub>2</sub> single crystals. Journal of Luminescence, 2017, 190, 242-248.	3.1	13
98	Crystallization of iron-containing sodium aluminosilicate glasses in the NaAlSi <sub>3</sub> O <sub>8</sub> -NaFeSi <sub>3</sub> O <sub>8</sub> join. Journal of Geophysical Research: Solid Earth, 2017, 122, 2504-2524.	3.4	33
99	The use of positrons to survey alteration layers on synthetic nuclear waste glasses. Journal of Nuclear Materials, 2017, 490, 75-84.	2.7	17
100	Understanding the structural origin of crystalline phase transformations in nepheline (NaAlSi <sub>3</sub> O <sub>8</sub> )-based glass-ceramics. Journal of the American Ceramic Society, 2017, 100, 2859-2878.	3.8	40
101	Synthesis and characterization of idosodalite. Journal of the American Ceramic Society, 2017, 100, 2273-2284.	3.8	33
102	Effect of Li, Fe, and B Addition on the Crystallization Behavior of Sodium Aluminosilicate Glasses as Analogues for Hanford High Level Waste Glasses. MRS Advances, 2017, 2, 549-555.	0.9	8
103	Wet chemical synthesis of apatite-based waste forms – A novel room temperature method for the immobilization of radioactive iodine. Journal of Materials Chemistry A, 2017, 5, 14331-14342.	10.3	43
104	Elucidating the Effect of Iron Speciation (Fe <sup>2+</sup> /Fe <sup>3+</sup> ) on Crystallization Kinetics of Sodium Aluminosilicate Glasses. Journal of the American Ceramic Society, 2016, 99, 2306-2315.	3.8	36
105	Formation of Technetium Salts in Hanford Low-Activity Waste Glass. Journal of the American Ceramic Society, 2016, 99, 3924-3931.	3.8	9
106	Structure, electrical characteristics, and high-temperature stability of aerosol jet printed silver nanoparticle films. Journal of Applied Physics, 2016, 120, .	2.5	52
107	Effects of aging time and temperature of Fe-1wt.%Cu on magnetic Barkhausen noise and FORC. AIP Advances, 2016, 6, 055935.	1.3	4
108	Materials and processes for the effective capture and immobilization of radioiodine: A review. Journal of Nuclear Materials, 2016, 470, 307-326.	2.7	437

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109	Nepheline structural and chemical dependence on melt composition. American Mineralogist, 2016, 101, 266-276.	1.9	27
110	Nepheline Crystallization in High-Alumina High-Level Waste Glass. Materials Research Society Symposia Proceedings, 2015, 1744, 85-91.	0.1	2
111	Wet Chemical and UV-Vis Spectrometric Iron Speciation in Quenched Low and Intermediate Level Nuclear Waste Glasses. Materials Research Society Symposia Proceedings, 2015, 1744, 93-100.	0.1	6
112	A Sampling Method for Semi-Quantitative and Quantitative Electron Microprobe Analysis of Glass Surfaces. Materials Research Society Symposia Proceedings, 2015, 1744, 101-106.	0.1	4
113	Meso-scale magnetic signatures for nuclear reactor steel irradiation embrittlement monitoring. , 2015, , .		2
114	Spectral study of oxide-shell in core-shell iron nanoclusters. , 2015, , .		0
115	Infrared-transparent glass ceramics: An exploratory study. Journal of Non-Crystalline Solids, 2015, 410, 160-173.	3.1	14
116	Computational and experimental investigations of magnetic domain structures in patterned magnetic thin films. Journal Physics D: Applied Physics, 2015, 48, 305001.	2.8	12
117	Anisotropic small-polaron hopping in W:BiVO4 single crystals. Applied Physics Letters, 2015, 106, .	3.3	75
118	Electrical and Magnetic Properties Modification in Heavy Ion Irradiated Nanograin Ni <sub>x</sub> Co <sub>3-x</sub> O <sub>4</sub> Films. Journal of Physical Chemistry C, 2015, 119, 22465-22476.	3.1	14
119	Hysteresis in single and polycrystalline iron thin films: Major and minor loops, first order reversal curves, and Preisach modeling. Journal of Magnetism and Magnetic Materials, 2015, 395, 361-375.	2.3	57
120	Nepheline crystallization in boron-rich alumino-silicate glasses as investigated by multi-nuclear NMR, Raman, & Mössbauer spectroscopies. Journal of Non-Crystalline Solids, 2015, 409, 149-165.	3.1	42
121	Scintillation and luminescence in transparent colorless single and polycrystalline bulk ceramic ZnS. Journal of Luminescence, 2015, 157, 416-423.	3.1	15
122	Oxide shell reduction and magnetic property changes in core-shell Fe nanoclusters under ion irradiation. Journal of Applied Physics, 2014, 115, 17B507.	2.5	7
123	Exchange bias in polycrystalline magnetite films made by ion-beam assisted deposition. Journal of Applied Physics, 2014, 116, .	2.5	5
124	Raman analysis of perrhenate and pertechnetate in alkali salts and borosilicate glasses. Journal of Raman Spectroscopy, 2014, 45, 139-147.	2.5	35
125	In Situ Study of Nanostructure and Electrical Resistance of Nanocluster Films Irradiated with Ion Beams. Advanced Functional Materials, 2014, 24, 6210-6218.	14.9	14
126	Design considerations for high-Q bandpass microwave oscillator sensors based upon resonant amplification. Applied Physics Letters, 2014, 104, .	3.3	17



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127	Magnetization Measurements and XMCD Studies on Ion Irradiated Iron Oxide and Core-Shell Iron/Iron-Oxide Nanomaterials. IEEE Transactions on Magnetics, 2014, 50, 1-5.	2.1	9
128	Cold crucible induction melter studies for making glass ceramic waste forms: A feasibility assessment. Journal of Nuclear Materials, 2014, 444, 481-492.	2.7	82
129	Frequency dependent optical and dielectric properties of zinc sulfide in Terahertz regime. Infrared Physics and Technology, 2014, 65, 67-71.	2.9	4
130	Redox-dependent solubility of technetium in low activity waste glass. Journal of Nuclear Materials, 2014, 449, 173-180.	2.7	37
131	Iodine solubility in a low-activity waste borosilicate glass at 1000Å°C. Journal of Nuclear Materials, 2014, 452, 178-188.	2.7	60
132	Infrared-transmitting glass-ceramics: a review. Proceedings of SPIE, 2013, , .	0.8	8
133	Combined Charge Carrier Transport and Photoelectrochemical Characterization of BiVO <sub>4</sub> Single Crystals: Intrinsic Behavior of a Complex Metal Oxide. Journal of the American Chemical Society, 2013, 135, 11389-11396.	13.7	435
134	Magnetic properties of double perovskite La <sub>2</sub> BMnO <sub>6</sub> (B = Ni or Co) nanoparticles. Nanoscale, 2013, 5, 4720.	5.6	66
135	Impact of hydrogen and oxygen defects on the lattice parameter of chemical vapor deposited zinc sulfide. Journal of Applied Physics, 2013, 113, .	2.5	19
136	Investigation of magnetic signatures and microstructures for heat-treated ferritic/martensitic HT-9 alloy. Acta Materialia, 2013, 61, 3285-3296.	7.9	19
137	The effect of concentration on the structure and crystallinity of a cementitious waste form for caustic wastes. Journal of Nuclear Materials, 2013, 437, 332-340.	2.7	6
138	Structure of Rhenium-Containing Sodium Borosilicate Glass. International Journal of Applied Glass Science, 2013, 4, 42-52.	2.0	25
139	Millimeter-Wave Absorption as a Quality Control Tool for M-Type Hexaferrite Nanopowders. IEEE Transactions on Magnetics, 2013, 49, 546-551.	2.1	5
140	Structure and Chemistry in Halide Lead-Tellurite Glasses. Journal of Physical Chemistry C, 2013, 117, 3456-3466.	3.1	21
141	Sublattice Magnetic Relaxation in Rare Earth Iron Garnets. IEEE Transactions on Magnetics, 2013, 49, 4253-4256.	2.1	26
142	Photoluminescence in Chemical Vapor Deposited ZnS: insight into electronic defects. Optical Materials Express, 2013, 3, 1273.	3.0	31
143	Use of first order reversal curve measurements to understand Barkhausen noise emission in nuclear steel. AIP Conference Proceedings, 2013, , .	0.4	10
144	Structure and magnetic properties of irradiated Fe-Fe oxide core-shell nanoclusters. AIP Conference Proceedings, 2013, , .	0.4	3

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145	Ion irradiation of Fe-Fe oxide core-shell nanocluster films: Effect of interface on stability of magnetic properties. Journal of Applied Physics, 2013, 114, .	2.5	13
146	Regenerative feedback resonant circuit to detect transient changes in electromagnetic properties of semi-insulating materials. Review of Scientific Instruments, 2013, 84, 084703.	1.3	6
147	Exchange bias in core-shell iron-iron oxide nanoclusters. Journal of Applied Physics, 2013, 113, 17D715.	2.5	21
148	Crystallization of Rhenium Salts in a Simulated Low-Activity Waste Borosilicate Glass. Journal of the American Ceramic Society, 2013, 96, 1150-1157.	3.8	20
149	Chemical Vapor Deposited Zinc Sulfide. , 2013, , .		15
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