

Rahul Vaish

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#	Paper	IF	Citations
230	Anti-Ferroelectric Ceramics for High Energy Density Capacitors. <i>Materials</i> , 2015 , 8, 8009-8031	3.5	194
229	Selection and performance assessment of Phase Change Materials for heating, ventilation and air-conditioning applications. <i>Energy Conversion and Management</i> , 2015 , 89, 260-269	10.6	82
228	Efficient Solar Energy Conversion Using CaCu ₃ Ti ₄ O ₁₂ Photoanode for Photocatalysis and Photoelectrocatalysis. <i>Scientific Reports</i> , 2016 , 6, 18557	4.9	62
227	Photocatalytic, hydrophobic and antimicrobial characteristics of ZnO nano needle embedded cement composites. <i>Construction and Building Materials</i> , 2018 , 158, 285-294	6.7	57
226	Candle soot: Journey from a pollutant to a functional material. <i>Carbon</i> , 2019 , 144, 684-712	10.4	57
225	Multicaloric effect in Pb(Mn _{1/3} Nb _{2/3})O ₃ -32PbTiO ₃ single crystals. <i>Acta Materialia</i> , 2015 , 89, 384-395	8.4	56
224	Dielectric properties of Li ₂ OBB ₂ O ₃ glasses. <i>Journal of Applied Physics</i> , 2009 , 106, 064106	2.5	56
223	Enhanced electrocaloric, pyroelectric and energy storage performance of BaCe Ti ₁₀ O ₃ ceramics. <i>Journal of the European Ceramic Society</i> , 2017 , 37, 3927-3933	6	53
222	Large pyroelectric figure of merits for Sr-modified Ba _{0.85} Ca _{0.15} Zr _{0.1} Ti _{0.9} O ₃ ceramics. <i>Solid State Sciences</i> , 2016 , 52, 10-18	3.4	51
221	Elastocaloric effect in ferroelectric ceramics. <i>Applied Physics Letters</i> , 2015 , 106, 172901	3.4	49
220	Tuning of dielectric, pyroelectric and ferroelectric properties of 0.715Bi _{0.5} Na _{0.5} TiO ₃ -0.065BaTiO ₃ -0.22SrTiO ₃ ceramic by internal clamping. <i>AIP Advances</i> , 2015 , 5, 087145	1.5	46
219	A technique for giant mechanical energy harvesting using ferroelectric/antiferroelectric materials. <i>Journal of Applied Physics</i> , 2014 , 115, 084908	2.5	45
218	An analysis of lead-free (Bi _{0.5} Na _{0.5}) _{0.915} -(Bi _{0.5} K _{0.5}) _{0.05} Ba _{0.02} Sr _{0.015} TiO ₃ ceramic for efficient refrigeration and thermal energy harvesting. <i>Journal of Applied Physics</i> , 2014 , 115, 013505	2.5	45
217	Thermal Energy Harvesting Using Bulk Lead-Free Ferroelectric Ceramics. <i>International Journal of Applied Ceramic Technology</i> , 2015 , 12, E49-E54	2	40
216	Enhanced Thermal Energy Harvesting Using Li, K-Doped Bi _{0.5} Na _{0.5} TiO ₃ Lead-Free Ferroelectric Ceramics. <i>Energy Technology</i> , 2014 , 2, 205-209	3.5	40
215	Multiple caloric effects in (Ba _{0.865} Ca _{0.135} Zr _{0.1089} Ti _{0.8811} Fe _{0.01})O ₃ ferroelectric ceramic. <i>Applied Physics Letters</i> , 2015 , 107, 042902	3.4	38
214	Finite element analysis of vibration energy harvesting using lead-free piezoelectric materials: A comparative studyPeer review under responsibility of The Ceramic Society of Japan and the Korean Ceramic Society.View all notes. <i>Journal of Asian Ceramic Societies</i> , 2014 , 2, 139-143	2.4	36

213	A review and analysis of the elasto-caloric effect for solidstate refrigeration devices: Challenges and opportunities. <i>MRS Energy & Sustainability</i> , 2015 , 2, 1	2.2	36
212	Impact of remnant surface polarization on photocatalytic and antibacterial performance of BaTiO ₃ . <i>Journal of the European Ceramic Society</i> , 2019 , 39, 2915-2922	6	35
211	Piezoelectric material selection for transducers under fuzzy environment. <i>Journal of Advanced Ceramics</i> , 2013 , 2, 141-148	10.7	33
210	Elastocaloric and barocaloric effects in polyvinylidene di-fluoride-based polymers. <i>Applied Physics Letters</i> , 2016 , 108, 072903	3.4	33
209	Photocatalytic, piezocatalytic, and piezo-photocatalytic effects in ferroelectric (Ba _{0.875} Ca _{0.125})(Ti _{0.95} Sn _{0.05})O ₃ ceramics. <i>Journal of the American Ceramic Society</i> , 2019 , 102, 5807-5817	3.8	32
208	Electrocaloric Behavior and Temperature-Dependent Scaling of Dynamic Hysteresis of Ba _{0.85} Ca _{0.15} Ti _{0.9} Zr _{0.1} O ₃ Ceramics. <i>International Journal of Applied Ceramic Technology</i> , 2015 , 12, 899-907	3.0	32
207	Electrical transport characteristics of ZnO:Bi ₂ O ₃ :B ₂ O ₃ glasses. <i>Ionics</i> , 2013 , 19, 99-104	2.7	31
206	A study on the structural and photocatalytic degradation of ciprofloxacin using (70B ₂ O ₃ -9Bi ₂ O ₃ -11Dy ₂ O ₃) _x (BaO-TiO ₂) _{1-x} glass ceramics. <i>Journal of Non-Crystalline Solids</i> , 2015 , 428, 197-203	3.9	30
205	Janus nanostructures for heterogeneous photocatalysis. <i>Applied Physics Reviews</i> , 2018 , 5, 041111	17.3	29
204	Analysis of High-Field Energy Harvesting using Ferroelectric Materials. <i>Energy Technology</i> , 2014 , 2, 480-485	3.5	28
203	Enhanced pyroelectric figure of merits of porous BaSn _{0.05} Ti _{0.95} O ₃ ceramics. <i>Journal of the European Ceramic Society</i> , 2017 , 37, 3943-3950	6	27
202	Rapid bacterial disinfection using low frequency piezocatalysis effect. <i>Journal of Industrial and Engineering Chemistry</i> , 2019 , 77, 355-364	6.3	27
201	A Prime Lead-Free Ferroelectric Ceramic for Thermal Energy Harvesting: 0.88Bi _{0.5} Na _{0.5} TiO ₃ -0.02SrTiO ₃ -0.1Bi _{0.5} Li _{0.5} TiO ₃ . <i>Ferroelectrics</i> , 2015 , 474, 1-7	0.6	26
200	Exploring the piezocatalytic dye degradation capability of lithium niobate. <i>Advanced Powder Technology</i> , 2020 , 31, 1771-1775	4.6	26
199	Dye degradation and bacterial disinfection using multicycatalytic BaZr _{0.02} Ti _{0.98} O ₃ ceramics. <i>Journal of the American Ceramic Society</i> , 2020 , 103, 4774-4784	3.8	25
198	TiO ₂ microcrystallized glass plate mediated photocatalytic degradation of estrogenic pollutant in water. <i>Journal of Non-Crystalline Solids</i> , 2015 , 408, 13-17	3.9	23
197	Piezoelectric and Pyroelectric Materials Selection. <i>International Journal of Applied Ceramic Technology</i> , 2013 , 10, 682-689	2	23
196	Improved Electrical Energy Storage Density in Vanadium-Doped BaTiO ₃ Bulk Ceramics by Addition of 3BaO:Bi ₂ O ₃ :B ₂ O ₃ Glass. <i>Energy Technology</i> , 2015 , 3, 70-76	3.5	23

195	Selection of Lead-Free Piezoelectric Ceramics. <i>International Journal of Applied Ceramic Technology</i> , 2014 , 11, 883-893	2	23
194	Effect of Ce on piezo/photocatalytic effects of Ba _{0.9} Ca _{0.1} Ce _x Ti _{1-x} O ₃ ceramics for dye/pharmaceutical waste water treatment. <i>Materials Research Bulletin</i> , 2020 , 122, 110647	5.1	23
193	Multicatalytic behavior of Ba _{0.85} Ca _{0.15} Ti _{0.9} Zr _{0.1} O ₃ ceramics for pharmaceutical/dye/bacterial treatments. <i>Journal of Applied Physics</i> , 2020 , 127, 135103	2.5	22
192	Lead-free piezoelectric materials performance in structural active vibration control. <i>Journal of Intelligent Material Systems and Structures</i> , 2014 , 25, 1596-1604	2.3	22
191	Enhanced thermal energy conversion and dynamic hysteresis behavior of Sr-added Ba _{0.85} Ca _{0.15} Ti _{0.9} Zr _{0.1} O ₃ ferroelectric ceramics. <i>Journal of Materiomics</i> , 2016 , 2, 75-86	6.7	21
190	Multicoloric effect in Pb(Mn _{1/3} Nb _{2/3})O ₃ -32PbTiO ₃ single crystals: Modes of measurement. <i>Acta Materialia</i> , 2015 , 97, 17-28	8.4	20
189	Adsorption of dyes onto candle soot: Equilibrium, kinetics and thermodynamics. <i>European Physical Journal Plus</i> , 2018 , 133, 1	3.1	20
188	Experimental Study on Waste Heat Energy Harvesting using Lead Zirconate Titanate (PZT-5H) Pyroelectric Ceramics. <i>Energy Technology</i> , 2015 , 3, 768-773	3.5	19
187	TiO ₂ @C core@shell nanocomposites: A single precursor synthesis of photocatalyst for efficient solar water treatment. <i>Journal of Hazardous Materials</i> , 2020 , 381, 120883	12.8	19
186	Photocatalytic study on SrBi ₂ B ₂ O ₇ (SrO-Bi ₂ O ₃ -B ₂ O ₃) transparent glass ceramics. <i>Materials Research Bulletin</i> , 2018 , 99, 453-459	5.1	19
185	Polyaniline/CaCu ₃ Ti ₄ O ₁₂ nanofiber composite with a synergistic effect on visible light photocatalysis. <i>RSC Advances</i> , 2015 , 5, 87241-87250	3.7	18
184	Thermal energy conversion and temperature-dependent dynamic hysteresis analysis for Ba _{0.85} Ca _{0.15} Ti _{0.9} FexZr _{0.1} O ₃ ceramicsPeer review under responsibility of The Ceramic Society of Japan and the Korean Ceramic Society.View all notes. <i>Journal of Asian Ceramic Societies</i> , 2016 , 4, 102-111	2.4	18
183	Selection of optimal sintering temperature of K _{0.5} Na _{0.5} NbO ₃ ceramics for electromechanical applicationsPeer review under responsibility of The Ceramic Society of Japan and the Korean Ceramic Society.View all notes. <i>Journal of Asian Ceramic Societies</i> , 2014 , 2, 5-10	2.4	18
182	The glass transition and crystallization kinetic studies on BaNaB ₉ O ₁₅ glasses. <i>Journal Physics D: Applied Physics</i> , 2009 , 42, 015409	3	18
181	Pyro-paraelectric and flexocaloric effects in barium strontium titanate: A first principles approach. <i>Applied Physics Letters</i> , 2016 , 108, 162901	3.4	18
180	Candle soot coated polyurethane foam as an adsorbent for removal of organic pollutants from water. <i>European Physical Journal Plus</i> , 2019 , 134, 1	3.1	17
179	Multifunctional diesel exhaust emission soot coated sponge for water treatment. <i>Environmental Science and Pollution Research</i> , 2019 , 26, 8148-8156	5.1	17
178	Diesel soot coated non-woven fabric for oil-water separation and adsorption applications. <i>Scientific Reports</i> , 2019 , 9, 8503	4.9	17

177	Mechanical confinement for tuning ferroelectric response in PMN-PT single crystal. <i>Journal of Applied Physics</i> , 2015 , 117, 084102	2.5	17
176	Poling direction driven large enhancement in piezoelectric performance. <i>Scripta Materialia</i> , 2018 , 151, 76-81	5.6	17
175	Highly efficient visible light mediated azo dye degradation through barium titanate decorated reduced graphene oxide sheets. <i>Electronic Materials Letters</i> , 2016 , 12, 281-289	2.9	17
174	Near-zero thermal expansion transparent lithium aluminosilicate glass-ceramic by microwave hybrid heat treatment. <i>Journal of the American Ceramic Society</i> , 2018 , 101, 140-150	3.8	16
173	Enhanced electrocaloric effect in Ba _{0.85} Ca _{0.15} Zr _{0.1} Ti _{0.9} Sn _x O ₃ ferroelectric ceramics. <i>Phase Transitions</i> , 2016 , 89, 1062-1073	1.3	16
172	Enhanced energy storage performance of glass added 0.715Bi _{0.5} Na _{0.5} TiO ₃ -0.065BaTiO ₃ -0.22SrTiO ₃ ferroelectric ceramicsPeer review under responsibility of The Ceramic Society of Japan and the Korean Ceramic Society.View all notes. <i>Journal of the American Ceramic Society</i> , 2017 , 100, 2822-2826	2.4	16
171	Electrical Energy Generation from Hot/Cold Air Using Pyroelectric Ceramics. <i>Integrated Ferroelectrics</i> , 2015 , 167, 90-97	0.8	16
170	Elastocaloric Effect in Carbon Nanotubes and Graphene. <i>Nano Letters</i> , 2016 , 16, 7008-7012	11.5	16
169	Effect of Sr ₂ TiMnO ₆ fillers on mechanical, dielectric and thermal behaviour of PMMA polymer. <i>Journal of Advanced Dielectrics</i> , 2015 , 05, 1550018	1.3	15
168	Enhanced electrocaloric effect in Fe-doped (Ba _{0.85} Ca _{0.15} Zr _{0.1} Ti _{0.9})O ₃ ferroelectric ceramics. <i>Applied Materials Today</i> , 2015 , 1, 37-44	6.6	15
167	Development of Figures of Merit for Pyroelectric Energy-Harvesting Devices. <i>Energy Technology</i> , 2016 , 4, 843-850	3.5	15
166	Flexible Ag@LiNbO/PVDF Composite Film for Piezocatalytic Dye/Pharmaceutical Degradation and Bacterial Disinfection. <i>ACS Applied Materials & Interfaces</i> , 2021 , 13, 22914-22925	9.5	15
165	First principles insights into improved catalytic performance of BaTiO ₃ - graphene nanocomposites in conjugation with experimental investigations. <i>Materials Science in Semiconductor Processing</i> , 2016 , 51, 33-41	4.3	15
164	Pyroelectric performance of porous Ba _{0.85} Sr _{0.15} TiO ₃ ceramics. <i>International Journal of Applied Ceramic Technology</i> , 2018 , 15, 140-147	2	15
163	Portable triboelectric based wind energy harvester for low power applications. <i>European Physical Journal Plus</i> , 2017 , 132, 1	3.1	14
162	Transparent ZnO crystallized glass ceramics for photocatalytic and antibacterial applications. <i>Journal of Applied Physics</i> , 2019 , 125, 175102	2.5	14
161	Visible Light-Induced Photocatalytic and Antibacterial Activity of Li-Doped Bi _{0.5} Na _{0.45} K _{0.5} TiO ₃ BaTiO ₃ Ferroelectric Ceramics. <i>Journal of Electronic Materials</i> , 2015 , 44, 4334-4342 ^{1.9}		14
160	Enhanced dye adsorption and rapid photocatalysis of candle soot coated BaTiO ₃ ceramics. <i>Materials Chemistry and Physics</i> , 2020 , 252, 123311	4.4	14

159	Visible light induced water detoxification through Portland cement composites reinforced with photocatalytic filler: A leap away from TiO ₂ . <i>Construction and Building Materials</i> , 2016 , 120, 364-372	6.7	14
158	Effect of sintering temperature and dwell time on electrocaloric properties of Ba _{0.85} Ca _{0.075} Sr _{0.075} Ti _{0.90} Zr _{0.10} O ₃ ceramics. <i>Phase Transitions</i> , 2017 , 90, 465-474	1.3	14
157	Structural, thermal and dielectric properties and thermal degradation kinetics of nylon 11/CaCu ₃ Ti ₄ O ₁₂ (CCTO) nanocomposites. <i>Journal of Thermal Analysis and Calorimetry</i> , 2020 , 141, 1123-1135	4.1	14
156	Emerging trends in glass-ceramic photocatalysts. <i>Chemical Engineering Journal</i> , 2021 , 407, 126971	14.7	14
155	Candle Soot-Driven Performance Enhancement in Pyroelectric Energy Conversion. <i>Journal of Electronic Materials</i> , 2018 , 47, 4721-4730	1.9	14
154	Selection of Ferroelectric Ceramics for Transducers and Electrical Energy Storage Devices. <i>International Journal of Applied Ceramic Technology</i> , 2015 , 12, E1-E7	2	13
153	Pyroelectric performance of BaTi _{1-x} Sn _x O ₃ ceramics. <i>International Journal of Applied Ceramic Technology</i> , 2018 , 15, 546-553	2	13
152	Enhanced electrocatalytic performance of perovskite supported iron oxide nanoparticles for oxygen reduction reaction. <i>RSC Advances</i> , 2016 , 6, 94826-94832	3.7	13
151	Separation of dyes/oils from water by diesel exhaust emission soot coated polyurethane foam: a kinetic and equilibrium isotherm study. <i>Engineering Research Express</i> , 2019 , 1, 015010	0.9	13
150	Cyclic Electrical Energy Harvesting Using Mechanical Confinement in Ferroelectric Ceramics. <i>International Journal of Applied Ceramic Technology</i> , 2015 , 12, 765-770	2	13
149	Enhanced Electrocaloric Effect in Pre-stressed Ferroelectric Materials. <i>Energy Technology</i> , 2015 , 3, 177-186	3.6	13
148	Pyroelectric signals in (Ba,Ca)TiO ₃ -xBa(Sn,Ti)O ₃ ceramics: A viable alternative for lead-based ceramics. <i>Scripta Materialia</i> , 2018 , 146, 146-149	5.6	13
147	Enhanced Visible Light Photocatalytic Activity of Curcumin-Sensitized Perovskite Bi _{0.5} Na _{0.5} TiO ₃ for Rhodamine 6G Degradation. <i>International Journal of Applied Ceramic Technology</i> , 2016 , 13, 333-339	2	13
146	Tunable surface adsorption and wettability of candle soot coated on ferroelectric ceramics. <i>Journal of Advanced Research</i> , 2019 , 16, 35-42	13	13
145	Bi _{0.5} Na _{0.5} TiO ₃ -BiOCl composite photocatalyst for efficient visible light degradation of dissolved organic impurities. <i>Journal of Environmental Chemical Engineering</i> , 2019 , 7, 102842	6.8	12
144	Selection of India's energy resources: a fuzzy decision making approach. <i>Energy Systems</i> , 2015 , 6, 439-453	1.7	12
143	Surface-selective bactericidal effect of poled ferroelectric materials. <i>Journal of Applied Physics</i> , 2018 , 124, 014901	2.5	12
142	Giant energy harvesting potential in (100)-oriented 0.68PbMg _{1/3} Nb _{2/3} O ₃ .32PbTiO ₃ with Pb(Zr _{0.3} Ti _{0.7})O ₃ /PbO _x buffer layer and (001)-oriented 0.67PbMg _{1/3} Nb _{2/3} O ₃ .33PbTiO ₃ thin films. <i>Journal of Advanced Dielectrics</i> , 2014 , 04, 1450029	1.3	12

141	Energy harvesting using piezoelectric cementitious composites for water cleaning applications. <i>Materials Research Bulletin</i> , 2021 , 137, 111205	5.1	12
140	Caloric Effects in Bulk Lead-Free Ferroelectric Ceramics for Solid-State Refrigeration. <i>Energy Technology</i> , 2016 , 4, 244-248	3.5	12
139	Antibacterial and photocatalytic active transparent TiO ₂ crystallized CaO-BaO-B ₂ O ₃ -Al ₂ O ₃ -TiO ₂ -ZnO glass nanocomposites. <i>Journal of the American Ceramic Society</i> , 2019 , 102, 3378-3390	3.8	12
138	Piezo/pyro/photo-catalysis activities in Ba _{0.85} Ca _{0.15} (Ti _{0.9} Zr _{0.1}) _{1-x} Fe _x O ₃ ceramics. <i>Journal of the American Ceramic Society</i> , 2021 , 104, 45-56	3.8	12
137	Thermomechanical Energy Conversion Potential of Lead-Free 0.50Ba(Zr _{0.2} Ti _{0.8})O ₃ -0.50(Ba _{0.7} Ca _{0.3})TiO ₃ Bulk Ceramics. <i>Energy Technology</i> , 2018 , 6, 872-882	3.5	12
136	A study on epoxy-based 1B piezoelectric composites using finite element method. <i>Polymer Composites</i> , 2016 , 37, 1895-1905	3	11
135	Crystallisation studies on site saturated lithium aluminosilicate (LAS) glass. <i>Thermochimica Acta</i> , 2019 , 679, 178311	2.9	10
134	Pyroelectric energy conversion using Ba _{0.85} Sr _{0.15} Zr _{0.1} Ti _{0.9} O ₃ ceramics and its cement-based composites. <i>Journal of Intelligent Material Systems and Structures</i> , 2019 , 30, 869-877	2.3	10
133	Performance of K _{0.5} Na _{0.5} NbO ₃ (KNN)-based Lead-free Piezoelectric Materials in Active Vibration Control. <i>International Journal of Applied Ceramic Technology</i> , 2015 , 12, E64-E72	2	10
132	Flexoelectric effect in functionally graded materials: A numerical study. <i>European Physical Journal Plus</i> , 2018 , 133, 1	3.1	10
131	Hierarchical growth of BiOCl on SrO-Bi ₂ O ₃ -B ₂ O ₃ glass-ceramics for self-cleaning applications. <i>Journal of the American Ceramic Society</i> , 2018 , 101, 2901-2913	3.8	10
130	Controlled crystallization of photocatalytic active Bismuth oxyfluoride/Bismuth fluoride on SrO-Bi ₂ O ₃ -B ₂ O ₃ transparent glass ceramic. <i>Journal of the European Ceramic Society</i> , 2018 , 38, 3635-3642 ⁶		10
129	Finite Element Study on Performance of Piezoelectric Bimorph Cantilevers Using Porous/Ceramic 0B Polymer Composites. <i>Journal of Electronic Materials</i> , 2018 , 47, 233-241	1.9	10
128	Cement-based diesel exhaust emission soot coatings for the removal of organic pollutants from water. <i>Construction and Building Materials</i> , 2020 , 234, 117377	6.7	10
127	Elastocaloric and Piezocaloric Effects in Lead Zirconate Titanate Ceramics. <i>Energy Technology</i> , 2016 , 4, 647-652	3.5	10
126	Pyroelectric and impedance studies of the 0.5Ba(Zr _{0.2} Ti _{0.8})O ₃ -0.5(Ba _{0.7} Sr _{0.3})TiO ₃ ceramics. <i>Ceramics International</i> , 2018 , 44, 21976-21981	5.1	10
125	Harvesting thermal energy (via radiation) using pyroelectric materials (PZT-5H): An experimental study. <i>Ferroelectrics, Letters Section</i> , 2017 , 44, 35-41	0.5	9
124	Active vibration control of smart structure using poling tuned piezoelectric material. <i>Journal of Intelligent Material Systems and Structures</i> , 2020 , 31, 1298-1313	2.3	9

123	Functional Cementitious Composites for Pyroelectric Applications. <i>Journal of Electronic Materials</i> , 2018 , 47, 2378-2385	1.9	9
122	Large room temperature electrocaloric strength in bulk ferroelectric ceramics: an optimum solution. <i>Phase Transitions</i> , 2016 , 89, 1019-1028	1.3	9
121	Engineered microstructure for tailoring the pyroelectric performance of Ba _{0.85} Sr _{0.15} Zr _{0.1} Ti _{0.9} O ₃ ceramics by 3BaO-3TiO ₂ -B ₂ O ₃ glass addition. <i>Applied Physics Letters</i> , 2017 , 110, 232901	3.4	9
120	Enhanced Electrical Energy Storage Density in Mechanical Confined Antiferroelectric Ceramic. <i>Ferroelectrics</i> , 2015 , 486, 114-125	0.6	9
119	A Comparative Study on Decision Making Methods with Interval Data. <i>Journal of Computational Engineering</i> , 2014 , 2014, 1-10		9
118	Fluid Selection of Organic Rankine Cycle Using Decision Making Approach. <i>Journal of Computational Engineering</i> , 2013 , 2013, 1-10		9
117	Effect of sintering temperature and dwell time dependent dynamic hysteresis scaling behavior of (Ba _{0.85} Ca _{0.075} Sr _{0.075})(Ti _{0.90} Zr _{0.10})O ₃ ceramics. <i>Ferroelectrics</i> , 2016 , 505, 52-66	0.6	9
116	Effect of Peierls stress and strain-hardening parameters on EMR emission in metals and alloys during progressive plastic deformation. <i>International Journal of Materials Research</i> , 2016 , 107, 503-517	0.5	9
115	Influence of LiNbO ₃ crystallization on the optical, dielectric and nanoindentation properties of the 30SiO ₂ B ₅ Li ₂ O ₅ Nb ₂ O ₅ glass. <i>Journal of Applied Physics</i> , 2019 , 126, 214101	2.5	9
114	Vibration induced refrigeration and energy harvesting using piezoelectric materials: a finite element study.. <i>RSC Advances</i> , 2019 , 9, 3918-3926	3.7	8
113	Large Gain in Pyroelectric Energy Conversion through a Candle Soot Coating. <i>Energy Technology</i> , 2018 , 6, 950-955	3.5	8
112	Electrocaloric behavior and temperature dependent scaling of dynamic hysteresis of Ba _x Sr _{1-x} TiO ₃ (x = 0.7, 0.8 and 0.9) bulk ceramics. <i>Journal of the Australian Ceramic Society</i> , 2018 , 54, 439-450	1.5	8
111	Photocatalytic Active Bismuth Fluoride/Oxyfluoride Surface Crystallized 2Bi ₂ O ₃ -B ₂ O ₃ Glass-Ceramics. <i>Journal of Electronic Materials</i> , 2018 , 47, 3490-3496	1.9	8
110	Ferroelectric electrocatalysts: a new class of materials for oxygen evolution reaction with synergistic effect of ferroelectric polarization. <i>Journal of Materials Science</i> , 2018 , 53, 1414-1423	4.3	8
109	A numerical study on flexoelectric bistable energy harvester. <i>Applied Physics A: Materials Science and Processing</i> , 2018 , 124, 1	2.6	8
108	Reaping the benefits of ferroelectricity in selectively precipitated lithium niobate microcrystals in silica matrix for photocatalysis. <i>Applied Physics Letters</i> , 2016 , 109, 223901	3.4	8
107	Transparent CaF ₂ surface crystallized CaO-B ₂ O ₃ glass possessing efficient photocatalytic and antibacterial properties. <i>Journal of the American Ceramic Society</i> , 2019 , 102, 5127-5137	3.8	8
106	Melt quenched V ₂ O ₅ /BiVO ₄ composite: A novel and promising adsorbent and photocatalyst. <i>Materials Chemistry and Physics</i> , 2020 , 240, 122238	4.4	8

105	Utilizing the localized surface piezoelectricity of centrosymmetric Sr _{1-x} FexTiO ₃ (x0.2) ceramics for piezocatalytic dye degradation. <i>Journal of the European Ceramic Society</i> , 2021 , 41, 326-334	6	8
104	Effect of poling on piezocatalytic removal of multi-pollutants using BaTiO ₃ . <i>Journal of the American Ceramic Society</i> , 2021 , 104, 1661-1668	3.8	8
103	Dielectric properties of nylon 11/CaCu ₃ Ti ₄ O ₁₂ (CCTO) nanocomposite films with high permittivity. <i>IEEE Transactions on Dielectrics and Electrical Insulation</i> , 2019 , 26, 568-575	2.3	7
102	Effect of Directional Mechanical Confinement on the Electrical Energy Storage Density in 68Pb(Mn _{1/3} Nb _{2/3})O ₃ -32PbTiO ₃ Single Crystals. <i>Ferroelectrics</i> , 2015 , 478, 40-53	0.6	7
101	Solar light induced antibacterial performance of TiO ₂ crystallized glass ceramics. <i>International Journal of Applied Glass Science</i> , 2018 , 9, 480-486	1.8	7
100	A numerical study on anomalous behavior of piezoelectric response in functionally graded materials. <i>Journal of Materials Science</i> , 2018 , 53, 2413-2423	4.3	7
99	Solar Energy Harvesting Using Pyroelectric Effect Associated with Piezoelectric Buzzer. <i>Physica Status Solidi (A) Applications and Materials Science</i> , 2019 , 216, 1900440	1.6	7
98	Photocatalytic self-cleaning transparent 2Bi ₂ O ₃ -B ₂ O ₃ glass ceramics. <i>Journal of Applied Physics</i> , 2017 , 122, 094901	2.5	7
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