

Konrad Āwierczek

List of Publications by Year in descending order

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167
papers

5,259
citations

76326

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170
all docs

170
docs citations

170
times ranked

5845
citing authors

#	ARTICLE	IF	CITATIONS
1	MoS ₂ Nanosheets Vertically Grown on Graphene Sheets for Lithium-Ion Battery Anodes. ACS Nano, 2016, 10, 8526-8535.	14.6	447
2	High-Performance Anode Material Sr ₂ FeMo _{0.65} Ni _{0.35} O ₆ with <i>In Situ</i> Exsolved Nanoparticle Catalyst. ACS Nano, 2016, 10, 8660-8669.	14.6	287
3	Functional materials for the IT-SOFC. Journal of Power Sources, 2007, 173, 657-670.	7.8	148
4	Carbon sheathed MoS ₂ Nanothorns Epitaxially Grown on CNTs: Electrochemical Application for Highly Stable and Ultrafast Lithium Storage. Advanced Energy Materials, 2018, 8, 1700174.	19.5	141
5	MoS ₂ nanosheets vertically grown on reduced graphene oxide via oxygen bonds with carbon coating as ultrafast sodium ion batteries anodes. Carbon, 2017, 119, 91-100.	10.3	120
6	Hierarchically structured lithium titanate for ultrafast charging in long-life high capacity batteries. Nature Communications, 2017, 8, 15636.	12.8	117
7	Diffusional mechanism of deintercalation in LiFe _{1-y} Mn _y PO ₄ cathode material. Solid State Ionics, 2006, 177, 2617-2624.	2.7	106
8	Facile synthesis of MoO ₃ /carbon nanobelts as high-performance anode material for lithium ion batteries. Electrochimica Acta, 2015, 180, 947-956.	5.2	96
9	Synthesis of core-shell-like ZnS/C nanocomposite as improved anode material for lithium ion batteries. Electrochimica Acta, 2017, 228, 100-106.	5.2	95
10	High-Performance SmBaMn ₂ O ₅ Electrode for Symmetrical Solid Oxide Fuel Cell. Chemistry of Materials, 2019, 31, 3784-3793.	6.7	88
11	Formation and properties of high entropy oxides in Co-Cr-Fe-Mg-Mn-Ni-O system: Novel (Cr,Fe,Mg,Mn,Ni) ₃ O ₄ and (Co,Cr,Fe,Mg,Mn) ₃ O ₄ high entropy spinels. Journal of the European Ceramic Society, 2020, 40, 1644-1650.	5.7	86
12	The effect of 3d substitutions in the manganese sublattice on the charge transport mechanism and electrochemical properties of manganese spinel. Solid State Ionics, 2004, 171, 215-227.	2.7	80
13	An innovative approach to design SOFC air electrode materials: high entropy La _x Sr _x (Co,Cr,Fe,Mn,Ni) ₃ O ₇ (<i>x</i> = 0, 0.1, 0.2, 0.3) perovskites synthesized by the sol-gel method. Journal of Materials Chemistry A, 2020, 8, 24455-24468.	10.3	80
14	TiO ₂ -SnO ₂ nanomaterials for gas sensing and photocatalysis. Journal of the European Ceramic Society, 2013, 33, 2285-2290.	5.7	75
15	Core-shell structured ZnS-C nanoparticles with enhanced electrochemical properties for high-performance lithium-ion battery anodes. Electrochimica Acta, 2017, 225, 129-136.	5.2	74
16	Evaluation of Ln ₂ CuO ₄ (Ln: La, Pr, Nd) oxides as cathode materials for IT-SOFCs. Materials Research Bulletin, 2012, 47, 4089-4095.	5.2	73
17	Novel cobalt-free BaFe _{1-x} Gd _x O ₃ perovskite membranes for oxygen separation. Journal of Materials Chemistry A, 2016, 4, 10454-10466.	10.3	72
18	Defect structure and transport properties of (Co,Cr,Fe,Mn,Ni) ₃ O ₄ spinel-structured high entropy oxide. Journal of the European Ceramic Society, 2020, 40, 835-839.	5.7	71

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19	Conduction mechanism in operating a LiMn ₂ O ₄ cathode. Solid State Ionics, 2002, 146, 225-237.	2.7	68
20	Investigation of In-doped BaFeO ₃ perovskite-type oxygen permeable membranes. Journal of Materials Chemistry A, 2015, 3, 6202-6214.	10.3	68
21	Exceptionally High Performance Anode Material Based on Lattice Structure Decorated Double Perovskite Sr ₂ FeMo _{2/3} Mg _{1/3} O ₆ for Solid Oxide Fuel Cells. Advanced Energy Materials, 2018, 8, 1800062.	19.5	62
22	Computational and experimental understanding of Al-doped Na ₃ V _{2-x} Al _x (PO ₄) ₃ cathode material for sodium ion batteries: Electronic structure, ion dynamics and electrochemical properties. Electrochimica Acta, 2018, 282, 510-519.	5.2	60
23	Studies of selected synthesis procedures of the conducting LiFePO ₄ -based composite cathode materials for Li-ion batteries. Journal of Power Sources, 2007, 173, 700-706.	7.8	57
24	Structural, Transport and Electrochemical Properties of LiFePO ₄ Substituted in Lithium and Iron Sublattices (Al, Zr, W, Mn, Co and Ni). Materials, 2013, 6, 1656-1687.	2.9	56
25	The nature of the nonmetal-metal transition in Li _x CoO ₂ oxide. Solid State Ionics, 2014, 263, 110-118.	2.7	56
26	Delicate lattice modulation enables superior Na storage performance of Na ₃ V ₂ (PO ₄) ₃ as both an anode and cathode material for sodium-ion batteries: understanding the role of calcium substitution for vanadium. Journal of Materials Chemistry A, 2019, 7, 9807-9814.	10.3	56
27	Status report on high temperature fuel cells in Poland – Recent advances and achievements. International Journal of Hydrogen Energy, 2017, 42, 4366-4403.	7.1	55
28	Characterization of novel GdBa _{0.5} Sr _{0.5} Co _{2-x} FexO ₅ perovskites for application in IT-SOFC cells. International Journal of Hydrogen Energy, 2013, 38, 1027-1038.	7.1	53
29	Effective calcium doping at the B-site of BaFeO ₃ perovskite: towards low-cost and high-performance oxygen permeation membranes. Journal of Materials Chemistry A, 2017, 5, 7999-8009.	10.3	53
30	Carbon Deposition and Sulfur Poisoning in SrFe _{0.75} Mo _{0.25} O ₃ and SrFe _{0.5} Mn _{0.25} Mo _{0.25} O ₃ Electrode Materials for Symmetrical SOFCs. Journal of the Electrochemical Society, 2015, 162, F1078-F1087.	2.9	52
31	LFN and LSCFN perovskites – structure and transport properties. Solid State Ionics, 2006, 177, 1811-1817.	2.7	51
32	Micro/Nano Na ₃ V ₂ (PO ₄) ₃ /N-Doped Carbon Composites with a Hierarchical Porous Structure for High-Rate Pouch-Type Sodium-Ion Full-Cell Performance. ACS Applied Materials & Interfaces, 2021, 13, 8445-8454.	8.0	51
33	Effect of ionic size of dopants on the lattice structure, electrical and electrochemical properties of La _{2-x} M _x NiO ₄ (M=ABa, Sr) cathode materials. International Journal of Hydrogen Energy, 2014, 39, 1023-1029.	7.1	49
34	Physicochemical properties of rock salt-type ordered Sr ₂ MMoO ₆ (M=Mg, Mn, Fe, Co, Ni) double perovskites. Journal of the European Ceramic Society, 2014, 34, 4273-4284.	5.7	49
35	The effect of 3d substitutions in the manganese sublattice on the electrical and electrochemical properties of manganese spinel. Solid State Ionics, 2004, 175, 297-304.	2.7	48
36	Evaluation of La _{0.3} Sr _{0.7} Ti _{1-x} Co _x O ₃ as a potential cathode material for solid oxide fuel cells. Journal of Materials Chemistry A, 2014, 2, 10290-10299.	10.3	46

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37	(101) Plane-Oriented SnS ₂ Nanoplates with Carbon Coating: A High-Rate and Cycle-Stable Anode Material for Lithium Ion Batteries. ACS Applied Materials & Interfaces, 2017, 9, 35880-35887.	8.0	46
38	Structural and electrical properties of grain boundaries in Ce _{0.85} Gd _{0.15} O _{1.925} solid electrolyte modified by addition of transition metal ions. Journal of Power Sources, 2009, 194, 2-9.	7.8	44
39	Grain-size-dependent gas-sensing properties of TiO ₂ nanomaterials. Sensors and Actuators B: Chemical, 2015, 211, 67-76.	7.8	44
40	Electrical properties of LiMn ₂ O ₄ at temperatures 220–1100K. Solid State Ionics, 1999, 123, 155-163.	7.8	41
41	Electrochemical performance of Pr _{1-x} Y _x BaCo ₂ O _{5+δ} layered perovskites as cathode materials for intermediate-temperature solid oxide fuel cells. International Journal of Hydrogen Energy, 2013, 38, 16365-16372.	7.1	41
42	Crystal structure and oxygen storage properties of BaLnMn ₂ O _{5+δ} (Ln: Pr, Nd, Sm, Gd, Dy, Er and Y) oxides. Materials Research Bulletin, 2015, 65, 116-122.	5.2	38
43	Thermochemical compatibility between selected (La,Sr)(Co,Fe,Ni)O ₃ cathodes and rare earth doped ceria electrolytes. Journal of Power Sources, 2007, 173, 675-680.	7.8	36
44	Evidence for Al doping in lithium sublattice of LiFePO ₄ . Solid State Ionics, 2015, 270, 33-38.	2.7	36
45	Stabilizing fluorite structure in ceria-based high-entropy oxides: Influence of Mo addition on crystal structure and transport properties. Journal of the European Ceramic Society, 2020, 40, 5870-5881.	5.7	36
46	Structural and electrical properties of selected La _{1-x} Sr _x Co _{0.2} Fe _{0.8} O ₃ and La _{0.6} Sr _{0.4} Co _{0.2} Fe _{0.6} Ni _{0.2} O ₃ perovskite type oxides. Journal of Power Sources, 2007, 173, 695-699.	7.8	32
47	Valence and spin states, and the metal-insulator transition in ferromagnetic La _{2-x} Sr _x MnNiO ₆ (x=0,0.2). Physical Review B, 2009, 80, .	3.2	32
48	Lattice structure, sintering behavior and electrochemical performance of La _{1.7} Ca _{0.3} Ni _{1-x} Cu _x O _{4+δ} as cathode material for intermediate-temperature solid oxide fuel cell. Journal of Power Sources, 2013, 240, 759-765.	7.8	31
49	Synthesis and preliminary study of the double perovskite NdBaMn ₂ O _{5+δ} as symmetric SOFC electrode material. Solid State Ionics, 2016, 288, 61-67.	2.7	30
50	Design and synthesis of a 3-D hierarchical molybdenum dioxide/nickel/carbon structured composite with superior cycling performance for lithium ion batteries. Journal of Materials Chemistry A, 2016, 4, 605-611.	10.3	30
51	Novel ReBaCo _{1.5} Mn _{0.5} O _{5+δ} (Re: La, Pr, Nd, Sm, Gd and Y) perovskite oxide: influence of manganese doping on the crystal structure, oxygen nonstoichiometry, thermal expansion, transport properties, and application as a cathode material in solid oxide fuel cells. Journal of Materials Chemistry A, 2018, 6, 13271-13285.	10.3	30
52	Rock salt ordered-type double perovskite anode materials for solid oxide fuel cells. Solid State Ionics, 2014, 257, 9-16.	2.7	29
53	Effective Ca-doping in Y _{1-x} Ca _x BaCo ₂ O _{5+δ} cathode materials for intermediate temperature solid oxide fuel cells. Journal of Materials Chemistry A, 2017, 5, 25641-25651.	10.3	29
54	Assessment of layered La _{2-x} (Sr,Ba) _x CuO _{4+δ} oxides as potential cathode materials for SOFCs. International Journal of Hydrogen Energy, 2018, 43, 15492-15504.	7.1	29

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55	Investigation of Cu promotion effect on hydrotalcite-based nickel catalyst for CO ₂ methanation. <i>Catalysis Today</i> , 2022, 384-386, 133-145.	4.4	29
56	High performance Ni ₃ S ₂ /Ni film with three dimensional porous architecture as binder-free anode for lithium ion batteries. <i>Electrochimica Acta</i> , 2016, 211, 761-767.	5.2	28
57	Nd-doped Ba(Ce,Zr)O ₃ proton conductors for application in conversion of CO ₂ into liquid fuels. <i>Solid State Ionics</i> , 2012, 225, 297-303.	2.7	27
58	Electronic structure and reactivity of Li _{1-x} Mn ₂ O ₄ cathode. <i>Solid State Ionics</i> , 2000, 135, 53-59.	2.7	26
59	Structural and transport properties of layered Li _{1+x} (Mn _{1/3} Co _{1/3} Ni _{1/3}) _{1-x} O ₂ oxides prepared by a soft chemistry method. <i>Journal of Power Sources</i> , 2009, 194, 38-44.	7.8	26
60	Crystallographic and electronic properties of Li _{1+x} Mn ₂ O ₄ spinels prepared by HT synthesis. <i>Solid State Ionics</i> , 2003, 157, 89-93.	2.7	25
61	Structural, magnetic and electronic properties of LaNi _{0.5} Fe _{0.5} O ₃ in the temperature range 5–1000K. <i>Journal of Solid State Chemistry</i> , 2008, 181, 1833-1839.	2.9	25
62	A SmBaCo ₂ O _{5+δ} double perovskite with epitaxially grown Sm _{0.2} Ce _{0.8} O ₂ nanoparticles as a promising cathode for solid oxide fuel cells. <i>Journal of Materials Chemistry A</i> , 2020, 8, 14162-14170.	10.3	25
63	Mixed ionic-electronic transport in the high-entropy (Co,Cu,Mg,Ni,Zn) _{1-x} Li _x O oxides. <i>Acta Materialia</i> , 2021, 208, 116735.	7.9	25
64	Anomaly in the electronic structure of the Na _x CoO _{2-y} cathode as a source of its step-like discharge curve. <i>Physical Chemistry Chemical Physics</i> , 2014, 16, 14845.	2.8	24
65	Thermoanalysis, nonstoichiometry and thermal expansion of La _{0.4} Sr _{0.6} Co _{0.2} Fe _{0.8} O _{3+δ} , La _{0.2} Sr _{0.8} Co _{0.2} Fe _{0.8} O _{3+δ} , La _{0.9} Sr _{0.1} Co _{1/3} Fe _{1/3} Ni _{1/3} O _{3+δ} and La _{0.6} Sr _{0.4} Co _{0.2} Fe _{0.6} Ni _{0.2} O _{3+δ} perovskites. <i>Solid State Ionics</i> , 2008, 179, 126-130.	3.7	23
66	Synthesis, crystal structure and electrical properties of A-site cation ordered BaErMn ₂ O ₅ and BaErMn ₂ O ₆ . <i>Journal of Solid State Chemistry</i> , 2013, 203, 68-73.	2.9	23
67	Sodium intercalation in Na _x CoO ₂ – Correlation between crystal structure, oxygen nonstoichiometry and electrochemical properties. <i>Solid State Ionics</i> , 2014, 262, 206-210.	2.7	23
68	Evaluation of La ₂ Ni _{0.5} Cu _{0.5} O _{4+δ} and Pr ₂ Ni _{0.5} Cu _{0.5} O _{4+δ} Ruddlesden-Popper-type layered oxides as cathode materials for solid oxide fuel cells. <i>Materials Research Bulletin</i> , 2016, 84, 259-266.	5.2	23
69	Anisotropy of thermal expansion of 3Y-TZP, δ -Al ₂ O ₃ and composites from 3Y-TZP/ δ -Al ₂ O ₃ system. <i>Archives of Civil and Mechanical Engineering</i> , 2018, 18, 188-197.	3.8	23
70	Physico-chemical properties of Ln _{0.5} A _{0.5} Co _{0.5} Fe _{0.5} O _{3+δ} (Ln: La, Sm; A: Sr, Ba) cathode materials and their performance in electrolyte-supported Intermediate Temperature Solid Oxide Fuel Cell. <i>Journal of Power Sources</i> , 2011, 196, 7110-7116.	7.8	22
71	Cation-ordered perovskite-type anode and cathode materials for solid oxide fuel cells. <i>Solid State Ionics</i> , 2014, 262, 354-358.	2.7	21
72	Crystal structure and magnetic properties of high-oxygen pressure annealed Sr _{1-x} LaxCo _{0.5} Fe _{0.5} O _{3+δ} (0 ≤ x ≤ 0.5). <i>Journal of Solid State Chemistry</i> , 2009, 182, 280-288.	2.9	20

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73	Electronic origin of difference in discharge curve between Li_xCoO_2 and Na_xCoO_2 cathodes. <i>Solid State Ionics</i> , 2015, 271, 15-27.	2.7	20
74	Characterization of the physicochemical properties of novel SnS_2 with cubic structure and diamond-like Sn sublattice. <i>Acta Materialia</i> , 2015, 82, 212-223.	7.9	20
75	Characterization of Sr-doped lithium lanthanum titanate with improved transport properties. <i>Solid State Ionics</i> , 2019, 336, 39-46.	2.7	20
76	Red phosphorus as self-template to hierarchical nanoporous nickel phosphides toward enhanced electrocatalytic activity for oxygen evolution reaction. <i>Electrochimica Acta</i> , 2020, 332, 135500.	5.2	20
77	$\text{PbMg}_{1/3}\text{Nb}_{2/3}\text{O}_3$ -doping effects on structural, thermal, Raman, dielectric and ferroelectric properties of BaTiO_3 ceramics. <i>Journal of the European Ceramic Society</i> , 2015, 35, 1777-1783.	5.7	19
78	Reversible oxygen intercalation in hexagonal $\text{Y}_{0.7}\text{Tb}_{0.3}\text{MnO}_{3+\delta}$: toward oxygen production by temperature-swing absorption in air. <i>Journal of Materials Chemistry A</i> , 2019, 7, 2608-2618.	10.3	19
79	Evaluation of $\text{BaY}_{1-x}\text{Pr}_x\text{Mn}_2\text{O}_{5+\delta}$ oxides for oxygen storage technology. <i>Solid State Ionics</i> , 2014, 262, 659-663.	2.7	18
80	Electrochemical properties of mechanochemically synthesized $\text{CoSn}_2\text{-C}$ nanocomposite-type anode material for Li-ion batteries. <i>Solid State Ionics</i> , 2015, 269, 86-92.	2.7	18
81	Oxygen storage properties of hexagonal $\text{HoMnO}_{3+\delta}$. <i>Physical Chemistry Chemical Physics</i> , 2017, 19, 19243-19251.	2.8	18
82	Mn-rich $\text{SmBaCo}_{0.5}\text{Mn}_{1.5}\text{O}_{5+\delta}$ double perovskite cathode material for SOFCs. <i>International Journal of Hydrogen Energy</i> , 2019, 44, 27587-27599.	7.1	18
83	Structure and transport properties of the novel $(\text{Dy,Er,Gd,Ho,Y})_3\text{Fe}_5\text{O}_{12}$ and $(\text{Dy,Gd,Ho,Sm,Y})_3\text{Fe}_5\text{O}_{12}$ high entropy garnets. <i>Journal of the European Ceramic Society</i> , 2021, 41, 3844-3849.	5.7	18
84	Electrolyte-supported IT-SOFC with $\text{LSCF} \text{--} \text{SCFN}$ composite cathode. <i>Solid State Ionics</i> , 2011, 192, 486-490.	2.7	17
85	Toward elucidation of delithiation mechanism of zinc-substituted LiFePO_4 . <i>Electrochimica Acta</i> , 2013, 92, 79-86.	5.2	17
86	Electrochemical properties of $\text{Ti}_{49}\text{Zr}_{26}\text{Ni}_{25}\text{Pd}_x$ ($x=0\text{--}6$) quasicrystal electrodes produced by mechanical alloying. <i>Journal of Alloys and Compounds</i> , 2015, 645, S152-S154.	5.5	17
87	A review on the critical challenges and progress of SiO_x -based anodes for lithium-ion batteries. <i>International Journal of Minerals, Metallurgy and Materials</i> , 2022, 29, 876-895.	4.9	17
88	Overcoming transport and electrochemical limitations in the high-voltage $\text{Na}_{0.67}\text{Ni}_{0.33}\text{Mn}_{0.67-y}\text{Ti}_y\text{O}_2$ ($0 \leq y \leq 0.33$) cathode materials by Ti-doping. <i>Journal of Power Sources</i> , 2018, 404, 39-46.	7.8	16
89	Synthesis of aluminium titanate by means of isostructural heterogeneous nucleation. <i>Journal of the European Ceramic Society</i> , 2019, 39, 2535-2544.	5.7	16
90	A new family of Cu-doped lanthanum silicate apatites as electrolyte materials for SOFCs: Synthesis, structural and electrical properties. <i>Journal of the European Ceramic Society</i> , 2019, 39, 424-431.	5.7	16

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91	Structure and oxygen permeability of BaCo _{0.7} Fe _{0.3} In ₂ O ₇ ceramic membranes. <i>Journal of Membrane Science</i> , 2015, 492, 559-567.	8.2	15
92	Improvement of oxygen storage properties of hexagonal YMnO ₃ by microstructural modifications. <i>Journal of Solid State Chemistry</i> , 2018, 258, 471-476.	2.9	15
93	High-performance oxygen permeation membranes: Cobalt-free Ba _{0.975} La _{0.025} Fe ₁ -Cu O ₃ -ceramics. <i>Journal of Materiomics</i> , 2019, 5, 264-272.	5.7	15
94	Selected Electrochemical Properties of 4,4'-((1E,1'-E)-(1,2,4-Thiadiazole-3,5-diyl)bis(azaneylylidene))bis(methaneylylidene))bis(N,N-di-p-tolyylaniline) towards Perovskite Solar Cells with 14.4% Efficiency. <i>Materials</i> , 2020, 13, 2440.	2.9	15
95	Mitigation of grain boundary resistance in La _{2/3-x} Li _{3x} TiO ₃ perovskite as an electrolyte for solid-state Li-ion batteries. <i>Journal of Materials Science</i> , 2021, 56, 2435-2450.	3.7	15
96	NICKEL-BASED LAYERED PEROVSKITE CATHODE MATERIALS FOR APPLICATION IN INTERMEDIATE-TEMPERATURE SOLID OXIDE FUEL CELLS. <i>Functional Materials Letters</i> , 2011, 04, 151-155.	1.2	14
97	Effect of mechanical milling on electrochemical properties of Ti ₄₅ Zr ₃₈ Ni _{17+x} (x=0, 8) quasicrystals produced by rapid-quenching. <i>Journal of Alloys and Compounds</i> , 2013, 580, S238-S242.	5.5	14
98	Synthesis and preliminary study of La ₄ BaCu ₅ O ₁₃ and La _{6.4} Sr _{1.6} Cu ₈ O ₂₀ ordered perovskites as SOFC/PCFC electrode materials. <i>Solid State Ionics</i> , 2016, 288, 68-75.	2.7	14
99	Enhancement of the oxygen storage properties of BaPrMn ₂ O ₅ and BaSmMn ₂ O ₅ oxides by a high-energy milling. <i>Solid State Ionics</i> , 2016, 298, 66-72.	2.7	14
100	Electrochemical performance and structural durability of Mg-doped SmBaMn ₂ O ₅ layered perovskite electrode for symmetrical solid oxide fuel cell. <i>Catalysis Today</i> , 2021, 364, 80-88.	4.4	14
101	Charge transport mechanism in LiCo _y Mn _{2-y} O ₄ cathode material. <i>Solid State Ionics</i> , 2003, 157, 101-108.	2.7	13
102	Comparison of magnetic and thermoelectric properties of (Nd,Ca)BaCo ₂ O _{5.5} and (Nd,Ca)CoO ₃ . <i>Journal of Applied Physics</i> , 2012, 111, 07D727.	2.5	13
103	La _{1-x} Ba _x Co _{0.2} Fe _{0.8} O ₃ perovskites for application in intermediate temperature SOFCs. <i>Solid State Ionics</i> , 2012, 225, 437-442.	2.7	13
104	Oxygen release from BaLnMn ₂ O ₆ (Ln: Pr, Nd, Y) under reducing conditions as studied by neutron diffraction. <i>Journal of Materials Science</i> , 2017, 52, 6476-6485.	3.7	13
105	In-situ XRD investigations of FeAl intermetallic phase-based alloy oxidation. <i>Corrosion Science</i> , 2020, 164, 108344.	6.6	13
106	Surface engineering with ammonium niobium oxalate: A multifunctional strategy to enhance electrochemical performance and thermal stability of Ni-rich cathode materials at 4.5V cutoff potential. <i>Electrochimica Acta</i> , 2022, 403, 139636.	5.2	13
107	Crystal structure and proton conductivity in highly oxygen-deficient Ba _{1-x} Lax(In,Zr,Sn)O ₃ perovskites. <i>Solid State Ionics</i> , 2015, 275, 58-61.	2.7	12
108	Oxygen storage properties and catalytic activity of layer-ordered perovskites BaY _{1-x} Gd _x Mn ₂ O ₅ . <i>Solid State Ionics</i> , 2016, 288, 43-47.	2.7	12

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109	Unveiling the effects of A-site substitutions on the oxygen ion migration in $A_{2x}NiO_{4+x}$ by first principles calculations. <i>Physical Chemistry Chemical Physics</i> , 2018, 20, 21685-21692.	2.8	12
110	Structural and transport properties of $Li_{1+x}V_1O_2$ anode materials for Li-ion batteries. <i>Solid State Ionics</i> , 2014, 262, 124-127.	2.7	11
111	Structural and electrochemical properties of $Na_{0.72}CoO_2$ as cathode material for sodium-ion batteries. <i>Journal of Solid State Electrochemistry</i> , 2015, 19, 3605-3612.	2.5	11
112	A-site nonstoichiometry and B-site doping with selected M^{3+} cations in $La_{2-x}Cu_{1-y}Zn_{1-z}M_zO_{4-\delta}$ layered oxides. <i>Solid State Ionics</i> , 2018, 317, 26-31.	2.7	11
113	Formation of Solid Solutions and Physicochemical Properties of the High-Entropy $Ln_{1-x}Sr_x(Co,Cr,Fe,Mn,Ni)O_{3-\delta}$ ($Ln = La, Pr, Nd, Sm, Gd$) Perovskites. <i>Materials</i> , 2021, 14, 5264.	2.9	11
114	Enhancement of the Curie temperature in $NdBaCo_{5.5}O_{12}$ by O substitution. <i>Journal of Applied Physics</i> , 2019, 125, 124101.	3.2	10
115	Oxygen storage-related properties of substituted $BaLnMn_2O_{5+\delta}$ A-site ordered manganites. <i>Functional Materials Letters</i> , 2014, 07, 1440004.	1.2	10
116	Evaluation of W-containing $Sr_{1-x}Ba_xFe_{0.75}W_{0.25}O_{3-\delta}$ ($x = 0, 0.5, 1$) anode materials for solid oxide fuel cells. <i>Solid State Ionics</i> , 2016, 288, 124-129.	2.7	10
117	Versatile Application of Redox Processes for $REBaCoMnO_{5+\delta}$ (RE: La, Pr, Nd, Sm, Gd, and Y) Oxides. <i>Journal of Physical Chemistry C</i> , 2019, 123, 48-61.	3.1	10
118	Oxygen separation from air by the combined temperature swing and pressure swing processes using oxygen storage materials $Y_{1-x}(Tb/Ce)_xMnO_{3+\delta}$. <i>Journal of Materials Science</i> , 2020, 55, 15653-15666.	3.7	10
119	Ruddlesden-Popper-type $Nd_{2-x}Ni_{1-y}Cu_yO_{4-\delta}$ layered oxides as candidate materials for MIEC-type ceramic membranes. <i>Journal of the European Ceramic Society</i> , 2020, 40, 4056-4066.	5.7	10
120	Co-free triple perovskite $La_{1.5}Ba_{1.5}Cu_3O_{7-\delta}$ as a promising air electrode material for solid oxide fuel cells. <i>Journal of Power Sources</i> , 2022, 532, 231371.	7.8	10
121	Possibility of modification of phosphoolivine by substitution in Li sublattice. <i>Solid State Ionics</i> , 2012, 225, 575-579.	2.7	9
122	Oxygen storage capability in Co- and Fe-containing perovskite-type oxides. <i>Solid State Ionics</i> , 2014, 257, 23-28.	2.7	9
123	Structure and transport properties of proton-conducting $Ba_{0.9}Ln_{0.1}Sn_{0.5}In_{0.5}O_{2.8}$ ($Ln = La, Gd$) oxides. <i>Solid State Ionics</i> , 2017, 307, 44-50.	2.7	9
124	Effective oxygen reduction on A-site substituted $LaCuO_{3-\delta}$: toward air electrodes for SOFCs based on perovskite-type copper oxides. <i>Journal of Materials Chemistry A</i> , 2019, 7, 27403-27416.	10.3	9
125	Indium doping in $SrCeO_3$ proton-conducting perovskites. <i>Journal of Solid State Chemistry</i> , 2020, 284, 121210.	2.9	9
126	Defect chemistry and proton uptake of $La_{2-x}Sr_xNiO_{4-\delta}$ and $La_{2-x}Ba_xNiO_{4-\delta}$ Ruddlesden-Popper phases. <i>Journal of Solid State Chemistry</i> , 2022, 306, 122731.	2.9	9

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127	Optimization of Transport Properties of A-Site Ordered $\text{LnBa}_{1-x}\text{Sr}_x\text{Co}_{2-y}\text{Fe}_y\text{O}_{5+\delta}$ Perovskite-Type Cathode Materials. ECS Transactions, 2013, 57, 1993-2001.	0.5	8
128	Electrochemical properties of chemically modified phosphoolivines as cathode materials for Li-ion batteries. Journal of Power Sources, 2013, 244, 565-569.	7.8	8
129	Hydrogen desorption properties of magnesium hydride catalyzed multiply with carbon and silicon. Journal of Alloys and Compounds, 2015, 645, S80-S83.	5.5	8
130	Influence of Grain Size on Gas Sensing Properties of TiO_2 Nanopowders. Procedia Engineering, 2012, 47, 1057-1060.	1.2	7
131	Correlation between crystal and transport properties in $\text{LnBa}_{0.5}\text{Sr}_{0.5}\text{Co}_{1.5}\text{Fe}_{0.5}\text{O}_{5+\delta}$ (Ln - selected) T_j ETQq1 1 0.784314 rgBT /Overlo	2.7	7
132	Chemical diffusion and surface exchange in selected LnBaCoFe perovskite-type oxides. Journal of Alloys and Compounds, 2015, 645, S357-S360.	5.5	7
133	Correlation between transport properties and lithium extraction/insertion mechanism in Fe-site substituted phosphoolivine. Solid State Ionics, 2016, 288, 184-192.	2.7	7
134	A- and B-site doping effect on physicochemical properties of $\text{Sr}_{2-x}\text{Ba}_x\text{MMoO}_6$ (M = Mg, Mn, Fe) double perovskites candidate anode materials for SOFCs. Functional Materials Letters, 2016, 09, 1641002.	1.2	7
135	Electrical transport in low-lead $(1-x)\text{BaTiO}_3-x\text{PbMg}_{1/3}\text{Nb}_{2/3}\text{O}_3$ ceramics. Journal of Advanced Ceramics, 2017, 6, 207-219.	17.4	7
136	High Cu content $\text{LaNi}_{1-x}\text{Cu}_x\text{O}_{3-\delta}$ perovskites as candidate air electrode materials for Reversible Solid Oxide Cells. International Journal of Hydrogen Energy, 2020, 45, 29449-29464.	7.1	7
137	INFLUENCE OF ALUMINUM ON PHYSICO-CHEMICAL PROPERTIES OF LITHIUM IRON PHOSPHATE. Functional Materials Letters, 2011, 04, 123-127.	1.2	6
138	HREM observation and high-pressure composition isotherm measurement of $\text{Ti}_{45}\text{Zr}_{38}\text{Ni}_{17}$ quasicrystal powders synthesized by mechanical alloying. Journal of Alloys and Compounds, 2015, 645, S292-S294.	5.5	6
139	Possibility of determination of transport coefficients D and k from relaxation experiments for sphere-shaped powder samples. Solid State Ionics, 2018, 323, 157-165.	2.7	6
140	Development of novel air electrode materials for the SOFC and SOEC technologies. E3S Web of Conferences, 2019, 108, 01019.	0.5	6
141	Antimony substituted lanthanum orthoniobate proton conductor Structure and electronic properties. Journal of the American Ceramic Society, 2020, 103, 6575-6585.	3.8	6
142	Towards efficient oxygen separation from air: Influence of the mean rare-earth radius on thermodynamics and kinetics of reactivity with oxygen in hexagonal $\text{Y}_{1-x}\text{R}_x\text{MnO}_3$. Acta Materialia, 2021, 205, 116544.	7.9	6
143	Coking Study in Anode Materials for SOFCs: Physicochemical Properties and Behavior of Mo-Containing Perovskites in CO and CH_4 Fuels. ECS Transactions, 2014, 64, 103-116.	0.5	5
144	Photosensitization of TiO_2 P25 with CdS Nanoparticles for Photocatalytic Applications. Archives of Metallurgy and Materials, 2017, 62, 841-849.	0.6	5

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145	Structural transformations, water incorporation and transport properties of tin-substituted barium indate. <i>Journal of Solid State Chemistry</i> , 2018, 262, 58-67.	2.9	5
146	Crystal Structure, Hydration, and Two-Fold/Single-Fold Diffusion Kinetics in Proton-Conducting Ba _{0.9} La _{0.1} Zr _{0.25} Sn _{0.25} In _{0.5} O ₃ · <i>a</i> Oxide. <i>Crystals</i> , 2018, 8, 136.	2.2	5
147	ReBaCo _{2-x} Mn _x O _{5+\hat{f}} (Re: rare earth element) layered perovskites for application as cathodes in Solid Oxide Fuel Cells. <i>E3S Web of Conferences</i> , 2019, 108, 01020.	0.5	5
148	SrCe _{0.9} In _{0.1} O _{3-\hat{f}} -based reversible symmetrical Protonic Ceramic Cell. <i>Materials Research Bulletin</i> , 2021, 135, 111154.	5.2	5
149	Influence of Doping on the Transport Properties of Y _{1-x} Ln _x MnO _{3+\hat{f}} (Ln: Pr, Nd). <i>Crystals</i> , 2021, 11, 510.	2.2	5
150	Boosting CO ₂ reforming of methane via the metal-support interaction in mesostructured SBA-16-derived Ni nanoparticles. <i>Applied Materials Today</i> , 2022, 26, 101354.	4.3	5
151	Optimization of proton conductors for application in solid oxide fuel cell technology. <i>E3S Web of Conferences</i> , 2017, 14, 01044.	0.5	4
152	Impact of the synthesis parameters on the microstructure of nano-structured LTO prepared by glycothermal routes and ⁷ Li NMR structural investigations. <i>Journal of Sol-Gel Science and Technology</i> , 2019, 89, 225-233.	2.4	4
153	Peculiar Properties of Electrochemically Oxidized SmBaCo _{2-x} Mn _x O _{5+\hat{f}} (x = 0; 0.5 and 1) A-Site Ordered Perovskites. <i>Crystals</i> , 2020, 10, 205.	2.2	4
154	Modification of Ruddlesden-Popper-type Nd _{2-x} Ni _{0.75} Cu _{0.2} M _{0.05} O _{4±\hat{f}} by the Nd-site cationic deficiency and doping with Sc, Ga or In: Crystal structure, oxygen content, transport properties and oxygen permeability. <i>Journal of Solid State Chemistry</i> , 2021, 296, 121982.	2.9	4
155	Improvement of silicon-based electrode for Li-ion batteries by formation of Si-TiB ₂ -C nanocomposites. <i>Solid State Ionics</i> , 2015, 281, 60-67.	2.7	3
156	The effects of PbZn _{1/3} Nb _{2/3} O ₃ -doping on structural, thermal, optical, dielectric, and ferroelectric properties of BaTiO ₃ ceramics. <i>Journal of Applied Physics</i> , 2017, 122, 124105.	2.5	3
157	Lithium-ion Batteries: Carbon sheathed MoS ₂ Nanothorns Epitaxially Grown on CNTs: Electrochemical Application for Highly Stable and Ultrafast Lithium Storage (<i>Adv. Energy Mater.</i>) Tj ETQq1 1 0.7843145rgBT /@overlock		
158	MIEC-type ceramic membranes for the oxygen separation technology. <i>E3S Web of Conferences</i> , 2019, 108, 01021.	0.5	3
159	Evaluation of applicability of Nd- and Sm-substituted Y _{1-x} R _x MnO _{3+\hat{f}} in temperature swing absorption for energy-related technologies. <i>Energy</i> , 2022, 239, 122429.	8.8	3
160	Structural and Transport Properties of La _{1-x} Sr _x Co _{1-y} Fe _y Ni _z O _{3+\hat{f}} Perovskites. <i>Defect and Diffusion Forum</i> , 2005, 237-240, 1293-1298.	0.4	2
161	Lithium Diffusion in LiMn _y Fe _{1-y} PO ₄ Cathode Material. <i>Defect and Diffusion Forum</i> , 2005, 237-240, 1299-1305.	0.4	2
162	Structural properties and presence of protons in Ba _{0.9} Gd _{0.1} Zr _{1-x} Sn _x O ₃ ·(y~0.1) ² perovskites. <i>Functional Materials Letters</i> , 2016, 09, 1641005.	1.2	2

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163	Insight into physicochemical properties of Nd ₂ CuO ₄ ± δ and the A-site cation deficient Nd _{1.9} CuO ₄ ± δ layered oxides. Functional Materials Letters, 2020, 13, 2051034.	1.2	2
164	Transport and Electrochemical Properties of Li _y Ni _x Mn _{2-x} O ₄ (0.1 \leq x \leq 0.5) Cathode Materials. Defect and Diffusion Forum, 2005, 242-244, 65-76.	0.4	1
165	Operando XRD studies as a tool for determination of transport parameters of mobile ions in electrode materials. Journal of Power Sources, 2017, 369, 1-5.	7.8	1
166	Strategies for Perspective Cathode Materials for IT \rightarrow SOFC. Green Energy and Technology, 2013, , 47-69.	0.6	0
167	Efficient and Economically Favorable Co-Free Air Electrodes for Solid Oxide Cells. ECS Transactions, 2021, 103, 1497-1504.	0.5	0