Magali Aurelie Marie Gauthier

List of Publications by Year
in descending order

25 papers	1,873 citations	567144 15 h-index	642610 23 g-index
25 all docs	25 docs citations	25 times ranked	3216 citing authors

#	Article	IF	Citations
1	Electrodeâ€“Electrolyte Interface in Li-Ion Batteries: Current Understanding and New Insights. Journal of Physical Chemistry Letters, 2015, 6, 4653-4672.	2.1	811
2	A low-cost and high performance ball-milled Si-based negative electrode for high-energy Li-ion batteries. Energy and Environmental Science, 2013, 6, 2145.	15.6	274
3	Coupled LiPF₆ Decomposition and Carbonate Dehydrogenation Enhanced by Highly Covalent Metal Oxides in High-Energy Li-Ion Batteries. Journal of Physical Chemistry C, 2018, 122, 27368-27382.	1.5	127
4	New insights into the silicon-based electrode's irreversibility along cycle life through simple gravimetric method. Journal of Power Sources, 2012, 220, 180-184.	4.0	93
5	An electrochemically roughened Cu current collector for Si-based electrode in Li-ion batteries. Journal of Power Sources, 2013, 239, 308-314.	4.0	78
6	Magnesium batteries: Current picture and missing pieces of the puzzle. Journal of Power Sources, 2020, 478, 229027.	4.0	70
7	Very High Surface Capacity Observed Using Si Negative Electrodes Embedded in Copper Foam as 3D Current Collectors. Advanced Energy Materials, 2014, 4, 1301718.	10.2	64
8	Evaluation and Stability of PEDOT Polymer Electrodes for Liâ€“O₂ Batteries. Journal of Physical Chemistry Letters, 2016, 7, 3770-3775.	2.1	49
9	Synthesis of boron-doped Si particles by ball milling and application in Li-ion batteries. Journal of Power Sources, 2012, 202, 262-268.	4.0	48
10	Revealing Electronic Signatures of Lattice Oxygen Redox in Lithium Ruthenates and Implications for High-Energy Li-Ion Battery Material Designs. Chemistry of Materials, 2019, 31, 7864-7876.	3.2	47
11	Probing Surface Chemistry Changes Using LiCoO₂-only Electrodes in Li-Ion Batteries. Journal of the Electrochemical Society, 2018, 165, A1377-A1387.	1.3	46
12	One-Electron Mechanism in a Gelâ€“Polymer Electrolyte Liâ€“O₂ Battery. Chemistry of Materials, 2016, 28, 7167-7177.	3.2	40
13	From Si wafers to cheap and efficient Si electrodes for Li-ion batteries. Journal of Power Sources, 2014, 256, 32-36.	4.0	34
14	Nanoscale compositional changes during first delithiation of Si negative electrodes. Journal of Power Sources, 2013, 227, 237-242.	4.0	25
15	Unexpected Behavior of the InSb Alloy in Mg-Ion Batteries: Unlocking the Reversibility of Sb. Journal of Physical Chemistry C, 2019, 123, 1120-1126.	1.5	21
16	Electrochemical reactivity of In-Pb solid solution as a negative electrode for rechargeable Mg-ion batteries. Journal of Energy Chemistry, 2021, 55, 124-128.	7.1	12
17	Operando NMR characterization of a metal-air battery using a double-compartment cell design. Solid State Nuclear Magnetic Resonance, 2021, 113, 101731.	1.5	8
18	Nanostructured intermetallic InSb as a high-capacity and high-performance negative electrode for sodium-ion batteries. Sustainable Energy and Fuels, 2021, 5, 3825-3835.	2.5	6

#	Article	IF	Citations
19	Operando analysis of lithium profiles in Li-ion batteries using nuclear microanalysis. Journal of Power Sources, 2018, 393, 37-42.	4.0	5
20	Reactivity with Water and Bulk Ruthenium Redox of Lithium Ruthenate in Basic Solutions. Advanced Functional Materials, 2021, 31, 2002249.	7.8	5
21	Are Operando Measurements of Rechargeable Batteries Always Reliable? An Example of Beam Effect with a Mg Battery. Analytical Chemistry, 2022, 94, 9683-9689.	3.2	5
22	MIL-53 Metalâ€“Organic Framework as a Flexible Cathode for Lithium-Oxygen Batteries. Materials, 2021, 14, 4618.	1.3	3
23	Influence of Electrolyte on the Electrode/Electrolyte Interface Formation on InSb Electrode in Mg-Ion Batteries. Molecules, 2021, 26, 5721.	1.7	2
24	Phase Transformation and Amorphization upon Alloys Magnesiation: Combining Operando X-Ray Diffraction and X-Ray Absorption Spectroscopy. ECS Meeting Abstracts, 2020, MA2020-01, 194-194.	0.0	0
25	Phase Transformation and Amorphization upon Alloys Magnesiation: Combining Operando X-Ray Diffraction and X-Ray Absorption Spectroscopy. ECS Meeting Abstracts, 2020, MA2020-02, 181-181.	0.0	0