

Francesco Nobili

List of Publications by Year in descending order

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76
papers

2,652
citations

147801

31
h-index

197818

49
g-index

79
all docs

79
docs citations

79
times ranked

3195
citing authors

| # | ARTICLE | IF | CITATIONS |
|----|--|------|-----------|
| 1 | Electronic and Electrochemical Properties of $\text{Li}_x\text{Ni}_{1-y}\text{Co}_y\text{O}_2$ Cathodes Studied by Impedance Spectroscopy. <i>Chemistry of Materials</i> , 2001, 13, 1642-1646. | 6.7 | 167 |
| 2 | An electrochemical impedance spectroscopic study of the transport properties of $\text{LiNi}_{0.75}\text{Co}_{0.25}\text{O}_2$. <i>Electrochemistry Communications</i> , 1999, 1, 605-608. | 4.7 | 113 |
| 3 | Cerium(III) Chloride, a Novel Reagent for Nonaqueous Selective Conversion of Dioxolanes to Carbonyl Compounds. <i>Journal of Organic Chemistry</i> , 1997, 62, 4183-4184. | 3.2 | 111 |
| 4 | Graphene/silicon nanocomposite anode with enhanced electrochemical stability for lithium-ion battery applications. <i>Journal of Power Sources</i> , 2014, 269, 873-882. | 7.8 | 106 |
| 5 | Low-temperature behavior of graphite-tin composite anodes for Li-ion batteries. <i>Journal of Power Sources</i> , 2010, 195, 7090-7097. | 7.8 | 102 |
| 6 | High performance, environmentally friendly and low cost anodes for lithium-ion battery based on TiO_2 anatase and water soluble binder carboxymethyl cellulose. <i>Journal of Power Sources</i> , 2011, 196, 9665-9671. | 7.8 | 95 |
| 7 | An AC Impedance Spectroscopic Study of Li_xCoO_2 at Different Temperatures. <i>Journal of Physical Chemistry B</i> , 2002, 106, 3909-3915. | 2.6 | 86 |
| 8 | High-performance Sn@carbon nanocomposite anode for lithium batteries. <i>Journal of Power Sources</i> , 2013, 226, 241-248. | 7.8 | 83 |
| 9 | Lithium intercalation and interfacial kinetics of composite anodes formed by oxidized graphite and copper. <i>Journal of Power Sources</i> , 2009, 190, 141-148. | 7.8 | 74 |
| 10 | V_2O_5 Aerogel as a Versatile Cathode Material for Lithium and Sodium Batteries. <i>ChemElectroChem</i> , 2015, 2, 529-537. | 3.4 | 74 |
| 11 | Is the Solid Electrolyte Interphase an Extra-Charge Reservoir in Li-Ion Batteries?. <i>ACS Applied Materials & Interfaces</i> , 2017, 9, 4570-4576. | 8.0 | 74 |
| 12 | An ac impedance spectroscopic study of Mg-doped LiCoO_2 at different temperatures: electronic and ionic transport properties. <i>Electrochimica Acta</i> , 2005, 50, 2307-2313. | 5.2 | 71 |
| 13 | Sol-gel synthesis and electrochemical characterization of Mg-Zr-doped LiCoO_2 cathodes for Li-ion batteries. <i>Journal of Power Sources</i> , 2012, 197, 276-284. | 7.8 | 70 |
| 14 | An electrochemical ac impedance study of $\text{Li}_x\text{Ni}_{0.75}\text{Co}_{0.25}\text{O}_2$ intercalation electrode. <i>Journal of Power Sources</i> , 2001, 94, 238-241. | 7.8 | 58 |
| 15 | Unraveling the role of Ti in the stability of positive layered oxide electrodes for rechargeable Na-ion batteries. <i>Journal of Materials Chemistry A</i> , 2019, 7, 14169-14179. | 10.3 | 55 |
| 16 | Metal-oxidized graphite composite electrodes for lithium-ion batteries. <i>Electrochimica Acta</i> , 2005, 51, 536-544. | 5.2 | 54 |
| 17 | High-stability graphene nano sheets/ SnO_2 composite anode for lithium ion batteries. <i>Electrochimica Acta</i> , 2014, 137, 228-234. | 5.2 | 51 |
| 18 | High-performance Sn@carbon nanocomposite anode for lithium-ion batteries: Lithium storage processes characterization and low-temperature behavior. <i>Electrochimica Acta</i> , 2013, 107, 85-92. | 5.2 | 49 |

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|----|---|------|-----------|
| 19 | Correlation of Ac-Impedance and In Situ X-ray Spectra of LiCoO ₂ . Journal of Physical Chemistry B, 2006, 110, 11310-11313. | 2.6 | 46 |
| 20 | Electrochemical investigation of polarization phenomena and intercalation kinetics of oxidized graphite electrodes coated with evaporated metal layers. Journal of Power Sources, 2008, 180, 845-851. | 7.8 | 46 |
| 21 | SEI Dynamics in Metal Oxide Conversion Electrodes of Li-Ion Batteries. Journal of Physical Chemistry C, 2017, 121, 26379-26388. | 3.1 | 45 |
| 22 | Counteraction intercalation and kinetics of charge transport during redox reactions of nickel hexacyanoferrate. Electrochimica Acta, 2004, 49, 4253-4258. | 5.2 | 44 |
| 23 | Nanostructured tin-carbon/ LiNi _{0.5} Mn _{1.5} O ₄ lithium-ion battery operating at low temperature. Journal of Power Sources, 2015, 275, 227-233. | 7.8 | 42 |
| 24 | Direct observation of electronic conductivity transitions and solid electrolyte interphase stability of Na ₂ Ti ₃ O ₇ electrodes for Na-ion batteries. Journal of Power Sources, 2016, 330, 78-83. | 7.8 | 42 |
| 25 | Electrochemical characterisation of electrodes modified with a Co/Al hydrotalcite-like compound. Electrochimica Acta, 2005, 50, 3305-3311. | 5.2 | 39 |
| 26 | Enhanced stability of SnSb/graphene anode through alternative binder and electrolyte additive for lithium ion batteries application. Journal of Power Sources, 2015, 294, 248-253. | 7.8 | 38 |
| 27 | Study of the electrochemical behavior at low temperatures of green anodes for Lithium ion batteries prepared with anatase TiO ₂ and water soluble sodium carboxymethyl cellulose binder. Electrochimica Acta, 2012, 85, 566-571. | 5.2 | 37 |
| 28 | Improved low-temperature electrochemical performance of Li ₄ Ti ₅ O ₁₂ composite anodes for Li-ion batteries. Electrochimica Acta, 2013, 109, 207-213. | 5.2 | 36 |
| 29 | SEI Growth and Depth Profiling on ZFO Electrodes by Soft X-ray Absorption Spectroscopy. Advanced Energy Materials, 2015, 5, 1500642. | 19.5 | 34 |
| 30 | High cycling stability of anodes for lithium-ion batteries based on Fe ₃ O ₄ nanoparticles and poly(acrylic acid) binder. Journal of Power Sources, 2016, 332, 79-87. | 7.8 | 33 |
| 31 | A newly designed Cu/Super-P composite for the improvement of low-temperature performances of graphite anodes for lithium-ion batteries. Journal of Power Sources, 2013, 222, 66-71. | 7.8 | 32 |
| 32 | Scaling up "Nano"Li ₄ Ti ₅ O ₁₂ for High-Power Lithium-Ion Anodes Using Large Scale Flame Spray Pyrolysis. Journal of the Electrochemical Society, 2015, 162, A2331-A2338. | 2.9 | 32 |
| 33 | AC impedance study of a synthetic hydrotalcite-like compound modified electrode in aqueous solution. Electrochimica Acta, 2003, 48, 1347-1355. | 5.2 | 30 |
| 34 | Time/Space-Resolved Studies of the Nafion Membrane Hydration Profile in a Running Fuel Cell. Advanced Materials, 2009, 21, 578-583. | 21.0 | 29 |
| 35 | Tin-coated graphite electrodes as composite anodes for Li-ion batteries. Effects of tin coatings thickness toward intercalation behavior. Journal of Power Sources, 2012, 198, 243-250. | 7.8 | 28 |
| 36 | Binder-induced surface structure evolution effects on Li-ion battery performance. Applied Surface Science, 2018, 435, 1029-1036. | 6.1 | 28 |

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|----|--|-----|-----------|
| 37 | Synthesis and electrochemical characterization of high rate capability $\text{Li}_3\text{V}_2(\text{PO}_4)_3/\text{C}$ prepared by using poly(acrylic acid) and d-(+)-glucose as carbon sources. <i>Journal of Power Sources</i> , 2015, 275, 792-798. | 7.8 | 27 |
| 38 | Sustainable Anodes for Lithium- and Sodium-Ion Batteries Based on Coffee Ground-Derived Hard Carbon and Green Binders. <i>Energies</i> , 2020, 13, 6216. | 3.1 | 27 |
| 39 | Microwave-assisted synthesis of carbon (Super-P) supported copper nanoparticles as conductive agent for $\text{Li}_4\text{Ti}_5\text{O}_{12}$ anodes for Lithium-ion batteries. <i>Electrochimica Acta</i> , 2013, 89, 555-560. | 5.2 | 22 |
| 40 | Electrochemical and spectroscopic characterization of an alumina-coated LiMn_2O_4 cathode with enhanced interfacial stability. <i>Electrochimica Acta</i> , 2017, 258, 175-181. | 5.2 | 22 |
| 41 | Interfacial Properties of Copper-coated Graphite Electrodes: Coating Thickness Dependence. <i>Fuel Cells</i> , 2009, 9, 264-268. | 2.4 | 21 |
| 42 | Structural and Electrochemical Characterization of Vanadium-Doped LiFePO_4 Cathodes for Lithium-Ion Batteries. <i>Journal of the Electrochemical Society</i> , 2013, 160, A940-A949. | 2.9 | 20 |
| 43 | Local Structure and Stability of SEI in Graphite and ZFO Electrodes Probed by As K-Edge Absorption Spectroscopy. <i>Journal of Physical Chemistry C</i> , 2016, 120, 4287-4295. | 3.1 | 20 |
| 44 | Electrochemical Response and Structural Stability of the Li^{+} Ion Battery Cathode with Coated LiMn_2O_4 Nanoparticles. <i>ACS Applied Energy Materials</i> , 2020, 3, 8356-8365. | 5.1 | 18 |
| 45 | Structural study of LiFePO_4 - LiNiPO_4 solid solutions. <i>Journal of Power Sources</i> , 2012, 213, 287-295. | 7.8 | 17 |
| 46 | Graphene/ V_2O_5 Cryogel Composite As a High-Energy Cathode Material For Lithium-Ion Batteries. <i>ChemElectroChem</i> , 2017, 4, 613-619. | 3.4 | 17 |
| 47 | Influence of Using Metallic Na on the Interfacial and Transport Properties of Na-Ion Batteries. <i>Batteries</i> , 2017, 3, 16. | 4.5 | 17 |
| 48 | Synthesis and characterization of Si nanoparticles wrapped by V_2O_5 nanosheets as a composite anode material for lithium-ion batteries. <i>Electrochimica Acta</i> , 2018, 281, 676-683. | 5.2 | 16 |
| 49 | Does Alumina Coating Alter the Solid Permeable Interphase Dynamics in LiMn_2O_4 Cathodes?. <i>Journal of Physical Chemistry C</i> , 2020, 124, 26670-26677. | 3.1 | 15 |
| 50 | Structural and Interfacial Characterization of a Sustainable Si/Hard Carbon Composite Anode for Lithium-Ion Batteries. <i>ACS Applied Materials & Interfaces</i> , 2022, 14, 33257-33273. | 8.0 | 15 |
| 51 | Electrochemical behavior of superdense LiC_2 prepared by ball-milling. <i>Electrochimica Acta</i> , 2003, 48, 1419-1424. | 5.2 | 14 |
| 52 | Synthesis and characterization of Zn-doped LiFePO_4 cathode materials for Li-ion battery. <i>Materials Chemistry and Physics</i> , 2015, 155, 191-204. | 4.0 | 14 |
| 53 | Rotating disk electrode study of Pt/Cs ₃ HPMo ₁₁ VO ₄₀ composite catalysts for performing and durable PEM fuel cells. <i>International Journal of Hydrogen Energy</i> , 2016, 41, 11163-11173. | 7.1 | 14 |
| 54 | An innovative membrane-electrode assembly for efficient and durable polymer electrolyte membrane fuel cell operations. <i>International Journal of Hydrogen Energy</i> , 2017, 42, 16686-16694. | 7.1 | 14 |

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|----|--|-----|-----------|
| 55 | Anatase TiO ₂ as a Cheap and Sustainable Buffering Filler for Silicon Nanoparticles in Lithium-Ion Battery Anodes. <i>ChemSusChem</i> , 2017, 10, 4771-4777. | 6.8 | 14 |
| 56 | An extensive model for renewable energy electrochemical storage with Solid Oxide Cells based on a comprehensive analysis of impedance deconvolution. <i>Journal of Energy Storage</i> , 2021, 33, 102052. | 8.1 | 13 |
| 57 | Synthesis and Characterization of Vanillin-Templated Fe ₂ O ₃ Nanoparticles as a Sustainable Anode Material for Li-Ion Batteries. <i>ChemElectroChem</i> , 2019, 6, 1915-1920. | 3.4 | 12 |
| 58 | Role of the voltage window on the capacity retention of P2-Na ₂ /3[Fe1/2Mn1/2]O ₂ cathode material for rechargeable sodium-ion batteries. <i>Communications Chemistry</i> , 2022, 5, . | 4.5 | 12 |
| 59 | Early-Stage Detection of Solid Oxide Cells Anode Degradation by Operando Impedance Analysis. <i>Processes</i> , 2021, 9, 848. | 2.8 | 11 |
| 60 | Fe ₃ O ₄ /Graphene Composite Anode Material for Fast-Charging Li-Ion Batteries. <i>Molecules</i> , 2021, 26, 4316. | 3.8 | 11 |
| 61 | Tin-Decorated Reduced Graphene Oxide and NaLi _{0.2} Ni _{0.25} Mn _{0.75} O ₂ as Electrode Materials for Sodium-Ion Batteries. <i>Materials</i> , 2019, 12, 1074. | 2.9 | 10 |
| 62 | V ₂ O ₅ electrodes with extended cycling ability and improved rate performance using polyacrylic acid as binder. <i>Journal of Power Sources</i> , 2015, 293, 1068-1072. | 7.8 | 9 |
| 63 | A lithium-ion battery based on LiFePO ₄ and silicon/reduced graphene oxide nanocomposite. <i>Solid State Ionics</i> , 2015, 283, 145-151. | 2.7 | 9 |
| 64 | Low platinum loading cathode modified with Cs ₃ H ₂ PMo ₁₀ V ₂ O ₄₀ for polymer electrolyte membrane fuel cells. <i>Journal of Power Sources</i> , 2016, 327, 11-20. | 7.8 | 9 |
| 65 | Development of Non-Fluorinated Cathodes Based on Li ₃ V _{1.95} Ni _{0.05} (PO ₄) ₃ /C with Prolonged Cycle Life: A Comparison among Na-Alginate, Na-Carboxymethyl Cellulose and Poly(acrylic acid) Binders. <i>Journal of the Electrochemical Society</i> , 2017, 164, A672-A683. | 2.9 | 9 |
| 66 | Improvement of structural and electrochemical properties of NMC layered cathode material by combined doping and coating. <i>Electrochimica Acta</i> , 2022, 404, 139577. | 5.2 | 9 |
| 67 | Preparation and Electrochemical Characterization of High-Stability MnO Anodes for Li-Ion Batteries. <i>Electrochimica Acta</i> , 2017, 247, 392-399. | 5.2 | 8 |
| 68 | A high-voltage lithium-ion battery prepared using a Sn-decorated reduced graphene oxide anode and a LiNi _{0.5} Mn _{1.5} O ₄ cathode. <i>Ionics</i> , 2016, 22, 515-528. | 2.4 | 7 |
| 69 | Fast File Transfers from IoT Devices by Using Multiple Interfaces. <i>Sensors</i> , 2021, 21, 36. | 3.8 | 5 |
| 70 | Simple Synthesis of Fe ₃ O ₄ @-Activated Carbon from Wastepaper for Dispersive Magnetic Solid-Phase Extraction of Non-Steroidal Anti-Inflammatory Drugs and Their UHPLC-MS/MS Determination in Human Plasma. <i>Fibers</i> , 2022, 10, 58. | 4.0 | 5 |
| 71 | Activation of bimetallic PtFe nanoparticles with zeolite-type cesium salts of vanadium-substituted polyoxometallates toward electroreduction of oxygen at low Pt loadings for fuel cells. <i>Journal of Solid State Electrochemistry</i> , 2022, 26, 3-16. | 2.5 | 4 |
| 72 | Operando Analysis of Losses in Commercial-Sized Solid Oxide Cells: Methodology Development and Validation. <i>Energies</i> , 2022, 15, 4978. | 3.1 | 3 |

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|----|---|-----|-----------|
| 73 | Energy Dispersive X-ray Diffraction Applied to Laboratory Investigation on Proton Exchange Membrane Water Content in Working Fuel Cells. <i>Fuel Cells</i> , 2012, 12, 800-808. | 2.4 | 2 |
| 74 | Fe local structure in Pt-free nitrogen-modified carbon based electrocatalysts: XAFS study. <i>Journal of Physics: Conference Series</i> , 2016, 712, 012131. | 0.4 | 2 |
| 75 | V ₂ O ₅ Cryogel: A Versatile Electrode for All Solid State Lithium Batteries. <i>Journal of the Electrochemical Society</i> , 2019, 166, A3927-A3931. | 2.9 | 2 |
| 76 | Foreword to the memorial issue for Professor Roberto Marassi. <i>Journal of Solid State Electrochemistry</i> , 2022, 26, 1-2. | 2.5 | 2 |