Dev Chidambaram

List of Publications by Year
in descending order

50	867	471061 17	500791 28
papers	citations	h-index	g-index

54	54	54	1245
all docs	docs citations	times ranked	citing authors

#	Article	IF	Citations
1	Engineering of bio-hybrid materials by electrospinning polymer-microbe fibers. Proceedings of the National Academy of Sciences of the United States of America, 2009, 106, 14201-14206.	3.3	88
2	Concomitant Microbial Generation of Palladium Nanoparticles and Hydrogen To Immobilize Chromate. Environmental Science & Technology, 2010, 44, 7635-7640.	4.6	82
3	Oxidation of stainless steel 316 and Nitronic 50 in supercritical and ultrasupercritical water. Applied Surface Science, 2015, 347, 10-16.	3.1	45
4	Surface chemistry and corrosion behavior of Inconel 625 and 718 in subcritical, supercritical, and ultrasupercritical water. Applied Surface Science, 2017, 404, 443-451.	3.1	41
5	Enhanced Performance of Î²-Bi₂O₃by In-Situ Photo-Conversion to Bi₂O₃-BiO_{2-x}Composite Photoanode for Solar Water Splitting. Journal of the Electrochemical Society, 2016, 163, H546-H558.	1.3	40
6	On the oxidation of stainless steel alloy 304 in subcritical and supercritical water. Journal of Nuclear Materials, 2014, 452, 440-445.	1.3	38
7	Conversion of a variety of high free fatty acid containing feedstock to biodiesel using solid acid supported catalyst. Journal of Cleaner Production, 2015, 104, 273-281.	4.6	34
8	Solid-acid catalyzed biodiesel production, part I: biodiesel synthesis from low quality feedstock. Journal of Cleaner Production, 2017, 142, 4169-4177.	4.6	33
9	Reviewâ€"Metallic Lithium and the Reduction of Actinide Oxides. Journal of the Electrochemical Society, 2017, 164, H5236-H5246.	1.3	33
10	Virus Removal by Biogenic Cerium. Environmental Science & Technology, 2010, 44, 6350-6356.	4.6	30
11	Photoelectric performance of TiO2 nanotube array photoelectrodes sensitized with CdS0.54Se0.46 quantum dots. Applied Surface Science, 2015, 355, 1279-1288.	3.1	30
12	Presence of Li Clusters in Molten LiCl-Li. Scientific Reports, 2016, 6, 25435.	1.6	26
13	Corrosion Behavior of Structural Materials for Potential Use in Nitrate Salts Based Solar Thermal Power Plants. Journal of the Electrochemical Society, 2017, 164, H5357-H5363.	1.3	25
14	Effect of heat treatment conditions on the passivation behavior of WE43C Mgâ€"Yâ€"Nd alloy in chloride containing alkaline environments. Journal of Magnesium and Alloys, 2017, 5, 147-165.	5.5	24
15	Application of ZnxCd1â^'xSe-sensitized TiO2 nanotube arrays as photoanodes for solar cells. Journal of Materials Chemistry A, 2014, 2, 10116.	5.2	22
16	Microbial synthesis of metallic molybdenum nanoparticles. Chemosphere, 2018, 203, 521-525.	4.2	20
17	Anodic Titania Nanotube Arrays Sensitized with Mn- or Co-Doped CdS Nanocrystals. Electrochimica Acta, 2014, 135, 503-512.	2.6	18
18	Enhanced Photoelectrochemical Performance of Anodic Nanoporous Î²-Bi₂O₃. Journal of the Electrochemical Society, 2015, 162, H380-H391.	1.3	18

#	Article	IF	Citations
19	Alternate Anodes for the Electrolytic Reduction of UO2. Metallurgical and Materials Transactions A: Physical Metallurgy and Materials Science, 2015, 46, 536-544.	1.1	17
20	Ni-Ci oxygen evolution catalyst integrated BiVO₄ photoanodes for solar induced water oxidation. RSC Advances, 2015, 5, 47080-47089.	1.7	15
21	The effect of Li0 on the corrosion of stainless steel alloy 316L exposed to molten LiCl-Li2O-Li. Corrosion Science, 2017, 126, 1-9.	3.0	15
22	Single step esterification of algae oil using mesoporous solid acid catalyst. Fuel, 2014, 117, 1093-1095.	3.4	13
23	Comparison of Performance and Oxidation of Nitronic-50 and Stainless Steel 316 in Subcritical and Supercritical Water Environments. Metallurgical and Materials Transactions A: Physical Metallurgy and Materials Science, 2016, 47, 2498-2508.	1.1	12
24	Photoelectrochemical generation of hydrogen and electricity from hydrazine hydrate using BiVO₄ electrodes. Physical Chemistry Chemical Physics, 2015, 17, 13851-13859.	1.3	11
25	Production of renewable aviation fuel range alkanes from algae oil. RSC Advances, 2016, 6, 14626-14634.	1.7	11
26	Molten salt reactors and electrochemical reprocessing: synthesis and chemical durability of potential waste forms for metal and salt waste streams. International Materials Reviews, 2021, 66, 339-363.	9.4	11
27	Corrosion of INCONEL Alloy 625 in Molten LiCl-Li₂O-Li. Nuclear Technology, 2016, 195, 204-212.	0.7	9
28	Corrosion of stainless steel 316L in molten LiCl-Li2O-Li. Journal of Nuclear Materials, 2019, 517, 241-253.	1.3	9
29	On the Corrosion Performance of Monel 400 in Molten LiCl-Li2O-Li at 923 K. Metallurgical and Materials Transactions A: Physical Metallurgy and Materials Science, 2018, 49, 2384-2392.	1.1	8
30	Effect of Metallic Li on the Corrosion Behavior of Inconel 625 in Molten LiCl-Li₂O-Li. Journal of the Electrochemical Society, 2019, 166, C162-C168.	1.3	8
31	Corrosion of Additively Manufactured CoCrFeMnNi High Entropy Alloy in Molten NaNO₃-KNO₃. Journal of the Electrochemical Society, 2020, 167, 081509.	1.3	8
32	Sensitization of TiO₂nanotube array photoelectrodes with Mn_xCd_ySe. RSC Advances, 2014, 4, 49729-49736.	1.7	7
33	Enhancing kinetics of biodiesel production using morpholine. Catalysis Communications, 2016, 83, 48-52.	1.6	7
34	Effect of quinone additives on the performance of electrolytes for vanadium redox flow Batteries. Journal of Applied Electrochemistry, 2017, 47, 1173-1178.	1.5	7
35	Use of Zymomonas mobilis immobilized in doped calcium alginate threads for ethanol production. Energy, 2018, 165, 603-609.	4.5	6
36	Sustainable batch production of biosynthesized nanoparticles. Materials Letters, 2017, 191, 53-56.	1.3	5

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37	Accelerated estimation of corrosion rate in supercritical and ultra-supercritical water. Npj Materials Degradation, 2017, 1, .	2.6	5
38	Esterification Kinetics of Phosphotungstic Acid Loaded KIT-5 Catalyzed Biodiesel Production. Industrial & Engineering Chemistry Research, 2018, 57, 14948-14956.	1.8	5
39	Use of electrospun threads in immobilized cell reactors for continuous ethanol production. Colloids and Surfaces B: Biointerfaces, 2019, 181, 989-993.	2.5	5
40	Corrosion in Molten Salts for Solar Thermal Power. Electrochemical Society Interface, 2021, 30, 63-66.	0.3	5
41	Photoelectrochemical Behavior of Nanoporous Oxide of FeNdB Alloy. Journal of the Electrochemical Society, 2015, 162, H220-H228.	1.3	3
42	The Influence of Dopants on the Effectiveness of Alginate Beads in Immobilized Cell Reactors. Applied Biochemistry and Biotechnology, 2016, 178, 1503-1509.	1.4	3
43	Effect of Metallic Li on the Surface Chemistry of Inconel 625 Exposed to Molten LiCl-Li₂O-Li. Journal of the Electrochemical Society, 2019, 166, C3193-C3199.	1.3	3
44	Communicationâ€"Design, Development, and Evaluation of a High Resolution, Customizable 3D-Printed Flow-Type Electrochemical Microcell. Journal of the Electrochemical Society, 2020, 167, 121501.	1.3	3
45	Effect of Anaerobic Microbial Corrosion on the Surface Film Formed on Steel. ECS Transactions, 2014, 58, 137-149.	0.3	2
46	Corrosion Behavior of High Nickel Alloys in Molten Nitrate Solar Salt. Journal of the Electrochemical Society, 2021, 168, 021502.	1.3	1
47	Oxidation of Alloy X in Subcritical, Transition, and Supercritical Water. Corrosion, 2022, 78, 25-31.	0.5	1
48	Assessment of thermodynamic stability of sapphire in eutectic molten chloride environment. Journal of the American Ceramic Society, 0, , .	1.9	1
49	Coordination and Thermophysical Properties of Select Trivalent Lanthanides in LiCl-KCl. Physical Chemistry Chemical Physics, 2022, , .	1.3	1
50	Catalytic Activity of Microbiallyâ€formed Palladium Nanoparticles. Electroanalysis, 2018, 30, 259-265.	1.5	0