

Arijit Sengupta

List of Publications by Year in descending order

Source: <https://exaly.com/author-pdf/1647443/publications.pdf>

Version: 2024-02-01

156
papers

3,787
citations

117453

34
h-index

182168

51
g-index

157
all docs

157
docs citations

157
times ranked

2522
citing authors

#	ARTICLE	IF	CITATIONS
1	Biosorption-a green method for the preconcentration of rare earth elements (REEs) from waste solutions: A review. <i>Journal of Molecular Liquids</i> , 2019, 274, 148-164.	2.3	125
2	Robust super-hydrophobic/super-oleophilic sandwich-like UIO-66-F4@rGO composites for efficient and multitasking oil/water separation applications. <i>Journal of Hazardous Materials</i> , 2020, 388, 121752.	6.5	115
3	Highly Efficient Diglycolamide-Based Task-Specific Ionic Liquids: Synthesis, Unusual Extraction Behaviour, Irradiation, and Fluorescence Studies. <i>Chemistry - A European Journal</i> , 2013, 19, 3230-3238.	1.7	113
4	Diglycolamide-Functionalized Calix[4]arenes Showing Unusual Complexation of Actinide Ions in Room Temperature Ionic Liquids: Role of Ligand Structure, Radiolytic Stability, Emission Spectroscopy, and Thermodynamic Studies. <i>Inorganic Chemistry</i> , 2013, 52, 2533-2541.	1.9	109
5	A highly efficient solvent system containing functionalized diglycolamides and an ionic liquid for americium recovery from radioactive wastes. <i>Dalton Transactions</i> , 2012, 41, 6970.	1.6	103
6	Extraction of Am(III) using novel solvent systems containing a tripodal diglycolamide ligand in room temperature ionic liquids: a "green" approach for radioactive waste processing. <i>RSC Advances</i> , 2012, 2, 7492.	1.7	98
7	Ultra-high oil-water separation membrane based on two-dimensional MXene(Ti3C2Tx) by co-incorporation of halloysite nanotubes and polydopamine. <i>Applied Clay Science</i> , 2021, 211, 106177.	2.6	81
8	Ditopic CMPO-pillar[5]arenes as unique receptors for efficient separation of americium(III) and europium(III). <i>Chemical Communications</i> , 2015, 51, 4263-4266.	2.2	80
9	Graphene-induced tuning of the d-spacing of graphene oxide composite nanofiltration membranes for frictionless capillary action-induced enhancement of water permeability. <i>Journal of Materials Chemistry A</i> , 2018, 6, 19445-19454.	5.2	79
10	Zwitterion augmented polyamide membrane for improved forward osmosis performance with significant antifouling characteristics. <i>Separation and Purification Technology</i> , 2019, 212, 316-325.	3.9	78
11	Biosorption-an alternative method for nuclear waste management: A critical review. <i>Journal of Environmental Chemical Engineering</i> , 2018, 6, 2159-2175.	3.3	76
12	A diglycolamide-functionalized task specific ionic liquid (TSIL) for actinide extraction: Solvent extraction, thermodynamics and radiolytic stability studies. <i>Separation and Purification Technology</i> , 2013, 118, 264-270.	3.9	67
13	Unique selectivity reversal in Am ³⁺ Eu ³⁺ extraction in a tripodal TREN-based diglycolamide in ionic liquid: extraction, luminescence, complexation and structural studies. <i>Dalton Transactions</i> , 2016, 45, 2476-2484.	1.6	61
14	Zwitterionic forward osmosis membrane modified by fast second interfacial polymerization with enhanced antifouling and antimicrobial properties for produced water pretreatment. <i>Desalination</i> , 2019, 469, 114090.	4.0	61
15	Construction of Fe ₃ O ₄ @MXene composite nanofiltration membrane for heavy metal ions removal from wastewater. <i>Polymers for Advanced Technologies</i> , 2021, 32, 1000-1010.	1.6	58
16	An amide functionalized task specific carbon nanotube for the sorption of tetra and hexa valent actinides: experimental and theoretical insight. <i>RSC Advances</i> , 2016, 6, 39553-39562.	1.7	54
17	Benzene-centered tripodal diglycolamides: synthesis, metal ion extraction, luminescence spectroscopy, and DFT studies. <i>Dalton Transactions</i> , 2017, 46, 1431-1438.	1.6	53
18	Concentrations of polyphenols from blueberry pomace extract using nanofiltration. <i>Food and Bioproducts Processing</i> , 2017, 106, 91-101.	1.8	53

#	ARTICLE	IF	CITATIONS
19	Tuning the interlayer spacing of forward osmosis membranes based on ultrathin graphene oxide to achieve desired performance. <i>Carbon</i> , 2019, 142, 337-345.	5.4	53
20	Extraction of radiostrontium from nuclear waste solution using crown ethers in room temperature ionic liquids. <i>Supramolecular Chemistry</i> , 2012, 24, 771-778.	1.5	52
21	Highly efficient extraction of actinides with pillar[5]arene-derived diglycolamides in ionic liquids via a unique mechanism involving competitive host-guest interactions. <i>Dalton Transactions</i> , 2016, 45, 19299-19310.	1.6	49
22	MWCNTs based sorbents for nuclear waste management: A review. <i>Journal of Environmental Chemical Engineering</i> , 2017, 5, 5099-5114.	3.3	49
23	Pi electron cloud mediated separation of aromatics using supported ionic liquid (SIL) membrane having antibacterial activity. <i>Journal of Membrane Science</i> , 2018, 556, 1-11.	4.1	47
24	Local Environments Around Eu ³⁺ and Eu ²⁺ Ions in Dual Light-Emitting BaSnO ₃ :Eu Nanomaterials. <i>European Journal of Inorganic Chemistry</i> , 2012, 2012, 1609-1619.	1.0	43
25	Application of 3D magnetic nanocomposites: MXene-supported Fe ₃ O ₄ @CS nanospheres for highly efficient adsorption and separation of dyes. <i>Science of the Total Environment</i> , 2022, 822, 153544.	3.9	42
26	Understanding the sorption behavior of trivalent lanthanides on amide functionalized multi walled carbon nanotubes. <i>Hydrometallurgy</i> , 2017, 171, 8-15.	1.8	41
27	Remarkable acidity independent actinide extraction with a both-side diglycolamide-functionalized calix[4]arene. <i>Dalton Transactions</i> , 2013, 42, 8558.	1.6	40
28	Diglycolamide-functionalized task specific ionic liquids for nuclear waste remediation: extraction, luminescence, theoretical and EPR investigations. <i>RSC Advances</i> , 2014, 4, 46613-46623.	1.7	40
29	Improvement in performance of PVDF ultrafiltration membranes by co-incorporation of dopamine and halloysite nanotubes. <i>Colloids and Surfaces A: Physicochemical and Engineering Aspects</i> , 2020, 586, 124142.	2.3	39
30	Bionics inspired modified two-dimensional MXene composite membrane for high-throughput dye separation. <i>Journal of Environmental Chemical Engineering</i> , 2021, 9, 105711.	3.3	38
31	Oxidation state selective sorption behavior of plutonium using N,N-dialkylamide functionalized carbon nanotubes: experimental study and DFT calculation. <i>RSC Advances</i> , 2016, 6, 78692-78701.	1.7	37
32	A trialkyl phosphine oxide functionalized task specific ionic liquid for actinide ion complexation: extraction and spectroscopic studies. <i>RSC Advances</i> , 2016, 6, 19763-19767.	1.7	37
33	Poly(ionic liquid) augmented membranes for π -electron induced separation/fractionation of aromatics. <i>Journal of Membrane Science</i> , 2019, 579, 102-110.	4.1	36
34	Judd-Ofelt parameters of diglycolamide-functionalized calix[4]arene Eu ³⁺ complexes in room temperature ionic liquid for structural analysis: Effects of solvents and ligand stereochemistry. <i>Journal of Luminescence</i> , 2014, 148, 174-180.	1.5	35
35	Piperidinium based ionic liquid in combination with sulphoxides: Highly efficient solvent systems for the extraction of thorium. <i>Hydrometallurgy</i> , 2016, 164, 111-117.	1.8	33
36	Graphene-based adsorbents for the separation of f-metals from waste solutions: A review. <i>Journal of Molecular Liquids</i> , 2019, 289, 111121.	2.3	33

#	ARTICLE	IF	CITATIONS
37	Surface modification of PVDF membranes for treating produced waters by direct contact membrane distillation. <i>Separation and Purification Technology</i> , 2019, 224, 388-396.	3.9	33
38	Surface Modification of PVDF Membranes for Treating Produced Waters by Direct Contact Membrane Distillation. <i>International Journal of Environmental Research and Public Health</i> , 2019, 16, 685.	1.2	33
39	Evaluation of ultrafiltration membranes for treating poultry processing wastewater. <i>Journal of Water Process Engineering</i> , 2018, 22, 218-226.	2.6	32
40	Luminescence investigation on Eu ³⁺ -pillar[5]arene-based diglycolamide (DGA) complexes: Nature of the complex, Judd ² -Ofelt calculations and effect of ligand structure. <i>Journal of Luminescence</i> , 2015, 158, 356-364.	1.5	31
41	Solvent system containing CMPO as the extractant in a diluent mixture containing n-dodecane and isodecanol for actinide partitioning runs. <i>Hydrometallurgy</i> , 2014, 147-148, 228-233.	1.8	30
42	Synthesis and characterization of antibacterial poly ionic liquid membranes with tunable performance. <i>Separation and Purification Technology</i> , 2019, 212, 307-315.	3.9	30
43	Understanding the complexation of the Eu ³⁺ ion with TODGA, CMPO, TOPO and DMBTDMA: Extraction, luminescence and theoretical investigation. <i>Polyhedron</i> , 2016, 117, 612-622.	1.0	28
44	Studies on neptunium complexation with CMPO- and diglycolamide-functionalized ionic liquids: experimental and computational studies. <i>New Journal of Chemistry</i> , 2017, 41, 836-844.	1.4	28
45	Analytical application of DHOA for the determination of trace metallic constituents in U based fuel materials by ICP-AES. <i>Journal of Radioanalytical and Nuclear Chemistry</i> , 2011, 289, 961-965.	0.7	26
46	Selective separation of uranium from nuclear waste solution by bis(2,4,4-trimethylpentyl)phosphinic acid in ionic liquid and molecular diluents: a comparative study. <i>Journal of Radioanalytical and Nuclear Chemistry</i> , 2016, 309, 1199-1208.	0.7	26
47	Investigation on suppression of fouling by magnetically responsive nanofiltration membranes. <i>Separation and Purification Technology</i> , 2018, 205, 94-104.	3.9	26
48	Novel thin-film composite forward osmosis membrane using polyethylenimine and its impact on membrane performance. <i>Separation Science and Technology</i> , 2020, 55, 590-600.	1.3	25
49	Application of superomniphobic electrospun membrane for treatment of real produced water through membrane distillation. <i>Desalination</i> , 2022, 528, 115602.	4.0	24
50	Role of alkyl substituent in room temperature ionic liquid on the electrochemical behavior of uranium ion and its local environment. <i>Journal of Radioanalytical and Nuclear Chemistry</i> , 2013, 298, 209-217.	0.7	23
51	Sorption behaviour of Pu ⁴⁺ and PuO ₂ ²⁺ on amido amine-functionalized carbon nanotubes: experimental and computational study. <i>RSC Advances</i> , 2016, 6, 107011-107020.	1.7	23
52	Insight into the Complexation of Actinides and Lanthanides with Diglycolamide Derivatives: Experimental and Density Functional Theoretical Studies. <i>Journal of Physical Chemistry B</i> , 2017, 121, 2640-2649.	1.2	23
53	Efficient removal of chemically toxic dyes using microorganism from activated sludge: Understanding sorption mechanism, kinetics, and associated thermodynamics. <i>Separation Science and Technology</i> , 2018, 53, 1760-1776.	1.3	23
54	Removal of Emerging Contaminants from Wastewater Streams Using Membrane Bioreactors: A Review. <i>Membranes</i> , 2022, 12, 60.	1.4	23

#	ARTICLE	IF	CITATIONS
55	Diglycolamic acid-functionalized multiwalled carbon nanotubes as a highly efficient sorbent for f-block elements: experimental and theoretical investigations. <i>New Journal of Chemistry</i> , 2017, 41, 4531-4545.	1.4	22
56	Spectroscopic investigations of Eu ³⁺ -complexes with ligands containing multiple diglycolamide pendant arms in a room temperature ionic liquid. <i>Journal of Luminescence</i> , 2014, 154, 392-401.	1.5	21
57	Electron induced separation of organic compounds using supported ionic liquid membranes. <i>Separation and Purification Technology</i> , 2020, 236, 116237.	3.9	21
58	Functional metal-organic frameworks for metal removal from aqueous solutions. <i>Separation and Purification Reviews</i> , 2022, 51, 78-99.	2.8	21
59	A comparative study of the complexation of Am(III) and Eu(III) with TODGA in room temperature ionic liquid. <i>Journal of Radioanalytical and Nuclear Chemistry</i> , 2013, 298, 405-412.	0.7	20
60	Polyelectrolyte multilayer modified nanofiltration membranes for the recovery of ionic liquid from dilute aqueous solutions. <i>Journal of Applied Polymer Science</i> , 2017, 134, 45349.	1.3	20
61	Quaternary ammonium based task specific ionic liquid for the efficient and selective extraction of neptunium. <i>Radiochimica Acta</i> , 2017, 105, 689-697.	0.5	20
62	Quaternary ammonium-based task-specific ionic liquid: An efficient and "green" separation for "f block" elements. <i>Separation Science and Technology</i> , 2018, 53, 286-294.	1.3	20
63	Magnetically responsive nano filtration membranes for treatment of coal bed methane produced water. <i>Journal of the Taiwan Institute of Chemical Engineers</i> , 2019, 94, 97-108.	2.7	20
64	Role of diluents in the comparative extraction of Th(IV), U(VI) and other relevant metal ions by DHOA and TBP from nitric acid media and simulated wastes: Reprocessing of U-Th based fuel in perspective. <i>Hydrometallurgy</i> , 2015, 158, 132-138.	1.8	19
65	Evaluation of 1st and 2nd generation of poly(amidoamine) dendrimer functionalized carbon nanotubes for the efficient removal of neptunium. <i>Journal of Radioanalytical and Nuclear Chemistry</i> , 2018, 315, 331-340.	0.7	19
66	An Insight into the Complexation of Pyrazine-Functionalized Calix[4]arenes with Am ³⁺ and Eu ³⁺ - Solvent Extraction and Luminescence Studies in Room-Temperature Ionic Liquids. <i>European Journal of Inorganic Chemistry</i> , 2014, 2014, 5689-5697.	1.0	18
67	Probing of the local environment and calculation of J.O. parameters for Eu ³⁺ CMPO functionalized pillararene complexes by time resolved fluorescence spectroscopy. <i>Journal of Luminescence</i> , 2015, 166, 187-194.	1.5	18
68	ICP-AES determination of trace metallic constituents in thorium matrix after preferential extraction of thorium using TBP, TOPO and DHOA: a comparative study. <i>Journal of Radioanalytical and Nuclear Chemistry</i> , 2016, 310, 59-67.	0.7	18
69	High flux PVDF membrane incorporated with cyclodextrin modified halloysite nanotubes for dye rejection and Cu (II) removal from water. <i>Polymers for Advanced Technologies</i> , 2018, 29, 2704-2714.	1.6	18
70	Separation and purification of americium from analytical waste solutions. <i>Journal of Radioanalytical and Nuclear Chemistry</i> , 2010, 283, 777-783.	0.7	17
71	Understanding the extraction and complexation of thorium using structurally modified CMPO functionalized pillar[5]arenes in ionic liquid: Experimental and theoretical investigations. <i>Inorganic Chemistry Communication</i> , 2017, 75, 33-36.	1.8	17
72	Surface Oxidation of Ethylenechlorotrifluoroethylene (ECTFE) Membrane for the Treatment of Real Produced Water by Membrane Distillation. <i>International Journal of Environmental Research and Public Health</i> , 2018, 15, 1561.	1.2	17

#	ARTICLE	IF	CITATIONS
73	Spectral interference study of uranium on other analytes by using CCD based ICP-AES. Journal of Radioanalytical and Nuclear Chemistry, 2013, 298, 1117-1125.	0.7	16
74	Radiation stability of diglycolamide functionalized calix[4]arenes in ionic liquid: Solvent extraction, EPR and GC-MS studies. Separation and Purification Technology, 2016, 162, 77-83.	3.9	16
75	Understanding the sorption behavior of Pu ⁴⁺ on poly(amidoamine) dendrimer functionalized carbon nanotube: sorption equilibrium, mechanism, kinetics, radiolytic stability, and back-extraction studies. Radiochimica Acta, 2017, 105, 677-688.	0.5	16
76	Understanding the extraction mechanism, radiolytic stability and stripping behavior of thorium by ionic liquid based solvent systems: evidence of 'ion-exchange' and 'solvation' mechanism. Journal of Radioanalytical and Nuclear Chemistry, 2017, 311, 195-208.	0.7	16
77	Understanding the extraction behaviour of UO ₂ ²⁺ and Th ⁴⁺ using novel picolinamide/N-oxo picolinamide in ionic liquid: A comparative evaluation with molecular diluent. Journal of Molecular Liquids, 2021, 332, 115773.	2.3	16
78	Amide-mediated enhancement of sorption efficiency of trivalent f-elements on functionalized carbon nanotube: Evidence of physisorption. Separation Science and Technology, 2017, 52, 2049-2061.	1.3	15
79	Designing Electric Field Responsive Ultrafiltration Membranes by Controlled Grafting of Poly (Ionic) Tj ETQq1 1 0.784314 rgBT /Overlock	1.2	15
80	Tuning the extraction mechanism of uranyl ion in bicyclooctanium, propylpyridinium, piperidinium and imidazolium based ionic liquids: First ever evidence of 'cation exchange', 'anion exchange' and 'solvation' mechanism. Journal of Molecular Liquids, 2021, 337, 116435.	2.3	15
81	ICP-AES Determination of Trace Metallic Elements in Plutonium Samples Containing Sizeable Amounts of Americium. Atomic Spectroscopy, 2011, 32, 49-55.	0.4	15
82	Rapid and non-destructive determination of uranium and thorium by gamma spectrometry and a comparison with ICP-AES. Journal of Radioanalytical and Nuclear Chemistry, 2015, 306, 401-406.	0.7	14
83	Poly(amidoamine) Dendrimer Functionalized Carbon Nanotube for Efficient Sorption of Trivalent f-elements: A Comparison Between 1 st and 2 nd Generation. ChemistrySelect, 2017, 2, 975-985.	0.7	14
84	Combined Osmotic and Membrane Distillation for Concentration of Anthocyanin from Muscadine Pomace. Journal of Food Science, 2019, 84, 2199-2208.	1.5	14
85	Effect of alkyl chain length on the extraction properties of U and Th using novel CnmimNTf ₂ /isophthalamide systems. Journal of Molecular Liquids, 2021, 323, 114944.	2.3	14
86	Amidoamine functionalized task specific carbon nanotube for efficient sorption of penta and hexavalent neptunium: Experimental and theoretical investigations. Journal of Environmental Chemical Engineering, 2017, 5, 3058-3064.	3.3	14
87	Determination of Trace Elements in Carbon Steel by Inductively Coupled Plasma Atomic Emission Spectrometry. Atomic Spectroscopy, 2011, 32, 200-205.	0.4	14
88	Study of the Spectral Interferences of Zirconium on Other Analytes in the Analysis of Nuclear Materials by CCD-based ICP-AES. Atomic Spectroscopy, 2014, 35, 25-32.	0.4	14
89	Recovery of americium from analytical solid waste containing large amounts of uranium, plutonium and silver. Journal of Radioanalytical and Nuclear Chemistry, 2012, 291, 843-848.	0.7	13
90	Highly efficient bio-sorption of trivalent f-elements using wild type Rhizopus arrhizus dead fungus. Journal of Radioanalytical and Nuclear Chemistry, 2017, 312, 395-403.	0.7	13

#	ARTICLE	IF	CITATIONS
91	Substituted sulphoxide ligands in piperidinium based ionic liquid: novel solvent systems for the extraction of Pu ⁴⁺ and PuO ₂ ²⁺ . <i>Journal of Radioanalytical and Nuclear Chemistry</i> , 2017, 311, 1729-1739.	0.7	13
92	Development of an AES based analytical method for the determination of trace metallic impurities in uranium silicide dispersion fuel: from precursors to end products. <i>Journal of Analytical Atomic Spectrometry</i> , 2020, 35, 169-177.	1.6	13
93	Determination of analytes at trace level in uranium matrix by ICP-AES without chemical/physical separation. <i>Journal of Radioanalytical and Nuclear Chemistry</i> , 2014, 299, 2023-2026.	0.7	12
94	Understanding the sorption behavior of tetra- and hexavalent plutonium on fungus <i>Rhizopus arrhizus</i> dead biomass. <i>Journal of Radioanalytical and Nuclear Chemistry</i> , 2017, 311, 903-912.	0.7	12
95	Novel DyP from the basidiomycete <i>Pleurotus sapidus</i> : substrate screening and kinetics. <i>Biocatalysis</i> , 2018, 4, 1-13.	2.3	12
96	Tuneable interlayer spacing self-assembling on graphene oxide-framework membrane for enhance air dehumidification. <i>Separation and Purification Technology</i> , 2020, 239, 116499.	3.9	12
97	Experimental and theoretical insight into the extraction mechanism, kinetics, thermodynamics, complexation and radiolytic stability of novel calix crown ether in ionic liquid with Sr ²⁺ . <i>Journal of Molecular Liquids</i> , 2020, 316, 113864.	2.3	12
98	Exploring functionalized titania for task specific application of efficient separation of trivalent f-block elements. <i>New Journal of Chemistry</i> , 2020, 44, 6151-6162.	1.4	12
99	Application of hybrid MOF composite in extraction of f-block elements: Experimental and computational investigation. <i>Chemosphere</i> , 2022, 287, 132232.	4.2	12
100	Development of an Analytical Methodology for the Determination of Trace Metal Constituents in U-Zr Alloy by ICP-AES. <i>Atomic Spectroscopy</i> , 2012, 33, 48-52.	0.4	12
101	Characterization of serpentine: a potential nuclear shielding material. <i>Journal of Radioanalytical and Nuclear Chemistry</i> , 2012, 292, 903-908.	0.7	11
102	Role of organic diluent on actinide ion extraction using a both-side diglycolamide-functionalised calix[4]arene. <i>Supramolecular Chemistry</i> , 2013, 25, 688-695.	1.5	11
103	Solvent systems containing diglycolamide-functionalised calix[4]arenes in room temperature ionic liquid for metal ion extraction: studies with simulated high-level wastes. <i>Supramolecular Chemistry</i> , 2014, 26, 612-619.	1.5	11
104	Single-Step Synthesis of Novel Polyionic Liquids Having Antibacterial Activity and Showing Electron Mediated Selectivity in Separation of Aromatics. <i>ChemistrySelect</i> , 2018, 3, 4959-4968.	0.7	11
105	Dipicolinamide functionalized titania for highly efficient sorption of tetra and hexavalent actinide. <i>Separation and Purification Technology</i> , 2021, 279, 119703.	3.9	11
106	Analytical Application of DHOA for the Determination of TraceMetallic Constituents in Pu-based Fuel Materials by ICP-AES. <i>Atomic Spectroscopy</i> , 2014, 35, 147-153.	0.4	11
107	Quality control of (Th,Pu)O ₂ fuel pellet obtained by coated agglomerate pelletization. <i>Journal of Radioanalytical and Nuclear Chemistry</i> , 2016, 308, 495-503.	0.7	10
108	Evaluation of amide functionalized carbon nanotubes for efficient and selective removal of neptunium: understanding isotherm, kinetics, stripping and radiolytic stability. <i>Journal of Radioanalytical and Nuclear Chemistry</i> , 2017, 314, 1393-1404.	0.7	10

#	ARTICLE	IF	CITATIONS
109	Achieving highly efficient and selective cesium extraction using 1,3-di-octyloxycalix[4]arene-crown-6 in <i>n</i> -octanol based solvent system: experimental and DFT investigation. RSC Advances, 2021, 11, 21323-21331.	1.7	10
110	Application of task specific ionic liquid for the extraction of Zirconium and Hafnium. Journal of Molecular Liquids, 2021, 338, 116616.	2.3	10
111	etermination of Trace Metallic Constituents in Nuclear-grade BeO Matrix by D.C. Arc Carrier Distillation and ICP-AES: A Comparative Evaluation. Atomic Spectroscopy, 2019, 40, 215-220.	0.4	10
112	Sorption behaviour of metal ion on thorium tungstate synthesized by solid state route. Journal of Radioanalytical and Nuclear Chemistry, 2016, 310, 979-989.	0.7	9
113	Understanding the extraction/complexation of uranium using structurally modified sulphoxides in room temperature ionic liquid: speciation, kinetics, radiolytic stability, stripping and luminescence investigation. Journal of Radioanalytical and Nuclear Chemistry, 2016, 310, 1049-1059.	0.7	9
114	Extraction of Eu(III) and Am(III) by 1-phenyl-3-methyl-4-acetylpyrazol-5-one (HPMAP) and tri- <i>n</i> -octylphosphine oxide (TOPO) in a room-temperature ionic liquid. Separation Science and Technology, 2017, 52, 2318-2327.	1.3	9
115	AES and XRF Based Comparative Evaluation of Metallic Constituents at Trace and Minor Levels in Contaminated Neoprene Gauntlets and Cellulosic Materials. ChemistrySelect, 2020, 5, 3763-3769.	0.7	9
116	Exploring novel functionality for efficient extraction of UO ₂ ²⁺ and Th ⁴⁺ in ionic liquid: Mechanism, speciation, selectivity, stability and stripping. Journal of Molecular Liquids, 2021, 324, 114716.	2.3	9
117	Study on the Spectral Interference of Thorium on Critical Elements and Rare Earths by CCD-based ICP-AES. Atomic Spectroscopy, 2014, 35, 213-222.	0.4	9
118	Mechanism unravelling for highly efficient and selective ⁹⁹ TcO ₄ ⁻ sequestration utilising crown ether based solvent system from nuclear liquid waste: experimental and computational investigations. RSC Advances, 2022, 12, 3216-3226.	1.7	9
119	Development of CCD based ICP-AES method for the direct determination of phosphorous and sulphur in U, Th and Zr matrices. Journal of Radioanalytical and Nuclear Chemistry, 2016, 307, 1489-1497.	0.7	8
120	Development of an ICP-AES-based Method for the Trace Level Determination of Common Analytes in a Thorium Matrix Without Chemical Separation. Atomic Spectroscopy, 2014, 35, 247-259.	0.4	8
121	Development of ICP-AES-based Methodology for the Determination of Trace Metallic Constituents in Zr-Nb Alloy. Atomic Spectroscopy, 2017, 38, 174-185.	0.4	8
122	Effect of phase modifiers TBP and iso-decanol on the extraction and complexation of Eu ³⁺ with CMPO. Separation Science and Technology, 2016, 51, 2153-2163.	1.3	7
123	Development of Methodologies for the Chemical Quality Control of Zircon, A Precursor for Zirconium Production. ChemistrySelect, 2021, 6, 376-388.	0.7	7
124	Magnetic CoFe ₂ O ₄ /Graphene oxide nanocomposite for highly efficient separation of f-block elements. Surfaces and Interfaces, 2021, 23, 100916.	1.5	7
125	Novel Poly(ionic liquid) Augmented Membranes for Unconventional Aqueous Phase Applications in Fractionation of Dyes and Sugar. Polymers, 2021, 13, 2366.	2.0	7
126	Development of an Analytical Method for the Trace Metallic Assay of (U-Pu-Zr) Alloy Fuel Using the D.C. Arc AES Technique. Atomic Spectroscopy, 2019, 40, 221-226.	0.4	7

#	ARTICLE	IF	CITATIONS
127	The standardization and application of an external (in air) particle induced gamma emission (PIGE) method for the rapid and non-destructive quantification of light elements at major to trace concentrations in coal, bottom ash and coke samples. <i>Journal of Analytical Atomic Spectrometry</i> , 2022, 37, 296-305.	1.6	7
128	Assessing the feasibility study of highly efficient and selective co-sequestration process for cesium and strontium utilizing calix-crown and crown-ether based combined solvent systems. <i>Journal of Radioanalytical and Nuclear Chemistry</i> , 2022, 331, 1473-1481.	0.7	7
129	Purification of americium from assorted analytical waste in hydrochloric acid medium. <i>Journal of Radioanalytical and Nuclear Chemistry</i> , 2012, 292, 1017-1023.	0.7	6
130	Synthesis, characterization and application of metal oxides impregnated silica for the sorption of thorium. <i>Journal of Radioanalytical and Nuclear Chemistry</i> , 2015, 309, 841.	0.7	6
131	Surface modified polypropylene membranes for treating hydraulic fracturing produced waters by membrane distillation. <i>Separation Science and Technology</i> , 2019, 54, 2921-2932.	1.3	6
132	Oil Deposition on Polymer Brush-Coated NF Membranes. <i>Membranes</i> , 2019, 9, 168.	1.4	6
133	Comparative study on the radiolytic stability of TBP, DHOA, Cyanex 923 and Cyanex 272 in ionic liquid and molecular diluent for the extraction of thorium. <i>Journal of Radioanalytical and Nuclear Chemistry</i> , 2015, 309, 615.	0.7	5
134	Synthesis and trace metal characterization of potassium plutonium sulphate: working reference material for plutonium. <i>Journal of Radioanalytical and Nuclear Chemistry</i> , 2015, 306, 555-561.	0.7	5
135	Highly efficient extraction of tetra- and hexavalent plutonium using DGA functionalized pillar[5]arene in RTIL: Understanding speciation, thermodynamics and radiolytic stability. <i>Separation Science and Technology</i> , 2017, , 1-10.	1.3	5
136	Understanding the complexation of Eu ³⁺ with potential ligands used for preferential separation of lanthanides and actinides in various stages of nuclear fuel cycle: A luminescence investigation. <i>Spectrochimica Acta - Part A: Molecular and Biomolecular Spectroscopy</i> , 2017, 173, 328-334.	2.0	5
137	Understanding the sorption behaviour of Pu/U on zirconium phosphosilicate prepared by gelation route. <i>Radiochimica Acta</i> , 2020, 108, 433-441.	0.5	5
138	A Comprehensive Investigation alongwith the Statistical Evaluation for the Characterization of Ilmenite Mineral by X-ray Fluorescence Spectrometry and Optical Emission Spectrometry. <i>ChemistrySelect</i> , 2021, 6, 1911-1919.	0.7	5
139	Cost effective separation of uranium ion using exhausted household products and natural bio-sorbent. <i>Journal of Radioanalytical and Nuclear Chemistry</i> , 2021, 329, 1361-1373.	0.7	5
140	Elucidation of complexation of tetra and hexavalent actinides towards an amide ligand in polar and non-polar diluents: Combined experimental and theoretical approach. <i>Polyhedron</i> , 2017, 123, 234-242.	1.0	4
141	Diluents induced tuning of the extraction characteristics of radioactive Cs from acidic nuclear waste solution using calix crown ether. <i>Journal of Environmental Chemical Engineering</i> , 2019, 7, 103216.	3.3	4
142	Studies on the Spectral Interference of Gadolinium on Different Analytes by Inductively Coupled Plasma Atomic Emission Spectrometry. <i>Atomic Spectroscopy</i> , 2015, 36, 15-29.	0.4	4
143	Evaluation of Spectral Interference of Lutetium on Analytes Including Specified Rare Earth Elements Using a CCD Detector-based ICP-AES. <i>Atomic Spectroscopy</i> , 2015, 36, 82-95.	0.4	4
144	ICP-AES Characterization of PHWR Irradiated Thoria Bundles for Fission Products. <i>Atomic Spectroscopy</i> , 2019, 40, 127-132.	0.4	4

#	ARTICLE	IF	CITATIONS
145	Characterization & categorization of garnet samples for major and minor constituents by energy dispersive X-ray fluorescence spectroscopy. Nuclear Instruments and Methods in Physics Research, Section A: Accelerators, Spectrometers, Detectors and Associated Equipment, 2021, 1019, 165854.	0.7	4
146	Development of a methodology for the determination of trace metallic constituents in presence of neptunium. Journal of Radioanalytical and Nuclear Chemistry, 2016, 308, 765-772.	0.7	3
147	Establishing correlation between effective diffusivity coefficient and the mass transfer for Zn ²⁺ column extraction by D2EHPA: An experimental and theoretical investigation. Journal of Environmental Chemical Engineering, 2018, 6, 6322-6327.	3.3	3
148	Remote Performance Modulation of Ultrafiltration Membranes by Magnetically and Thermally Responsive Polymer Chains. Membranes, 2021, 11, 340.	1.4	3
149	Appraising the Spectral Interference of Dysprosium on 27 Analytes Using Capacitively Coupled Device Detector-based Inductively Coupled Plasma Atomic Emission Spectrometry Without Physical/Chemical Separation. Atomic Spectroscopy, 2016, 37, 50-60.	0.4	3
150	ICP-OES based methodology for determination of critical elements in U ₃ Si ₂ matrix. Journal of Radioanalytical and Nuclear Chemistry, 0, , 1.	0.7	3
151	Sulphoxide ligands in bicyclooctanium based ionic liquid: Novel solvent systems for the extraction of f-elements. Separation Science and Technology, 2019, 54, 1312-1324.	1.3	2
152	Tailoring and Remotely Switching Performance of Ultrafiltration Membranes by Magnetically Responsive Polymer Chains. Membranes, 2020, 10, 219.	1.4	2
153	Analytical application of ionic liquid in determination of trace metallic constituents in U matrix by ICP-OES: A 'green' approach for drastic reduction in organic waste burden and time of analysis. Journal of Molecular Liquids, 2021, 343, 117584.	2.3	2
154	Studies on Spectral Interference of Neodymium on Analytes in Trace Metallic Impurity Analysis of Neodymium Matrix Using CCD-based ICP-AES. Atomic Spectroscopy, 2015, 36, 30-41.	0.4	2
155	Pre-concentration studies of ²³⁷ Np using sulphonic acid based actinide resin. Journal of Radioanalytical and Nuclear Chemistry, 2015, 303, 407-411.	0.7	1
156	Utilization of ionic liquids for preferential separation of thorium during the determination of trace metallic constituents in thorium matrix using ICP-OES. Journal of Analytical Atomic Spectrometry, 2022, 37, 306-316.	1.6	1