

Xin-Sheng Chai

List of Publications by Year in descending order

Source: <https://exaly.com/author-pdf/1088515/publications.pdf>

Version: 2024-02-01

88
papers

901
citations

567281

15
h-index

580821

25
g-index

89
all docs

89
docs citations

89
times ranked

894
citing authors

#	ARTICLE	IF	CITATIONS
1	A rapid method for simultaneously determining ethanol and methanol content in wines by full evaporation headspace gas chromatography. <i>Food Chemistry</i> , 2015, 183, 169-172.	8.2	77
2	Novel Method for the Determination of the Methoxyl Content in Lignin by Headspace Gas Chromatography. <i>Journal of Agricultural and Food Chemistry</i> , 2012, 60, 5307-5310.	5.2	57
3	Rapid determination of hydrogen peroxide in pulp bleaching effluents by headspace gas chromatography. <i>Journal of Chromatography A</i> , 2012, 1235, 182-184.	3.7	46
4	Henry's constants of methanol in aqueous systems containing salts. <i>Fluid Phase Equilibria</i> , 2001, 185, 265-274.	2.5	38
5	A high-throughput headspace gas chromatographic technique for the determination of nitrite content in water samples. <i>Journal of Chromatography A</i> , 2018, 1538, 104-107.	3.7	37
6	Determination of oxalate in black liquor by headspace gas chromatography. <i>Journal of Chromatography A</i> , 2008, 1192, 208-211.	3.7	32
7	Rapid determination of moisture content in paper materials by multiple headspace extraction gas chromatography. <i>Journal of Chromatography A</i> , 2016, 1443, 62-65.	3.7	32
8	Determination of methanol in pulp washing filtrates by desiccated full evaporation headspace gas chromatography. <i>Journal of Chromatography A</i> , 2012, 1222, 1-4.	3.7	26
9	In Situ Determination of Bacterial Growth by Multiple Headspace Extraction Gas Chromatography. <i>Analytical Chemistry</i> , 2008, 80, 7820-7825.	6.5	23
10	Improvement of alkali efficiency for purification of dissolving pulp by a modified cold caustic extraction process. <i>Carbohydrate Polymers</i> , 2017, 178, 412-417.	10.2	20
11	An efficient method for determining the acid value in edible oils by solvent-assisted headspace gas chromatography. <i>Analytical Methods</i> , 2016, 8, 5789-5793.	2.7	20
12	Determination of solid-liquid partition coefficient of volatile compounds by solid phase ratio variation based headspace analysis. <i>Fluid Phase Equilibria</i> , 2014, 380, 76-81.	2.5	19
13	Light Management in Flexible Glass by Wood Cellulose Coating. <i>Scientific Reports</i> , 2014, 4, 5842.	3.3	19
14	Biological activities and nitrogen and phosphorus removal during the anabaena flos-aquae biofilm growth using different nutrient form. <i>Bioresource Technology</i> , 2018, 251, 7-12.	9.6	19
15	Rapid method for determination of carbonyl groups in lignin compounds by headspace gas chromatography. <i>Journal of Chromatography A</i> , 2015, 1404, 39-43.	3.7	16
16	A practical headspace gas chromatographic method for the determination of oxalate in bleaching effluents. <i>Journal of Industrial and Engineering Chemistry</i> , 2014, 20, 13-16.	5.8	15
17	Effect of shortening kraft pulping integrated with extended oxygen delignification on biorefinery process performance of eucalyptus. <i>Bioresource Technology</i> , 2016, 202, 119-124.	9.6	14
18	Kinetic research on dechlorinating dichlorobenzene in aqueous system by nano-scale nickel/iron loaded with CMC/NFC hydrogel. <i>Chemosphere</i> , 2018, 194, 297-305.	8.2	14

#	ARTICLE	IF	CITATIONS
19	Determination of epichlorohydrin and 1,3-dichloro-2-propanol in synthesis of cationic etherifying reagent by headspace gas chromatography. <i>Journal of Chromatography A</i> , 2011, 1218, 6518-6521.	3.7	13
20	Rapid determination of methanol content in paper materials by alkaline extraction, coupled with headspace analysis. <i>Journal of Chromatography A</i> , 2014, 1350, 10-14.	3.7	13
21	A novel method for rapid determination of alpha-cellulose content in dissolving pulps by visible spectroscopy. <i>Cellulose</i> , 2015, 22, 2149-2156.	4.9	13
22	A quint-wavelength UV spectroscopy for simultaneous determination of dichlorobenzene, chlorobenzene, and benzene in simulated water reduced by nanoscale zero-valent Fe/Ni bimetal. <i>Spectrochimica Acta - Part A: Molecular and Biomolecular Spectroscopy</i> , 2017, 181, 55-59.	3.9	13
23	A novel method for the determination of black liquor viscosity by multiple headspace extraction gas chromatography. <i>Journal of Chromatography A</i> , 2013, 1320, 125-129.	3.7	12
24	Increasing the sensitivity of headspace analysis of low volatility solutes through water removal by hydrate formation. <i>Journal of Chromatography A</i> , 2014, 1343, 42-46.	3.7	12
25	Determination of epoxy groups in epoxy resins by reaction-based headspace gas chromatography. <i>Polymer Testing</i> , 2017, 59, 113-117.	4.8	12
26	A robust method for determining water-extractable alkylphenol polyethoxylates in textile products by reaction-based headspace gas chromatography. <i>Journal of Chromatography A</i> , 2015, 1406, 94-98.	3.7	11
27	Determination of isocyanate groups in the organic intermediates by reaction-based headspace gas chromatography. <i>Journal of Chromatography A</i> , 2016, 1468, 241-244.	3.7	11
28	Determination of Total Acid Content in Vinegars by Reaction-Based Headspace Gas Chromatography. <i>Food Analytical Methods</i> , 2017, 10, 419-423.	2.6	11
29	Rapid Determination of Titratable Acidity in Wines by Headspace Analysis. <i>Food Analytical Methods</i> , 2015, 8, 893-897.	2.6	10
30	Accurate determination of residual acrylic acid in superabsorbent polymer of hygiene products by headspace gas chromatography. <i>Journal of Chromatography A</i> , 2017, 1485, 20-23.	3.7	10
31	A pressure-affected headspace-gas chromatography method for determining calcium carbonate content in paper sample. <i>Journal of Chromatography A</i> , 2017, 1507, 32-36.	3.7	10
32	Oxalate Release and Formation during Alkaline Pulping. <i>Journal of Wood Chemistry and Technology</i> , 2012, 32, 187-197.	1.7	9
33	Rapid determination of residual formaldehyde in formaldehyde related polymer latexes by headspace gas chromatography. <i>Journal of Industrial and Engineering Chemistry</i> , 2013, 19, 748-751.	5.8	9
34	Impact of fiber initial water content on the water retention capacity of poplar APMP fibers during the thermal drying. <i>Wood Science and Technology</i> , 2020, 54, 227-235.	3.2	9
35	A novel multiple headspace extraction gas chromatographic method for measuring the diffusion coefficient of methanol in water and in olive oil. <i>Journal of Chromatography A</i> , 2015, 1385, 124-128.	3.7	8
36	Determination of the Degree of Substitution of Cationic Guar Gum by Headspace-Based Gas Chromatography during Its Synthesis. <i>Journal of Agricultural and Food Chemistry</i> , 2017, 65, 7012-7016.	5.2	8

#	ARTICLE	IF	CITATIONS
37	Mathematical Model for Predicting the Dissolution Behaviors of Hemicelluloses During Cold Caustic Extraction Process. <i>AIChE Journal</i> , 2019, 65, 13-17.	3.6	8
38	A simple multi-wavelength spectroscopic method for the determination of carboxyl group content in nanocellulose. <i>Cellulose</i> , 2021, 28, 2805-2811.	4.9	8
39	Rapid Identification of Tissue Paper Made from Blended Recycled Fibre by Fourier Transform near Infrared Spectroscopy. <i>Journal of Near Infrared Spectroscopy</i> , 2014, 22, 347-355.	1.5	7
40	Rapid Determination of Total Acid Content of Oils Resulting from Sub/Supercritical Water Liquefaction of Lignite by Headspace Gas Chromatography. <i>Energy & Fuels</i> , 2013, 27, 5135-5137.	5.1	6
41	A novel method for rapid determination of total solid content in viscous liquids by multiple headspace extraction gas chromatography. <i>Journal of Chromatography A</i> , 2014, 1358, 299-302.	3.7	6
42	Experimental data and kinetic models in terms of methanol formation during oxygen delignification processes of alkaline pulps. <i>Holzforschung</i> , 2015, 69, 933-942.	1.9	6
43	Determination of Porosity in Shale by Double Headspace Extraction GC Analysis. <i>Analytical Chemistry</i> , 2015, 87, 11072-11077.	6.5	6
44	Determination of Critical Micelle Concentration of Surfactants by Headspace Gas Chromatography. <i>Journal of Surfactants and Detergents</i> , 2017, 20, 1395-1400.	2.1	6
45	Determination of chlorinated volatile organic compounds in polyamine epichlorohydrin solution by headspace gas chromatography. <i>Journal of Chromatography A</i> , 2017, 1496, 163-166.	3.7	6
46	Method for improving accuracy in full evaporation headspace analysis. <i>Journal of Separation Science</i> , 2017, 40, 1974-1978.	2.5	6
47	Efficient Determination of Specific Surface Area of Shale Samples Using a Tracer-Based Headspace Gas Chromatographic Technique. <i>Analytical Chemistry</i> , 2017, 89, 974-979.	6.5	6
48	A simple and efficient headspace gas chromatographic method for the determination of carboxyl groups in nanofibrillated cellulose. <i>Cellulose</i> , 2018, 25, 953-959.	4.9	6
49	Determination of Inorganic Salt Solubility at a Temperature above the Boiling Point of Water by Multiple Headspace Extraction Gas Chromatography. <i>Industrial & Engineering Chemistry Research</i> , 2011, 50, 6413-6417.	3.7	5
50	A Novel Method for Determination of Ethoxyl Content in Ethyl Cellulose by Headspace Gas Chromatography. <i>Analytical Letters</i> , 2012, 45, 1028-1035.	1.8	5
51	New evidence for the role of the borohydride pretreatment on the hydrogen peroxide bleaching of kraft pulp. <i>RSC Advances</i> , 2015, 5, 98067-98074.	3.6	5
52	A rapid method for determining the reactivity of dissolving pulps by visible spectroscopy. <i>Cellulose</i> , 2015, 22, 2851-2857.	4.9	5
53	An Efficient Method for Determining the $\hat{1}_{\pm}$, $\hat{1}^2$, and $\hat{1}^3$ -Cellulose Content in Fully Delignified Pulps by Reaction-Based Headspace Gas Chromatography. <i>Journal of Wood Chemistry and Technology</i> , 2016, 36, 412-417.	1.7	5
54	Simple and efficient dual-wavelength spectroscopy for the determination of organic matter in sewage sludge from wastewater treatment. <i>RSC Advances</i> , 2019, 9, 12580-12584.	3.6	5

#	ARTICLE	IF	CITATIONS
55	In-situ determination of the observed yield coefficient of aerobic activated sludge by headspace gas chromatography. <i>Journal of Chromatography A</i> , 2020, 1610, 460560.	3.7	5
56	An improved sample preparation method for monomer conversion measurement using headspace gas chromatography in emulsion polymerization research. <i>Journal of Applied Polymer Science</i> , 2012, 124, 3525-3528.	2.6	4
57	Formation of Soluble Calcium in Alkaline Pulping of Acacia. <i>Industrial & Engineering Chemistry Research</i> , 2014, 53, 17282-17285.	3.7	4
58	Accurate determination of fiber water-retaining capability at process conditions by headspace gas chromatography. <i>Journal of Chromatography A</i> , 2016, 1464, 50-54.	3.7	4
59	A Practical Method for the Determination of Degree of Substitution in Sodium Carboxymethyl Starch. <i>Food Analytical Methods</i> , 2017, 10, 1592-1596.	2.6	4
60	Rapid determination of degree of substitution of sodium carboxymethylcellulose by headspace gas chromatography. <i>Polymer Testing</i> , 2018, 71, 6-9.	4.8	4
61	Determination of total phosphorus in soil and sludge by an effective headspace gas chromatographic method. <i>RSC Advances</i> , 2019, 9, 40961-40965.	3.6	4
62	Determination of water distribution in sludge by a multiple headspace extraction analytical technique. <i>Journal of Chromatography A</i> , 2020, 1628, 461449.	3.7	4
63	A novel headspace gas chromatographic method for in situ monitoring of monomer conversion during polymerization in an emulsion environment. <i>Journal of Chromatography A</i> , 2012, 1238, 128-131.	3.7	3
64	A new method for the determination of biological oxygen demand in domestic wastewater by headspace gas chromatography. <i>Journal of Chromatography A</i> , 2013, 1308, 32-36.	3.7	3
65	Rapid determination of products of phenol hydrogenation in a supercritical water system using headspace gas chromatography. <i>Chemical Papers</i> , 2015, 69, .	2.2	3
66	Determination of the softening point of rosin by a simple and automated headspace gas chromatographic technique. <i>Journal of Separation Science</i> , 2018, 41, 3411-3414.	2.5	3
67	A simple high-throughput headspace gas chromatographic method for the determination of dissolved oxygen in aqueous samples. <i>Journal of Chromatography A</i> , 2019, 1608, 460399.	3.7	3
68	Simultaneous Determination of the Degree of Deacetylation and Substitution on Carboxymethyl Chitosan by Headspace Gas Chromatography. <i>Journal of Agricultural and Food Chemistry</i> , 2019, 67, 8700-8705.	5.2	3
69	Determination of hydrophobic degree of paper packaging materials by a tracer-assisted headspace gas chromatography. <i>Nordic Pulp and Paper Research Journal</i> , 2020, 35, 370-375.	0.7	3
70	Determination of methanol partition coefficient in octanol/water system by a three-phase ratio variation headspace gas chromatographic method. <i>Journal of Chromatography A</i> , 2022, 1665, 462825.	3.7	3
71	Determination of the content of alkyl ketene dimer in its latex by an ionic-liquid assisted headspace gas chromatography. <i>Journal of Chromatography A</i> , 2017, 1530, 19-22.	3.7	2
72	High-throughput determination of the organic matter content in soil and municipal sludge by headspace gas chromatography. <i>Analytical Methods</i> , 2019, 11, 5963-5968.	2.7	2

#	ARTICLE	IF	CITATIONS
73	Determination of activity of denitrifying enzyme in soil samples by a headspace gas chromatographic technique. <i>Journal of Chromatography A</i> , 2021, 1638, 461882.	3.7	2
74	Determination of water content in municipal sludge by multiple headspace extraction gas chromatography. <i>Analytical Methods</i> , 2021, 13, 796-800.	2.7	2
75	A volatile tracer-assisted headspace analytical technique for determining the swelling capacity of superabsorbent polymers. <i>Journal of Chromatography A</i> , 2017, 1513, 222-225.	3.7	1
76	Determination of 3-chloro-1,2-propanediol in polyamideamine epichlorohydrin resin solution by reaction-based headspace gas chromatography. <i>Journal of Separation Science</i> , 2018, 41, 1576-1581.	2.5	1
77	Determination of lysine content based on an in situ pretreatment and headspace gas chromatographic measurement technique. <i>Analytical and Bioanalytical Chemistry</i> , 2018, 410, 3111-3117.	3.7	1
78	Modeling and prediction of methanol air release from bleached chemi-thermo mechanical pulp board. <i>RSC Advances</i> , 2018, 8, 16690-16695.	3.6	1
79	A rapid screening method for evaluating the total migratable hydrocarbons in paper products by headspace gas chromatography. <i>RSC Advances</i> , 2019, 9, 10226-10230.	3.6	1
80	The correlation between the water retention values of fibers by the centrifugation method and maximum content of fiber bonding water by the headspace GC method. <i>Nordic Pulp and Paper Research Journal</i> , 2019, 34, 304-309.	0.7	1
81	Determination of starch gelatinization temperatures by an automated headspace gas chromatography. <i>Journal of Chromatography A</i> , 2019, 1602, 419-424.	3.7	1
82	A Zero-Valent Pd/Fe Loaded and Nanofibrillated Cellulose-Reinforced Carboxymethyl Cellulose Hydrogel for Dechlorination of 2,4,6-Trichlorophenol. <i>Journal of Nanoscience and Nanotechnology</i> , 2019, 19, 7261-7268.	0.9	1
83	Kinetic modelling of alkyl ketene dimer hydrolysis during the storage and papermaking process. <i>Canadian Journal of Chemical Engineering</i> , 2019, 97, 2097-2101.	1.7	1
84	Quantitative determination of the oleophobicity of food packaging paper using headspace gas chromatographic technique. <i>Packaging Technology and Science</i> , 2021, 34, 297-302.	2.8	1
85	Simultaneous Determination of Amphiphobicities of Material Surface by A Dual-Indicator Headspace Gas Chromatography. <i>Journal of Chromatography A</i> , 2021, 1649, 462230.	3.7	1
86	Hydrolysis kinetics of epoxypropyltrimethylammonium chloride in ethanol/water solution system. <i>Chemical Engineering Research and Design</i> , 2018, 136, 41-47.	5.6	0
87	Accurate determination of melting Point of industrial grade alkyl ketene dimer wax by a simple and automated headspace gas chromatographic technique. <i>Journal of Chromatography A</i> , 2019, 1585, 192-195.	3.7	0
88	Determination of the surface charge of lignocellulosic fiber by a derived spectroscopic technique. <i>Cellulose</i> , 0, , .	4.9	0