Fachuang Lu

List of Publications by Year
in descending order

48 papers	1,953 citations	257101 24 h-index	253896 43 g-index
49 all docs	49 docs citations	49 times ranked	2646 citing authors

#	Article	IF	Citations
1	Effects of Coumarate 3-Hydroxylase Down-regulation on Lignin Structure. Journal of Biological Chemistry, 2006, 281, 8843-8853.	1.6	209
2	Highly Stretchable and Compressible Cellulose Ionic Hydrogels for Flexible Strain Sensors. Biomacromolecules, 2019, 20, 2096-2104.	2.6	171
3	Polyethyleneimine-bacterial cellulose bioadsorbent for effective removal of copper and lead ions from aqueous solution. Bioresource Technology, 2017, 244, 844-849.	4.8	153
4	Zirconiumâ€“lignosulfonate polyphenolic polymer for highly efficient hydrogen transfer of biomass-derived oxygenates under mild conditions. Applied Catalysis B: Environmental, 2019, 248, 31-43.	10.8	126
5	Ultrastretchable and Antifreezing Double-Cross-Linked Cellulose Ionic Hydrogels with High Strain Sensitivity under a Broad Range of Temperature. ACS Sustainable Chemistry and Engineering, 2019, 7, 14256-14265.	3.2	93
6	Syntheses of Lignin-Derived Thioacidolysis Monomers and Their Uses as Quantitation Standards. Journal of Agricultural and Food Chemistry, 2012, 60, 922-928.	2.4	92
7	Choline chloride/urea as an effective plasticizer for production of cellulose films. Carbohydrate Polymers, 2015, 117, 133-139.	5.1	84
8	Identification of 4â€“Oâ€“5-Units in Softwood Lignins via Definitive Lignin Models and NMR. Biomacromolecules, 2016, 17, 1909-1920.	2.6	77
9	A highly recyclable dip-catalyst produced from palladium nanoparticle-embedded bacterial cellulose and plant fibers. Green Chemistry, 2018, 20, 1085-1094.	4.6	62
10	Revealing Structural Differences between Alkaline and Kraft Lignins by HSQC NMR. Industrial & Engineering Chemistry Research, 2019, 58, 5707-5714.	1.8	59
11	Green polymerizable deep eutectic solvent (PDES) type conductive paper for origami 3D circuits. Chemical Communications, 2018, 54, 2304-2307.	2.2	55
12	<i>In situ</i> MnO_x/N-doped carbon aerogels from cellulose as monolithic and highly efficient catalysts for the upgrading of bioderived aldehydes. Green Chemistry, 2018, 20, 3593-3603.	4.6	54
13	Profiling of the formation of lignin-derived monomers and dimers from <i>Eucalyptus</i> alkali lignin. Green Chemistry, 2020, 22, 7366-7375.	4.6	51
14	A facile spectroscopic method for measuring lignin content in lignocellulosic biomass. Green Chemistry, 2021, 23, 5106-5112.	4.6	46
15	The structure-antioxidant activity relationship of dehydrodiferulates. Food Chemistry, 2018, 269, 480-485.	4.2	43
16	The flying spider-monkey tree fern genome provides insights into fern evolution and arborescence. Nature Plants, 2022, 8, 500-512.	4.7	42
17	Ligninâ€Derived Thioacidolysis Dimers: Reevaluation, New Products, Authentication, and Quantification. ChemSusChem, 2017, 10, 830-835.	3.6	41
18	The class II KNOX transcription factors KNAT3 and KNAT7 synergistically regulate monolignol biosynthesis in Arabidopsis. Journal of Experimental Botany, 2020, 71, 5469-5483.	2.4	39

#	Article	IF	Citations
19	Revealing the structure-activity relationship between lignin and anti-UV radiation. Industrial Crops and Products, 2021, 174, 114212.	2.5	39
20	Deciphering the role of the phenylpropanoid metabolism in the tolerance of Capsicum annuum L. to Verticillium dahliae Kleb.. Plant Science, 2017, 258, 12-20.	1.7	34
21	High Electromagnetic Interference Shielding Effectiveness of Carbon Nanotubeâ€"Cellulose Composite Films with Layered Structures. Macromolecular Materials and Engineering, 2018, 303, 1800377.	1.7	34
22	Effects of physical and chemical structures of bacterial cellulose on its enhancement to paper physical properties. Cellulose, 2017, 24, 3513-3523.	2.4	30
23	Elucidating Tricin-Lignin Structures: Assigning Correlations in HSQC Spectra of Monocot Lignins. Polymers, 2018, 10, 916.	2.0	30
24	Synthesis of Highly Polymerized Water-soluble Cellulose Acetate by the Side Reaction in Carboxylate Ionic Liquid 1-ethyl-3-methylimidazolium Acetate. Scientific Reports, 2016, 6, 33725.	1.6	28
25	Scale-up biopolymer-chelated fabrication of cobalt nanoparticles encapsulated in N-enriched graphene shells for biofuel upgrade with formic acid. Green Chemistry, 2019, 21, 4732-4747.	4.6	26
26	The reinforcement mechanism of bacterial cellulose on paper made from woody and non-woody fiber sources. Cellulose, 2017, 24, 5147-5156.	2.4	24
27	Impact of regeneration process on the crystalline structure and enzymatic hydrolysis of cellulose obtained from ionic liquid. Carbohydrate Polymers, 2014, 111, 400-403.	5.1	22
28	Low Temperature Soda-Oxygen Pulping of Bagasse. Molecules, 2016, 21, 85.	1.7	22
29	Structural insights into the alkali lignins involving the formation and transformation of arylglycerols and enol ethers. International Journal of Biological Macromolecules, 2020, 152, 411-417.	3.6	21
30	Synthesis and emulsifying properties of long-chain succinic acid esters of glucuronoxylans. Cellulose, 2019, 26, 3713-3724.	2.4	17
31	Field-Grown Transgenic Hybrid Poplar with Modified Lignin Biosynthesis to Improve Enzymatic Saccharification Efficiency. ACS Sustainable Chemistry and Engineering, 2017, 5, 2407-2414.	3.2	16
32	Angelica Stem: A Potential Low-Cost Source of Bioactive Phthalides and Phytosterols. Molecules, 2018, 23, 3065.	1.7	15
33	A Highly Efficient and Durable Fluorescent Paper Produced from Bacterial Cellulose/Eu Complex and Cellulosic Fibers. Nanomaterials, 2019, 9, 1322.	1.9	11
34	Thioxanthone dicarboxamide derivatives as one-component photoinitiators for near-UV and visible LED (365â€"405 nm) induced photopolymerizations. RSC Advances, 2016, 6, 77093-77099.	1.7	10
35	Aminoâ€functionalized glucuronoxylan as an efficient bioâ€based emulsifier. Cellulose, 2021, 28, 3677-3689.	2.4	10
36	Revealing Structural Modifications of Lignin in Acidic Î³-Valerolactone-H2O Pretreatment. Polymers, 2020, 12, 116.	2.0	10

#	Article	IF	Citations
37	Naphthalene Structures Derived from Lignins During Phenolation. ChemSusChem, 2020, 13, 5549-5555.	3.6	8
38	New Products Generated from the Transformations of Ferulic Acid Dilactone. Biomolecules, 2020, 10, 175.	1.8	8
39	High-Efficient and Recyclable Magnetic Separable Catalyst for Catalytic Hydrogenolysis of Î²-O-4 Linkage in Lignin. Polymers, 2018, 10, 1077.	2.0	6
40	Improved Dispersion of Bacterial Cellulose Fibers for the Reinforcement of Paper Made from Recycled Fibers. Nanomaterials, 2019, 9, 58.	1.9	6
41	Mild Acetylation and Solubilization of Ground Whole Plant Cell Walls in EmimAc: A Method for Solution-State NMR in DMSO-<i>d</i>₆. Analytical Chemistry, 2020, 92, 13101-13109.	3.2	6
42	Incorporation of catechyl monomers into lignins: lignification from the non-phenolic end<i>via</i>Dielsâ€“Alder cycloaddition?. Green Chemistry, 2021, 23, 8995-9013.	4.6	6
43	Fabrication of Novel Cellulose-Based Antibacterial Film Loaded with Poacic Acid against Staphylococcus Aureus. Journal of Polymers and the Environment, 2021, 29, 745-754.	2.4	5
44	High-throughput platform for yeast morphological profiling predicts the targets of bioactive compounds. Npj Systems Biology and Applications, 2022, 8, 3.	1.4	5
45	Synthesis of hydroxycinnamoyl shikimates and their role in monolignol biosynthesis. Holzforschung, 2022, 76, 133-144.	0.9	3
46	Efficient Synthesis of Pinoresinol, an Important Lignin Dimeric Model Compound. Frontiers in Energy Research, 2021, 9, .	1.2	2
47	Isolation, Characterization, and Depolymerization of <scp>l</scp>â€Cysteine Substituted <i>Eucalyptus</i> Lignin. Global Challenges, 2022, 6, 2100130.	1.8	2
48	A tailored fast thioacidolysis method incorporating multi-reaction monitoring mode of GC-MS for higher sensitivity on lignin monomer quantification. Holzforschung, 2022, .	0.9	0