

# Guang Xu

## List of Publications by Year in descending order

Source: <https://exaly.com/author-pdf/1594652/publications.pdf>

Version: 2024-02-01

59  
papers

1,588  
citations

236612  
25  
h-index

315357  
38  
g-index

59  
all docs

59  
docs citations

59  
times ranked

1035  
citing authors

#	ARTICLE	IF	CITATIONS
1	Influence of leakage of air hole on flow and heat transfer in recuperator. <i>Energy Sources, Part A: Recovery, Utilization and Environmental Effects</i> , 2023, 45, 3931-3947.	1.2	4
2	Wettability alteration process at pore-scale during engineered waterflooding using computational fluid dynamics. <i>Modeling Earth Systems and Environment</i> , 2022, 8, 4219-4227.	1.9	2
3	Investigation of agglomerating and wetting behaviour during coal dust suppression via the synergistic application of hydrocarbon and short-chain-fluorocarbon surfactants in the presence of electrolytes. <i>Powder Technology</i> , 2022, 404, 117518.	2.1	8
4	Influence of the Branched Structure of Polyoxyethylene Units in Nonionic Surfactants on the Wettability of Anthracite: A Combined Modeling and Experimental Study. <i>Adsorption Science and Technology</i> , 2022, 2022, .	1.5	5
5	Experimental evaluation of the surfactant adsorptions performance on coal particles with different properties. <i>Colloids and Surfaces A: Physicochemical and Engineering Aspects</i> , 2022, 648, 129408.	2.3	4
6	Numerical study of coal dust behaviors and experimental investigation on coal dust suppression efficiency of surfactant solution by using wind tunnel tests. <i>Energy Sources, Part A: Recovery, Utilization and Environmental Effects</i> , 2021, 43, 2173-2188.	1.2	14
7	Factors influencing the filtration performance of homemade face masks. <i>Journal of Occupational and Environmental Hygiene</i> , 2021, 18, 128-138.	0.4	44
8	Reduction of Airborne Bauxite Residue Dust Pollution by Enhancing the Structural Stability via the Application of Non-traditional Stabilizers. <i>Water, Air, and Soil Pollution</i> , 2021, 232, 1.	1.1	3
9	Improving coal powder wettability using electrolyte assisted surfactant solution. <i>Colloids and Surfaces A: Physicochemical and Engineering Aspects</i> , 2021, 613, 126042.	2.3	26
10	Characterization of red sand dust pollution control performance via static and dynamic laboratorial experiments when applying polymer stabilizers. <i>Environmental Science and Pollution Research</i> , 2021, 28, 34937-34952.	2.7	7
11	Laboratory studies on remote method to assess the damage in underground mines after an emergency. <i>Chemical Engineering Research and Design</i> , 2021, 148, 1337-1345.	2.7	2
12	Effect of Synergistic Aging on Bauxite Residue Dust Reduction Performance via the Application of Colloids, an Orthogonal Design-Based Study. <i>Polymers</i> , 2021, 13, 1986.	2.0	1
13	Microscopic Diffusion Characteristics of Linear Alkylbenzene Sulfonates on the Surface of Anthracite: The Influence of Different Attachment Sites of Benzene Ring in the Backbone. <i>Minerals (Basel, Switzerland)</i> , 2021, 11, 1045.	0.8	7
14	Comparison of the coal dust suppression performance of surfactants using static test and dynamic test. <i>Journal of Cleaner Production</i> , 2021, 328, 129633.	4.6	30
15	Study on Adsorption Characteristics of Sulfonate Gemini Surfactant on Lignite Surface. <i>Minerals (Basel, Switzerland)</i> , 2021, 11, 1401.	0.8	4
16	Effect of synthetic and natural polymers on reducing bauxite residue dust pollution. <i>Environmental Technology (United Kingdom)</i> , 2020, 41, 556-565.	1.2	18
17	Physical chemical characterization of thermally and aqueous solution treated maize stalk stem ash and its potential use in a cementing system. <i>Energy Sources, Part A: Recovery, Utilization and Environmental Effects</i> , 2020, 42, 930-941.	1.2	5
18	Numerical study on DPM dispersion and distribution in an underground development face based on dynamic mesh. <i>International Journal of Mining Science and Technology</i> , 2020, 30, 471-475.	4.6	31

#	ARTICLE	IF	CITATIONS
19	The development of an optimized evaluation system for improving coal dust suppression efficiency using aqueous solution sprays. Colloids and Surfaces A: Physicochemical and Engineering Aspects, 2020, 602, 125104.	2.3	35
20	Experimental study on effective microwave heating/fracturing of coal with various dielectric property and water saturation. Fuel Processing Technology, 2020, 202, 106378.	3.7	36
21	Improving coal permeability using microwave heating technology—A review. Fuel, 2020, 266, 117022.	3.4	60
22	Evaluation of the coal dust suppression efficiency of different surfactants: A factorial experiment. Colloids and Surfaces A: Physicochemical and Engineering Aspects, 2020, 595, 124686.	2.3	51
23	Numerical investigation of diesel particulate matter dispersion in an underground development face during key mining activities. Advanced Powder Technology, 2020, 31, 3882-3896.	2.0	18
24	Modeling the load of SARS-CoV-2 virus in human expelled particles during coughing and speaking. PLoS ONE, 2020, 15, e0241539.	1.1	63
25	Measurement and simulation study on effective drainage radius of borehole along coal seam. Energy Exploration and Exploitation, 2019, 37, 1657-1679.	1.1	10
26	Study on Safety Control of Composite Roof in Deep Roadway Based on Energy Balance Theory. Sustainability, 2019, 11, 3688.	1.6	19
27	Computational Fluid Dynamic Simulation of Inhaled Radon Dilution by Auxiliary Ventilation in a Stone-Coal Mine Laneway and Dosage Assessment of Miners. Processes, 2019, 7, 515.	1.3	9
28	Comparison of underground mine DPM simulation using discrete phase and continuous phase models. Chemical Engineering Research and Design, 2019, 127, 45-55.	2.7	36
29	Effect of polymer stabilizers' viscosity on red sand structure strength and dust pollution resistance. Powder Technology, 2019, 352, 117-125.	2.1	19
30	A mine main fans switchover system with lower air flow volatility based on improved particle swarm optimization algorithm. Advances in Mechanical Engineering, 2019, 11, 168781401982928.	0.8	2
31	Treatment of bauxite residue dust pollution by improving structural stability via application of synthetic and natural polymers. Journal of Central South University, 2019, 26, 440-448.	1.2	4
32	The development of microstructure of coal by microwave irradiation stimulation. Journal of Natural Gas Science and Engineering, 2019, 66, 86-95.	2.1	31
33	Characterization of coal particles wettability in surfactant solution by using four laboratory static tests. Colloids and Surfaces A: Physicochemical and Engineering Aspects, 2019, 567, 304-312.	2.3	76
34	Minimizing DPM pollution in an underground mine by optimizing auxiliary ventilation systems using CFD. Tunnelling and Underground Space Technology, 2019, 87, 112-121.	3.0	72
35	Experimental investigation on variation of physical properties of coal samples subjected to microwave irradiation. Journal of Applied Geophysics, 2018, 150, 118-125.	0.9	27
36	Research and application of non-traditional chemical stabilizers on bauxite residue (red sand) dust control, a review. Science of the Total Environment, 2018, 616-617, 1552-1565.	3.9	38

#	ARTICLE	IF	CITATIONS
37	Study on the Effect of Iron-Based Deoxidizing Inhibitors for Coal Spontaneous Combustion Prevention. <i>Energies</i> , 2018, 11, 789.	1.6	9
38	Evolution of Shale Microstructure under Microwave Irradiation Stimulation. <i>Energy &amp; Fuels</i> , 2018, 32, 11467-11476.	2.5	18
39	Evolution Law of Adsorption and Desorption Characteristics of CH <sub>4</sub> in Coal Masses during Coalbed Methane Extraction. <i>Energy &amp; Fuels</i> , 2018, 32, 10540-10548.	2.5	16
40	Numerical study of diesel particulate matter distribution in an underground mine isolated zone. <i>Powder Technology</i> , 2018, 339, 947-957.	2.1	36
41	Surfactant-aided coal dust suppression: A review of evaluation methods and influencing factors. <i>Science of the Total Environment</i> , 2018, 639, 1060-1076.	3.9	151
42	A coupled electromagnetic irradiation, heat and mass transfer model for microwave heating and its numerical simulation on coal. <i>Fuel Processing Technology</i> , 2018, 177, 237-245.	3.7	79
43	Focus Energy Determination of Mining Microseisms Using Residual Seismic Wave Attenuation in Deep Coal Mining. <i>Shock and Vibration</i> , 2018, 2018, 1-13.	0.3	1
44	Permeability Evolution and Particle Size Distribution of Saturated Crushed Sandstone under Compression. <i>Geofluids</i> , 2018, 2018, 1-12.	0.3	9
45	Calibration of Mine Ventilation Network Models Using the Non-Linear Optimization Algorithm. <i>Energies</i> , 2018, 11, 31.	1.6	26
46	Influence of bubble approach velocity on liquid film drainage between a bubble and a spherical particle. <i>Powder Technology</i> , 2018, 338, 140-144.	2.1	11
47	Lignosulfonate Treating Bauxite Residue Dust Pollution: Enhancement of Mechanical Properties and Wind Erosion Behavior. <i>Water, Air, and Soil Pollution</i> , 2018, 229, 1.	1.1	16
48	Computational fluid dynamics applied to mining engineering: a review. <i>International Journal of Mining, Reclamation and Environment</i> , 2017, 31, 251-275.	1.2	54
49	A review of the health effects and exposure-responsible relationship of diesel particulate matter for underground mines. <i>International Journal of Mining Science and Technology</i> , 2017, 27, 831-838.	4.6	40
50	Evaluation of SDBS surfactant on coal wetting performance with static methods: Preliminary laboratory tests. <i>Energy Sources, Part A: Recovery, Utilization and Environmental Effects</i> , 2017, 39, 2140-2150.	1.2	38
51	Impact of Coalbed Incidence Angle on Methane Enrichment Zone in Longwall Gob. <i>Minerals (Basel)</i> , 2017, 7, 1078.	0.8	3
52	Effects of Freezing and Thawing Cycle on Mechanical Properties and Stability of Soft Rock Slope. <i>Advances in Materials Science and Engineering</i> , 2017, 2017, 1-10.	1.0	20
53	Time Effect of Water Injection on the Mechanical Properties of Coal and Its Application in Rockburst Prevention in Mining. <i>Energies</i> , 2017, 10, 1783.	1.6	32
54	Effects of Loading Rate on Gas Seepage and Temperature in Coal and Its Potential for Coal-Gas Disaster Early-Warning. <i>Energies</i> , 2017, 10, 1246.	1.6	2

#	ARTICLE	IF	CITATIONS
55	Numerical study of gas–solid two-phase flow in a coal roadway after blasting. Advanced Powder Technology, 2016, 27, 1607-1617.	2.0	99
56	Changes on methane concentration after CO <sub>2</sub> injection in a longwall gob: A case study. Journal of Natural Gas Science and Engineering, 2016, 29, 550-558.	2.1	17
57	Effective utilization of tracer gas in characterization of underground mine ventilation networks. Chemical Engineering Research and Design, 2016, 99, 1-10.	2.7	16
58	Remote characterization of ventilation systems using tracer gas and CFD in an underground mine. Safety Science, 2015, 74, 140-149.	2.6	37
59	Development of a remote analysis method for underground ventilation systems using tracer gas and CFD in a simplified laboratory apparatus. Tunnelling and Underground Space Technology, 2013, 33, 1-11.	3.0	37