Yixin Zhao

List of Publications by Year in descending order

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117	4,232	136950	118850
papers	citations	32 h-index	62 g-index

117	117	117	4581
all docs	docs citations	times ranked	citing authors

#	Article	IF	Citations
1	Influence of bedding planes on fracture characteristics of coal under mode II loading. Theoretical and Applied Fracture Mechanics, 2022, 117, 103131.	4.7	10
2	3D DEM method for compaction and breakage characteristics simulation of broken rock mass in goaf. Acta Geotechnica, 2022, 17, 2765-2781.	5.7	31
3	In situ change of fractal structure in coal with coking capability during high-temperature carbonisation. Philosophical Magazine Letters, 2022, 102, 81-92.	1.2	3
4	Co-effects of bedding planes and loading condition on Mode-I fracture toughness of anisotropic rocks. Theoretical and Applied Fracture Mechanics, 2022, 117, 103158.	4.7	11
5	Role of bedding plane in the relationship between Mode-I fracture toughness and tensile strength of shale. Bulletin of Engineering Geology and the Environment, 2022, 81, 1.	3.5	15
6	Prediction of interactive effects of CBM production, faulting stress regime, and fault in coal reservoir: Numerical simulation. Journal of Natural Gas Science and Engineering, 2022, 99, 104419.	4.4	13
7	In situ wide-angle X-ray scattering study on the change of microcrystalline structure in Jincheng anthracite during high-temperature carbonization. Journal of Applied Crystallography, 2022, 55, 265-270.	4.5	6
8	Floor Failure Characteristics in Deep Island Longwall Panel: Theoretical Analysis and Field Verification. Geofluids, 2022, 2022, 1-14.	0.7	0
9	A semi-empirical modified geometry model for long-term co-current spontaneous imbibition of porous media based on convoluted, nonuniform and topological pore network. Journal of Hydrology, 2022, 609, 127669.	5.4	0
10	Comparative study on modes I and II fracture characteristics of bituminous coal using asymmetric semi-circular bend specimen. Theoretical and Applied Fracture Mechanics, 2022, , 103377.	4.7	5
11	Impact of Fractal Features on Gas Adsorption and Desorption Capacities and Ad-/Desorption Hysteresis in Coals Based on Synchrotron Radiation SAXS. Frontiers in Earth Science, 2022, 10, .	1.8	0
12	Coal pillar failure analysis and instability evaluation methods: A short review and prospect. Engineering Failure Analysis, 2022, 138, 106344.	4.0	53
13	Dynamic tensile failure of layered sorptive rocks: Shale and coal. Engineering Failure Analysis, 2022, 138, 106346.	4.0	5
14	Effect of Uniaxial Compression on Coal Nanostructure as Measured by Small Angle X-ray Scattering. Journal of Testing and Evaluation, 2022, 50, 2592-2606.	0.7	2
15	Tensile Properties and Multiparameter Response Characteristics of Coal under Different Loading Rates. Natural Resources Research, 2022, 31, 2787-2803.	4.7	2
16	Influence of Bedding Planes on Mode I and Mixed-Mode (Iâ€“II) Dynamic Fracture Toughness of Coal: Analysis of Experiments. Rock Mechanics and Rock Engineering, 2021, 54, 173-189.	5.4	30
17	In situ SAXS study of fractal structure of non-caking coal during carbonisation. Philosophical Magazine Letters, 2021, 101, 60-67.	1.2	10
18	Space-sky-surface integrated monitoring system for overburden migration regularity in shallow-buried high-intensity mining. Bulletin of Engineering Geology and the Environment, 2021, 80, 1403-1417.	3.5	27

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19	Experimental Investigation of Microstructure-Related Scale Effect on Tensile Failure of Coal. Natural Resources Research, 2021, 30, 1495-1510.	4.7	5
20	Experimental study on permeability response in fractured rock to the effect of hydro-mechanical coupling, fracture geometry, and component content. Natural Hazards, 2021, 105, 1439-1451.	3.4	6
21	Loading rates dependency of strength anisotropy in coal: Based on the threeâ€dimensional reconstruction modeling technology. Energy Science and Engineering, 2021, 9, 855-864.	4.0	4
22	Small furnace for the small angle X-ray scattering (SAXS) and wide angle X-ray scattering (WAXS) characterization of the high temperature carbonization of coal. Instrumentation Science and Technology, 2021, 49, 445-456.	1.8	13
23	Deformation Field and Acoustic Emission Characteristics of Weakly Cemented Rock under Brazilian Splitting Test. Natural Resources Research, 2021, 30, 1925-1939.	4.7	26
24	Nano- to micro-pore characterization by synchrotron radiation SAXS and nano-CT for bituminous coals. Frontiers of Earth Science, 2021, 15, 189-201.	2.1	8
25	Effects of bedding planes on the fracture characteristics of coal under dynamic loading. Engineering Fracture Mechanics, 2021, 250, 107761.	4.3	12
26	A new method for measurement of moisture transport in porous media based on forward and backward scattering of epithermal neutrons. Applied Radiation and Isotopes, 2021, 173, 109730.	1.5	2
27	Characteristics of Ground Surface Settlement of Double-Line Adjacent Metro Construction in Sandy Cobble Stratum: A Case Study of Beijing Airport Line. KSCE Journal of Civil Engineering, 2021, 25, 4443.	1.9	1
28	Characteristic strength and acoustic emission properties of weakly cemented sandstone at different depths under uniaxial compression. International Journal of Coal Science and Technology, 2021, 8, 1288-1301.	6.0	58
29	Development and formation of ground fissures induced by an ultra large mining height longwall panel in Shendong mining area. Bulletin of Engineering Geology and the Environment, 2021, 80, 7879-7898.	3.5	19
30	Differential Strain Index-Based Multiphysics Model for Coal Seam Gas Production. Energy & Fuels, 2021, 35, 15642-15656.	5.1	2
31	Using Improved Edge Detection Method to Detect Mining-Induced Ground Fissures Identified by Unmanned Aerial Vehicle Remote Sensing. Remote Sensing, 2021, 13, 3652.	4.0	13
32	Identification of mining induced ground fissures using UAV and infrared thermal imager: Temperature variation and fissure evolution. ISPRS Journal of Photogrammetry and Remote Sensing, 2021, 180, 45-64.	11.1	22
33	Initial water imbibition of gas-saturated natural reservoir rock: A generalized multifactor geometry model with capillary bundles. Journal of Petroleum Science and Engineering, 2021, 205, 108849.	4.2	6
34	Characteristics Evolution of Multiscale Structures in Deep Coal under Liquid Nitrogen Freeze-Thaw Cycles. Geofluids, 2021, 2021, 1-9.	0.7	6
35	Investigation of Shale Permeability Evolution considering Bivalued Effective Stress Coefficients for CO2 Injection. Geofluids, 2021, 2021, 1-11.	0.7	0
36	The Characteristics of Closed Pores in Coals With Different Ranks. Frontiers in Earth Science, 2021, 9, .	1.8	1

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37	Anisotropy of acoustic emission in coal under the uniaxial loading condition. Chaos, Solitons and Fractals, 2020, 130, 109465.	5.1	20
38	Numerical Simulation of Broken Coal Strength Influence on Compaction Characteristics in Goaf. Natural Resources Research, 2020, 29, 2495-2511.	4.7	21
39	Impact of coal composition and pore structure on gas adsorption: a study based on a synchrotron radiation facility. , 2020, 10, 116-129.		19
40	Quantification of pore modification in coals due to pulverization using synchrotron small angle X-ray scattering. Journal of Natural Gas Science and Engineering, 2020, 84, 103669.	4.4	16
41	Uniaxial compressive strength estimation based on the primary wave velocity in coal: considering scale effect and anisotropy. Energy Sources, Part A: Recovery, Utilization and Environmental Effects, 2020, , 1-19.	2.3	2
42	A Model to Estimate the Height of the Water-conducting Fracture Zone for Longwall Panels in Western China. Mine Water and the Environment, 2020, 39, 823-838.	2.0	23
43	Quantitative characterization and comparsion of bentonite microstructure by small angle X-ray scattering and nitrogen adsorption. Construction and Building Materials, 2020, 262, 120863.	7.2	13
44	Visualization of Gas Diffusion-Sorption in Coal: A Study Based on Synchrotron Radiation Nano-CT. Geofluids, 2020, 2020, 1-11.	0.7	4
45	Experimental Investigation on the Tensile Strength of Coal: Consideration of the Specimen Size and Water Content. Energies, 2020, 13, 6585.	3.1	5
46	Characteristics of Pore and Fracture of Coal with Bursting Proneness Based on DIC and Fractal Theory. Energies, 2020, 13, 5404.	3.1	15
47	Impact of nanopore structure on coal strength: A study based on synchrotron radiation nano-CT. Results in Physics, 2020, 17, 103029.	4.1	15
48	Coupled hydro-mechanical evolution of fracture permeability in sand injectite intrusions. Journal of Rock Mechanics and Geotechnical Engineering, 2020, 12, 742-751.	8.1	4
49	Dynamic tensile behaviour and crack propagation of coal under coupled static-dynamic loading. International Journal of Mining Science and Technology, 2020, 30, 659-668.	10.3	117
50	A fluidâ€solid coupling method for the simulation of gas transport in porous coal and rock media. Energy Science and Engineering, 2019, 7, 1913-1924.	4.0	18
51	Water sorptivity of unsaturated fractured sandstone: Fractal modeling and neutron radiography experiment. Advances in Water Resources, 2019, 130, 172-183.	3.8	20
52	Investigations into Mining-Induced Stressâ€“Fractureâ€“Seepage Field Coupling in a Complex Hydrogeology Environment: A Case Study in the Bulianta Colliery. Mine Water and the Environment, 2019, 38, 632-642.	2.0	11
53	Effect of the Heterogeneity on Sorptivity in Sandstones with High and Low Permeability in Water Imbibition Process. Processes, 2019, 7, 260.	2.8	5
54	Investigations into Mining-Induced Stressâ€“Fractureâ€“Seepage Field Coupling Effect Considering the Response of Key Stratum and Composite Aquifer. Rock Mechanics and Rock Engineering, 2019, 52, 4017-4031.	5.4	27

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55	Effects of Pore Structure on Stress-Dependent Fluid Flow in Synthetic Porous Rocks Using Microfocus X-ray Computed Tomography. Transport in Porous Media, 2019, 128, 653-675.	2.6	7
56	Mechanical anisotropy of coal with considerations of realistic microstructures and external loading directions. International Journal of Rock Mechanics and Minings Sciences, 2019, 116, 111-121.	5.8	47
57	Synchrotron radiation facility-based quantitative evaluation of pore structure heterogeneity and anisotropy in coal. Petroleum Exploration and Development, 2019, 46, 1195-1205.	7.0	12
58	Pore structure characterization of shales using synchrotron SAXS and NMR cryoporometry. Marine and Petroleum Geology, 2019, 102, 116-125.	3.3	53
59	Compaction characteristics of the caving zone in a longwall goaf: a review. Environmental Earth Sciences, 2019, 78, 1.	2.7	69
60	Apparent-Depth Effects of the Dynamic Failure of Thick Hard Rock Strata on the Underlying Coal Mass During Underground Mining. Rock Mechanics and Rock Engineering, 2019, 52, 1565-1576.	5.4	67
61	Neutron radiography study of water spontaneous imbibition in unsaturated sandstone. , 2019, , .		0
62	Poreâ€Scale Reconstruction and Simulation of Nonâ€Darcy Flow in Synthetic Porous Rocks. Journal of Geophysical Research: Solid Earth, 2018, 123, 2770-2786.	3.4	35
63	Characterization of unsaturated diffusivity of tight sandstones using neutron radiography. International Journal of Heat and Mass Transfer, 2018, 124, 693-705.	4.8	19
64	CO2-ECBM in coal nanostructure: Modelling and simulation. Journal of Natural Gas Science and Engineering, 2018, 54, 202-215.	4.4	23
65	Simulation of Sidewall Failure in Coal Mine Roadways Using an Extended Continuous Joint Model. Journal of Failure Analysis and Prevention, 2018, 18, 41-49.	0.9	2
66	Influence of bedding and cleats on the mechanical properties of a hard coal. Arabian Journal of Geosciences, 2018, 11, 1.	1.3	20
67	A Gaussian Decomposition Method and its applications to the prediction of shale gas production. Fuel, 2018, 224, 331-347.	6.4	9
68	FRACTAL CHARACTERISTICS OF CRACK PROPAGATION IN COAL UNDER IMPACT LOADING. Fractals, 2018, 26, 1840014.	3.7	31
69	The temperature effect on the methane and CO2 adsorption capacities of Illinois coal. Fuel, 2018, 211, 241-250.	6.4	128
70	Pore structure characterization of coal by synchrotron radiation nano-CT. Fuel, 2018, 215, 102-110.	6.4	124
71	Experimental Investigation of Forchheimer Coefficients for Non-Darcy Flow in Conglomerate-Confined Aquifer. Geofluids, 2018, 2018, 1-21.	0.7	6
72	Dynamic failure risk of coal pillar formed by irregular shape longwall face: A case study. International Journal of Mining Science and Technology, 2018, 28, 775-781.	10.3	11

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73	Scale Effect on the Anisotropy of Acoustic Emission in Coal. Shock and Vibration, 2018, 2018, 1-11.	0.6	8
74	Scale effects and strength anisotropy in coal. International Journal of Coal Geology, 2018, 195, 37-46.	5.0	63
75	Experimental study of stressâ€“permeability behavior of single persistent fractured coal samples in the fractured zone. Journal of Geophysics and Engineering, 2018, 15, 2159-2170.	1.4	26
76	Modeling of permeability for ultra-tight coal and shale matrix: A multi-mechanistic flow approach. Fuel, 2018, 232, 60-70.	6.4	49
77	Application and Development of an Environmentally Friendly Blast Hole Plug for Underground Coal Mines. Shock and Vibration, 2018, 2018, 1-12.	0.6	3
78	A fully coupled thermo-hydro-mechanical model for heat and gas transfer in thermal stimulation enhanced coal seam gas recovery. International Journal of Heat and Mass Transfer, 2018, 125, 866-875.	4.8	44
79	Quantifying nano-pore heterogeneity and anisotropy in gas shale by synchrotron radiation nano-CT. Microporous and Mesoporous Materials, 2018, 258, 8-16.	4.4	42
80	Plastic fracture simulation by using discretized virtual internal bond. Engineering Fracture Mechanics, 2017, 178, 169-183.	4.3	12
81	Effects of loading rate and bedding on the dynamic fracture toughness of coal: Laboratory experiments. Engineering Fracture Mechanics, 2017, 178, 375-391.	4.3	86
82	Comparison of low-field NMR and microfocus X-ray computed tomography in fractal characterization of pores in artificial cores. Fuel, 2017, 210, 217-226.	6.4	106
83	Influence of initial microcrack on the physic-mechanical properties of rock with slaty cleavage. Geotechnical and Geological Engineering, 2017, 35, 2351-2360.	1.7	9
84	Effects of microstructure on water imbibition in sandstones using Xâ€ray computed tomography and neutron radiography. Journal of Geophysical Research: Solid Earth, 2017, 122, 4963-4981.	3.4	39
85	Shale Pore Characterization Using NMR Cryoporometry with Octamethylcyclotetrasiloxane as the Probe Liquid. Energy & Fuels, 2017, 31, 6951-6959.	5.1	27
86	Pore structure characterization of coal by NMR cryoporometry. Fuel, 2017, 190, 359-369.	6.4	187
87	A review of mechanism and prevention technologies of coal bumps in China. Journal of Rock Mechanics and Geotechnical Engineering, 2017, 9, 180-194.	8.1	77
88	Investigation on the size and fractal dimension of nano-pore in coals by synchrotron small angle X-ray scattering. Chinese Science Bulletin, 2017, 62, 2416-2427.	0.7	15
89	Consecutive Short-Scan CT for Geological Structure Analog Models with Large Size on In-Situ Stage. PLoS ONE, 2016, 11, e0161358.	2.5	1
90	Interactions between the fluid and an isolation tool in a pipe: laboratory experiments and numerical simulation. Petroleum Science, 2016, 13, 746-759.	4.9	7

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91	Dynamic Tensile Strength of Coal under Dry and Saturated Conditions. Rock Mechanics and Rock Engineering, 2016, 49, 1709-1720.	5.4	74
92	Evaluation of gas sorption-induced internal swelling in coal. Fuel, 2015, 143, 165-172.	6.4	47
93	A Modified Fuzzy Feedback Scheduling Strategy in CAN Network. , 2015, , .		0
94	Failure mechanisms in coal: Dependence on strain rate and microstructure. Journal of Geophysical Research: Solid Earth, 2014, 119, 6924-6935.	3.4	56
95	TiO₂Nanoparticles as Functional Building Blocks. Chemical Reviews, 2014, 114, 9283-9318.	47.7	410
96	Metal ions optical sensing by semiconductor quantum dots. Journal of Materials Chemistry C, 2014, 2, 595-613.	5.5	163
97	Effects of bedding on the dynamic indirect tensile strength of coal: Laboratory experiments and numerical simulation. International Journal of Coal Geology, 2014, 132, 81-93.	5.0	113
98	Pore Structure Characterization of Coal by Synchrotron Small-Angle X-ray Scattering and Transmission Electron Microscopy. Energy & Fuels, 2014, 28, 3704-3711.	5.1	160
99	Numerical Investigation of the Dynamic Mechanical State of a Coal Pillar During Longwall Mining Panel Extraction. Rock Mechanics and Rock Engineering, 2013, 46, 1211-1221.	5.4	107
100	Experimental study on the mechanisms of fault reactivation and coal bumps induced by mining. Science in China Series A: Mathematics, 2013, 19, 507-513.	0.2	17
101	Experimental and numerical modelling investigation on fracturing in coal under impact loads. International Journal of Fracture, 2013, 183, 63-80.	2.2	59
102	Investigation on Strain Localization of Coal Using Micro-finite Difference Modelling. Springer Series in Geomechanics and Geoengineering, 2013, , 507-517.	0.1	0
103	Resistance and polarization losses in aqueous bufferâ€“membrane electrolytes for water-splitting photoelectrochemical cells. Energy and Environmental Science, 2012, 5, 7582.	30.8	188
104	Development of plasmonic semiconductor nanomaterials with copper chalcogenides for a future with sustainable energy materials. Energy and Environmental Science, 2012, 5, 5564-5576.	30.8	334
105	Assessment and mitigation of coal bump risk during extraction of an island longwall panel. International Journal of Coal Geology, 2012, 95, 20-33.	5.0	91
106	Principal Component Analysis on Electromagnetic Radiation Rules while Fully Mechanized Coal Face Passing Through Fault. Procedia Environmental Sciences, 2012, 12, 751-757.	1.4	2
107	The Feasibility Research on Ascending Mining under the Condition of Multi-Disturbances. Procedia Environmental Sciences, 2012, 12, 758-764.	1.4	5
108	Study on Risk Analysis and Control Technology of Coal Bump. Procedia Environmental Sciences, 2012, 12, 831-836.	1.4	1

#	Article	IF	Citations
109	Automatic loading testing system based on LabWindows/CVI for industrial CT. , 2011, , .		1
110	The Influence of Roadway Backfill on Bursting Liability and Strength of Coal Pillar by Numerical Investigation. Procedia Engineering, 2011, 26, 1125-1143.	1.2	17
111	Probing Into Design Of Refuge Chamber System In Coal Mine. Procedia Engineering, 2011, 26, 2334-2341.	1.2	9
112	An automatic loading system for rock core testing with an industrial CT scanner. Petroleum Science, 2011, 8, 490-493.	4.9	3
113	Acoustic emission and thermal infrared precursors associated with bump-prone coal failure. International Journal of Coal Geology, 2010, 83, 11-20.	5.0	127
114	Crack edge detection of coal CT images based on LS-SVM. , 2009, , .		0
115	Constitutive equations for coal containing gas considering gas adsorption. Procedia Earth and Planetary Science, 2009, 1, 425-431.	0.6	1
116	Study on Characteristic and Mechanism of Deformation and Failure of Roadway Surrounding Rock in Deep Mining. Advanced Materials Research, 0, 734-737, 819-823.	0.3	1
117	In-Situ Study on High-Temperature Carbonization of Coking Coal by Synchrotron Radiation SAXS-WAXS. SSRN Electronic Journal, 0, , .	0.4	0