Xiaohu Dai

List of Publications by Year in Descending Order

250 papers	6,786 citations	39 h-index	73 g-index
259 ext. papers	9,576 ext. citations	9.6 avg, IF	6.94 L-index

#	Paper	IF	Citations
250	High Proton Conductivity of MOF-808 Promotes Methane Production in Anaerobic Digestion. *ACS Sustainable Chemistry and Engineering*, **2022**, 10, 1419-1429	8.3	1
249	Alkaline thermal hydrolysis of sewage sludge to produce high-quality liquid fertilizer rich in nitrogen-containing plant-growth-promoting nutrients and biostimulants.. *Water Research*, **2022**, 211, 118036	12.5	1
248	Cation exchange resin pretreatment enhancing methane production from anaerobic digestion of waste activated sludge.. *Water Research*, **2022**, 212, 118130	12.5	1
247	Scavenging ROS to Alleviate Acute Liver Injury by ZnO-NiO@COOH.. *Advanced Science*, **2022**, e2103982	13.6	2
246	Influential mechanism of water occurrence states of waste-activated sludge: Potential linkage between water-holding capacity and molecular compositions of EPS.. *Water Research*, **2022**, 213, 118169	12.5	2
245	Targeted clean extraction of phosphorus from waste activated sludge: From a new perspective of phosphorus occurrence states to an innovative approach through acidic cation exchange resin.. *Water Research*, **2022**, 215, 118190	12.5	0
244	The three-stage effect of hydrothermal treatment on sludge physical-chemical properties: Evolution of polymeric substances and their interaction with physicochemical properties.. *Water Research*, **2022**, 211, 118043	12.5	3
243	Zero valent iron greatly improves sludge destruction and nitrogen removal in aerobic sludge digestion. *Chemical Engineering Journal*, **2022**, 433, 134459	14.7	0
242	Responses of methane production, microbial community and antibiotic resistance genes to the mixing ratio of gentamicin mycelial residues and wheat straw in anaerobic co-digestion process. *Science of the Total Environment*, **2022**, 806, 150488	10.2	1
241	Developing precise-acting strategies for improving anaerobic methanogenesis of organic waste: Insights from the electron transfer system of syntrophic partners. *Frontiers of Environmental Science and Engineering*, **2022**, 16, 1	5.8	0
240	Enhancing short-term ethanol-type fermentation of waste activated sludge by adding saccharomycetes and the implications for bioenergy and resource recovery.. *Journal of Environmental Sciences*, **2022**, 113, 179-189	6.4	1
239	Hyperthermophilic pretreatment composting to produce high quality sludge compost with superior humification degree and nitrogen retention. *Chemical Engineering Journal*, **2022**, 429, 132247	14.7	3
238	Novel micro-granular sludge process for highly efficient treatment of low-strength and low C/N ratio municipal wastewater. *Chemosphere*, **2022**, 287, 132322	8.4	2
237	Insight into the evolution of antibiotic resistance genes and microbial community during spiramycin fermentation residue composting process after thermally activated peroxydisulfate pretreatment. *Journal of Hazardous Materials*, **2022**, 424, 127287	12.8	1
236	Research on Ammonia Removal from Reject Water Produced from Anaerobic Digestion of Thermally Hydrolyzed Sludge Through Partial Nitrification–Anammox. *Water, Air, and Soil Pollution*, **2022**, 233, 1	2.6	0
235	Performance and Mechanism of FeO Improving Biotransformation of Waste Activated Sludge into Liquid High-Value Products.. *Environmental Science & Technology*, **2022**,	10.3	5
234	Polyethylene terephthalate microplastic fibers increase the release of extracellular antibiotic resistance genes during sewage sludge anaerobic digestion.. *Water Research*, **2022**, 217, 118426	12.5	0

233	High concentration powder carrier bio-fluidized bed process: a new perspective for domestic wastewater treatment.. *Bioresource Technology*, **2022**, 127015	11	0
232	Medium-chain fatty acids production from carbohydrates-rich wastewater through two-stage yeast biofilm processes without external electron donor addition: Biofilm development and pH impact.. *Science of the Total Environment*, **2022**, 154428	10.2	0
231	Simultaneous enhancing phosphorus recovery and volatile fatty acids production during anaerobic fermentation of sewage sludge with peroxydisulfate pre-oxidation.. *Bioresource Technology*, **2022**, 127164	11	0
230	Coupling anammox and feammox via polymeric ferric sulfate: An efficient and aeration-saving way for nitrogen removal. *Journal of Cleaner Production*, **2022**, 355, 131788	10.3	1
229	Decrease the effective temperature of hydrothermal treatment for sewage sludge deep dewatering: Mechanistic of tannic acid aided.. *Water Research*, **2022**, 217, 118450	12.5	0
228	Different Sizes of Polystyrene Microplastics Induced Distinct Microbial Responses of Anaerobic Granular Sludge. *Water Research*, **2022**, 118607	12.5	1
227	Novel anaerobic digestion of waste activated sludge via isoelectric-point pretreatment: Ultra-short solids retention time and high methane yield. *Water Research*, **2022**, 220, 118657	12.5	1
226	A novel green composite conductive material enhancing anaerobic digestion of waste activated sludge via improving electron transfer and metabolic activity. *Water Research*, **2022**, 220, 118687	12.5	2
225	Contributions of MOF-808 to methane production from anaerobic digestion of waste activated sludge. *Water Research*, **2022**, 220, 118653	12.5	1
224	Implications for mitigation of antibiotic resistance: Differential response of intracellular and extracellular antibiotic resistance genes to sludge fermentation coupled with thermal hydrolysis. *Water Research*, **2021**, 209, 117876	12.5	2
223	Unveiling the distinctive role of titanium dioxide nanoparticles in aerobic sludge digestion. *Science of the Total Environment*, **2021**, 813, 151872	10.2	
222	Sludge treatment and resource recovery towards carbon neutrality in China: current status and future perspective. *Blue-Green Systems*, **2021**, 3, 119-127	5.2	1
221	Interactions between virus surrogates and sewage sludge vary by viral analyte: Recovery, persistence, and sorption.. *Water Research*, **2021**, 210, 117995	12.5	4
220	Calcium peroxide significantly enhances volatile solids destruction in aerobic sludge digestion through improving sludge biodegradability.. *Bioresource Technology*, **2021**, 346, 126655	11	2
219	Highly efficient solid-liquid separation of anaerobically digested liquor of food waste: Conditioning approach screening and mechanistic analysis.. *Science of the Total Environment*, **2021**, 811, 152416	10.2	0
218	Corncob ash boosts fermentative hydrogen production from waste activated sludge. *Science of the Total Environment*, **2021**, 807, 151064	10.2	1
217	Erythromycin stimulates rather than inhibits methane production in anaerobic digestion of antibiotic fermentation dregs. *Science of the Total Environment*, **2021**, 807, 151007	10.2	0
216	Design of facile technology for the efficient removal of hydroxypropyl guar gum from fracturing fluid. *PLoS ONE*, **2021**, 16, e0247948	3.7	2

215	Ferroferric oxide promotes metabolism in Anaerolineae other than microbial syntrophy in anaerobic methanogenesis of antibiotic fermentation residue. *Science of the Total Environment*, **2021**, 758, 143601	10.2	10
214	Environmentally-friendly dewatering of sewage sludge: A novel strategy based on amphiphilic phase-transfer induced by recoverable organic solvent. *Chemical Engineering Journal*, **2021**, 409, 128212	14.7	1
213	Rhamnolipid pretreatment enhances methane production from two-phase anaerobic digestion of waste activated sludge. *Water Research*, **2021**, 194, 116909	12.5	23
212	Defining interfacial abiotic driving forces for enhancing anaerobic biological treatment of organic solid waste. *Resources, Conservation and Recycling*, **2021**, 169, 105553	11.9	3
211	Effect of gentamicin mycelial residues disintegration by microwave-alkaline pretreatment on methane production and gentamicin degradation during anaerobic digestion. *Chemical Engineering Journal*, **2021**, 414, 128790	14.7	5
210	Enhancing methanogenic fermentation of waste activated sludge via isoelectric-point pretreatment: Insights from interfacial thermodynamics, electron transfer and microbial community. *Water Research*, **2021**, 197, 117072	12.5	19
209	Investigating antibiotics, antibiotic resistance genes in soil, groundwater and vegetables in relation to agricultural field - Applicated with lincomycin mycelial residues compost. *Science of the Total Environment*, **2021**, 777, 146066	10.2	4
208	A new approach to recycling cephalosporin fermentation residue into plant biostimulants. *Journal of Hazardous Materials*, **2021**, 413, 125393	12.8	2
207	Effects of sludge age on anaerobic acidification of waste activated sludge: Volatile fatty acids production and phosphorus release. *Journal of Environmental Sciences*, **2021**, 105, 11-21	6.4	2
206	Novel perspective for urban water resource management: 5R generation. *Frontiers of Environmental Science and Engineering*, **2021**, 15, 1	5.8	7
205	Pretreatment using UV combined with CaO for the anaerobic digestion of waste activated sludge: Mechanistic modeling for attenuation of trace organic contaminants. *Journal of Hazardous Materials*, **2021**, 402, 123484	12.8	9
204	Role of redox-active biochar with distinctive electrochemical properties to promote methane production in anaerobic digestion of waste activated sludge. *Journal of Cleaner Production*, **2021**, 278, 123212	10.3	33
203	New insights into the evaluation of anaerobic properties of sludge: Biodegradability and stabilization. *Journal of Environmental Sciences*, **2021**, 100, 158-166	6.4	5
202	A specious relevance between theory and practice: Insights into temperature parameter and multi-phase strategy of anaerobic digestion of straw. *Science of the Total Environment*, **2021**, 753, 142212	10.2	
201	High-solid anaerobic digestion of sewage sludge: achievements and perspectives. *Frontiers of Environmental Science and Engineering*, **2021**, 15, 1	5.8	18
200	The transition temperature (42□C) from mesophilic to thermophilic micro-organisms enhances biomethane potential of corn stover. *Science of the Total Environment*, **2021**, 759, 143549	10.2	1
199	Mechanism insights into polyhydroxyalkanoate-regulated denitrification from the perspective of pericytoplasmic nitrate reductase expression. *Science of the Total Environment*, **2021**, 754, 142083	10.2	3
198	Revealing the Mechanism of Biochar Enhancing the Production of Medium Chain Fatty Acids from Waste Activated Sludge Alkaline Fermentation Liquor. *ACS ES&T Water*, **2021**, 1, 1014-1024		5

197	Novel CaO beads used in the anaerobic fermentation of iron-rich sludge for simultaneous short-chain fatty acids and phosphorus recovery under ambient conditions. *Bioresource Technology*, **2021**, 322, 124553	11	8
196	Conditioning of raw sludge and thermally hydrolyzed sludge by ferric salt and cationic polyacrylamide: rheological analysis. *Water Science and Technology*, **2021**, 83, 1566-1577	2.2	
195	Comparison of anaerobic phosphorus release from activated sludge with three carbon sources. *Water Science and Technology*, **2021**, 83, 1327-1334	2.2	
194	Revisiting Microplastics in Landfill Leachate: Unnoticed Tiny Microplastics and Their Fate in Treatment Works. *Water Research*, **2021**, 190, 116784	12.5	27
193	Microbial production of lactic acid from food waste: Latest advances, limits, and perspectives. *Bioresource Technology*, **2021**, 345, 126052	11	6
192	Principles and advancements in improving anaerobic digestion of organic waste via direct interspecies electron transfer. *Renewable and Sustainable Energy Reviews*, **2021**, 148, 111367	16.2	16
191	Influential mechanism of water occurrence states of waste-activated sludge: specifically focusing on the roles of EPS micro-spatial distribution and cation-dominated interfacial properties. *Water Research*, **2021**, 202, 117461	12.5	11
190	Optimizing granular anammox retention via hydrocycloning during two-stage deammonification of high-solid sludge anaerobic digester supernatant. *Science of the Total Environment*, **2021**, 791, 148048	10.2	0
189	Sustainable disposal of excess sludge: Post-thermal hydrolysis for anaerobically digested sludge. *Journal of Cleaner Production*, **2021**, 321, 128893	10.3	5
188	Coconut shell ash enhances short-chain fatty acids production from anaerobic algae fermentation. *Bioresource Technology*, **2021**, 338, 125494	11	6
187	A novel thermal pretreatment method called air frying improves the enzymatic saccharification effect of straw. *Science of the Total Environment*, **2021**, 790, 148191	10.2	0
186	Enhanced depletion of antibiotics and accelerated estabilization of dissolved organic matter by hydrothermal pretreatment during composting of oxytetracycline fermentation residue. *Bioresource Technology*, **2021**, 339, 125618	11	0
185	The evaluation of GHG emissions from Shanghai municipal wastewater treatment plants based on IPCC and operational data integrated methods (ODIM). *Science of the Total Environment*, **2021**, 797, 148967	10.2	3
184	A review on application of single and composite conductive additives for anaerobic digestion: Advances, challenges and prospects. *Resources, Conservation and Recycling*, **2021**, 174, 105844	11.9	8
183	Aging microplastics in wastewater pipeline networks and treatment processes: Physicochemical characteristics and Cd adsorption. *Science of the Total Environment*, **2021**, 797, 148940	10.2	4
182	Enhanced sludge dewaterability via ozonation catalyzed by sludge derived biochar loaded with MnFe2O4: Performance and mechanism investigation. *Journal of Cleaner Production*, **2021**, 323, 129182	10.3	4
181	Removal of personal care products in greywater using membrane bioreactor and constructed wetland methods. *Science of the Total Environment*, **2021**, 797, 148773	10.2	5
180	Secondary acidogenic fermentation of waste activated sludge via voltage supplementation: Insights from sludge structure and enzymes activity. *Science of the Total Environment*, **2021**, 797, 149161	10.2	4

179	Enhancement of sludge dewaterability via the thermal hydrolysis anaerobic digestion mechanism based on moisture and organic matter interactions. *Science of the Total Environment*, **2021**, 798, 149229	10.2	3
178	Variations of heavy metals, nutrients, POPs and particle size distribution during "sludge anaerobic digestion-solar drying-land utilization process": Case study in China. *Science of the Total Environment*, **2021**, 801, 149609	10.2	5
177	Medium-Chain fatty acids and long-chain alcohols production from waste activated sludge via two-stage anaerobic fermentation. *Water Research*, **2020**, 186, 116381	12.5	27
176	Dosing effect of nano zero valent iron (NZVI) on the dark hydrogen fermentation performance via lake algae and food waste co-digestion. *Energy Reports*, **2020**, 6, 3192-3199	4.6	6
175	Transcriptomics Uncovers the Response of Anammox Bacteria to Dissolved Oxygen Inhibition and the Subsequent Recovery Mechanism. *Environmental Science & Technology*, **2020**, 54, 14674-14685	10.3	7
174	The release of organic matter, nitrogen, phosphorus and heavy metals from erythromycin fermentation residue under heat-activated persulfate oxidation conditioning. *Science of the Total Environment*, **2020**, 724, 138349	10.2	5
173	Impact of application of heat-activated persulfate oxidation treated erythromycin fermentation residue as a soil amendment: Soil chemical properties and antibiotic resistance. *Science of the Total Environment*, **2020**, 736, 139668	10.2	13
172	Critical review on dewatering of sewage sludge: Influential mechanism, conditioning technologies and implications to sludge re-utilizations. *Water Research*, **2020**, 180, 115912	12.5	144
171	Coupling self-sustaining air flotation screening with conventional CSTR enhances anaerobic biodegradability of corn stover. *Bioresource Technology*, **2020**, 310, 123417	11	3
170	Integrated anaerobic digestion and CO2 sequestration for energy recovery from waste activated sludge by calcium addition: Timing matters. *Energy*, **2020**, 199, 117421	7.9	7
169	Preparation of activated sewage sludge char for low temperature De-NO and its CO emission inhibition. *Chemosphere*, **2020**, 251, 126330	8.4	3
168	Full-scale semi-centralized wastewater treatment facilities for resource recovery: operation, problems and resolutions. *Water Science and Technology*, **2020**, 82, 303-314	2.2	5
167	Biomethane production by typical straw anaerobic digestion: Deep insights of material compositions and surface properties. *Bioresource Technology*, **2020**, 313, 123643	11	18
166	Humification in extracellular polymeric substances (EPS) dominates methane release and EPS reconstruction during the sludge stabilization of high-solid anaerobic digestion. *Water Research*, **2020**, 175, 115686	12.5	34
165	Partial nitritation with aerobic duration control of carbon-captured blackwater: Process operation and model-based evaluation. *Chemical Engineering Journal*, **2020**, 401, 126060	14.7	9
164	Interfacial interaction between micro/nanoplastics and typical PPCPs and nanoplastics removal via electrosorption from an aqueous solution. *Water Research*, **2020**, 184, 116100	12.5	38
163	Operation of pilot-scale nitrification-anammox reactors for the treatment of reject-water produced from the anaerobic digestion of thermal hydrolysis-treated sludge. *Bioresource Technology*, **2020**, 314, 123717	11	13
162	Effect of nitrite addition on the two-phase anaerobic digestion of waste activated sludge: Optimization of the acidogenic phase and influence mechanisms. *Environmental Pollution*, **2020**, 261, 114085	9.3	9

161	Alkaline-thermally treated penicillin V mycelial residue amendment improved the soil properties without triggering antibiotic resistance. *Waste Management*, **2020**, 105, 248-255	8.6	9
160	Micron-sized silica particles in wastewater influenced the distribution of organic matters in sludge and their anaerobic degradation. *Journal of Hazardous Materials*, **2020**, 393, 122340	12.8	7
159	New insights into the effect of sludge proteins on the hydrophilic/hydrophobic properties that improve sludge dewaterability during anaerobic digestion. *Water Research*, **2020**, 173, 115503	12.5	28
158	Zinc Spinel Ferrite Nanoparticles as a Pseudocapacitive Electrode with Ultrahigh Desalination Capacity and Long-Term Stability. *Environmental Science and Technology Letters*, **2020**, 7, 118-125	11	21
157	The transformation of phosphorus fractions in high-solid sludge by anaerobic digestion combined with the high temperature thermal hydrolysis process. *Bioresource Technology*, **2020**, 309, 123314	11	4
156	Deciphering color for comprehensive utilization of sludge. *Resources, Conservation and Recycling*, **2020**, 153, 104579	11.9	1
155	Free-standing Ti3C2Tx MXene film as binder-free electrode in capacitive deionization with an ultrahigh desalination capacity. *Chemical Engineering Journal*, **2020**, 384, 123329	14.7	79
154	Impact of roxithromycin on waste activated sludge anaerobic digestion: Methane production, carbon transformation and antibiotic resistance genes. *Science of the Total Environment*, **2020**, 703, 134899	10.2	40
153	Sludge age impacted the distribution, occurrence state and structure of organic compounds in activated sludge and affected the anaerobic degradability. *Chemical Engineering Journal*, **2020**, 384, 123261	14.7	13
152	Dosage effects of lincomycin mycelial residues on lincomycin resistance genes and soil microbial communities. *Environmental Pollution*, **2020**, 256, 113392	9.3	13
151	Metagenomic characterization of the enhanced performance of anaerobic fermentation of waste activated sludge with CaO addition at ambient temperature: Fatty acid biosynthesis metabolic pathway and CAZymes. *Water Research*, **2020**, 170, 115309	12.5	38
150	Effects of chemical pretreatments on microplastic extraction in sewage sludge and their physicochemical characteristics. *Water Research*, **2020**, 171, 115379	12.5	45
149	New insight into the effect of thermal hydrolysis on high solid sludge anaerobic digestion: Conversion pathway of volatile sulphur compounds. *Chemosphere*, **2020**, 244, 125466	8.4	11
148	Effects of humic matter on the anaerobic digestion of sewage sludge: New insights from sludge structure. *Chemosphere*, **2020**, 243, 125421	8.4	13
147	Perspective on enhancing the anaerobic digestion of waste activated sludge. *Journal of Hazardous Materials*, **2020**, 389, 121847	12.8	72
146	Alkaline-thermal pretreatment of spectinomycin mycelial residues: Insights on anaerobic biodegradability and the fate of antibiotic resistance genes. *Chemosphere*, **2020**, 261, 127821	8.4	8
145	New insight into volatile sulfur compounds conversion in anaerobic digestion of excess sludge: Influence of free ammonia nitrogen and thermal hydrolysis pretreatment. *Journal of Cleaner Production*, **2020**, 277, 123366	10.3	7
144	Composting of oxytetracycline fermentation residue in combination with hydrothermal pretreatment for reducing antibiotic resistance genes enrichment. *Bioresource Technology*, **2020**, 318, 124271	11	6

143	Improving the treatment of waste activated sludge using calcium peroxide. *Water Research*, **2020**, 187, 116440	12.5	48
142	An overview of removing heavy metals from sewage sludge: Achievements and perspectives. *Environmental Pollution*, **2020**, 266, 115375	9.3	35
141	Evaluation of Biogas Performance and Process Stability from Food, Kitchen, and Fruit/Vegetable Waste by Mono-, Co-, and Tridigestion. *Energy & Fuels*, **2020**, 34, 12734-12742	4.1	6
140	The potential exposure and transmission risk of SARS-CoV-2 through sludge treatment and disposal. *Resources, Conservation and Recycling*, **2020**, 162, 105043	11.9	18
139	Ferrate effectively removes antibiotic resistance genes from wastewater through combined effect of microbial DNA damage and coagulation. *Water Research*, **2020**, 185, 116273	12.5	21
138	Organic compounds evolution and sludge properties variation along partial nitritation and subsequent anammox processes treating reject water. *Water Research*, **2020**, 184, 116197	12.5	32
137	Enhancing acidogenic fermentation of waste activated sludge via isoelectric-point pretreatment: Insights from physical structure and interfacial thermodynamics. *Water Research*, **2020**, 185, 116237	12.5	19
136	Anaerobic digestion of spectinomycin mycelial residues pretreated by thermal hydrolysis: removal of spectinomycin and enhancement of biogas production. *Environmental Science and Pollution Research*, **2020**, 27, 39297-39307	5.1	3
135	Hydrothermal treatment of erythromycin fermentation residue: Harmless performance and bioresource properties. *Resources, Conservation and Recycling*, **2020**, 161, 104952	11.9	16
134	Microplastics Mitigation in Sewage Sludge through Pyrolysis: The Role of Pyrolysis Temperature. *Environmental Science and Technology Letters*, **2020**, 7, 961-967	11	23
133	Evaluation the impact of polystyrene micro and nanoplastics on the methane generation by anaerobic digestion. *Ecotoxicology and Environmental Safety*, **2020**, 205, 111095	7	18
132	Combining Battery-Type and Pseudocapacitive Charge Storage in Ag/TiCT MXene Electrode for Capturing Chloride Ions with High Capacitance and Fast Ion Transport. *Advanced Science*, **2020**, 7, 2000621	13.6	32
131	Integrating multi-state and multi-phase treatment for anaerobic sludge digestion to enhance recovery of bio-energy. *Science of the Total Environment*, **2020**, 698, 134196	10.2	13
130	Simultaneous in situ nutrient recovery and sustainable wastewater purification based on metal anion- and cation-targeted selective adsorbents. *Journal of Hazardous Materials*, **2020**, 382, 121039	12.8	13
129	Rapid and strong biocidal effect of ferrate on sulfidogenic and methanogenic sewer biofilms. *Water Research*, **2020**, 169, 115208	12.5	20
128	Sludge-to-energy approaches based on pathways that couple pyrolysis with anaerobic digestion (thermal hydrolysis pre/post-treatment): Energy efficiency assessment and pyrolysis kinetics analysis. *Energy*, **2020**, 190, 116240	7.9	10
127	Unveiling the mechanisms of medium-chain fatty acid production from waste activated sludge alkaline fermentation liquor through physiological, thermodynamic and metagenomic investigations. *Water Research*, **2020**, 169, 115218	12.5	46
126	Coadsorption behavior and mechanism of ciprofloxacin and Cu(II) on graphene hydrogel wetted surface. *Chemical Engineering Journal*, **2020**, 380, 122387	14.7	40

125	Particle size reduction of rice straw enhances methane production under anaerobic digestion. *Bioresource Technology*, **2019**, 293, 122043	11	25
124	Pretreatment-promoted sludge fermentation liquor improves biological nitrogen removal: Molecular insight into the role of dissolved organic matter. *Bioresource Technology*, **2019**, 293, 122082	11	17
123	Variations of physical and chemical properties in relation to erythromycin mycelial dreg dewaterability under heat-activated persulfate oxidation conditioning. *Science of the Total Environment*, **2019**, 687, 2-9	10.2	6
122	Persulfate and zero valent iron combined conditioning as a sustainable technique for enhancing dewaterability of aerobically digested sludge. *Chemosphere*, **2019**, 232, 45-53	8.4	29
121	Effects of thermal hydrolysis on the metabolism of amino acids in sewage sludge in anaerobic digestion. *Waste Management*, **2019**, 88, 309-318	8.6	45
120	Post-thermal hydrolysis and centrate recirculation for enhancing anaerobic digestion of sewage sludge. *Waste Management*, **2019**, 92, 39-48	8.6	29
119	Characterizing the sludge moisture distribution during anaerobic digestion process through various approaches. *Science of the Total Environment*, **2019**, 675, 184-191	10.2	12
118	Mechanism analysis to improve sludge dewaterability during anaerobic digestion based on moisture distribution. *Chemosphere*, **2019**, 227, 247-255	8.4	15
117	Effects of NaCl and phenol on anammox performance in mainstream reactors with low nitrogen concentration and low temperature. *Biochemical Engineering Journal*, **2019**, 147, 72-80	4.2	11
116	Enhancement in adsorption potential of microplastics in sewage sludge for metal pollutants after the wastewater treatment process. *Water Research*, **2019**, 157, 228-237	12.5	120
115	Mesoporous amorphous FePO4 nanosphere@Graphene as a faradic electrode in capacitive deionization for high-capacity and fast removal of NaCl from water. *Chemical Engineering Journal*, **2019**, 370, 938-943	14.7	55
114	Unraveling the water states of waste-activated sludge through transverse spin-spin relaxation time of low-field NMR. *Water Research*, **2019**, 155, 266-274	12.5	22
113	The inhibitory impacts of nano-graphene oxide on methane production from waste activated sludge in anaerobic digestion. *Science of the Total Environment*, **2019**, 646, 1376-1384	10.2	41
112	Multiple selection of resistance genes in arable soil amended with cephalosporin fermentation residue. *Soil Biology and Biochemistry*, **2019**, 136, 107538	7.5	15
111	Carrageenan/Sodium alginate double-network hydrogel with enhanced mechanical properties, anti-swelling, and adsorption capacity. *Chemosphere*, **2019**, 237, 124417	8.4	37
110	Revealing the Mechanisms of Polyethylene Microplastics Affecting Anaerobic Digestion of Waste Activated Sludge. *Environmental Science & Technology*, **2019**, 53, 9604-9613	10.3	93
109	Effect of temperature on tertiary nitrogen removal from municipal wastewater in a PHBV/PLA-supported denitrification system. *Environmental Science and Pollution Research*, **2019**, 26, 26893-26899	5.1	14
108	Modelling of simultaneous nitrogen and thiocyanate removal through coupling thiocyanate-based denitrification with anaerobic ammonium oxidation. *Environmental Pollution*, **2019**, 253, 974-980	9.3	1

107	Effects of stepwise thermal hydrolysis and solid-liquid separation on three different sludge organic matter solubilization and biodegradability. *Bioresource Technology*, **2019**, 290, 121753	11	15
106	Nano-/Micro-confined Water in Graphene Hydrogel as Superadsorbents for Water Purification. *Nano-Micro Letters*, **2019**, 12, 2	19.5	20
105	Effects of free nitrous acid and nitrite on two-phase anaerobic digestion of waste activated sludge: A preliminary study. *Science of the Total Environment*, **2019**, 654, 1064-1071	10.2	15
104	Microplastics in wastewater treatment plants: Detection, occurrence and removal. *Water Research*, **2019**, 152, 21-37	12.5	531
103	Nitrogen transformation during pyrolysis of oilfield sludge with high polymer content. *Chemosphere*, **2019**, 219, 383-389	8.4	24
102	Designing an in situ remediation strategy for polluted surface water bodies through the specific regulation of microbial community. *Frontiers of Environmental Science and Engineering*, **2019**, 13, 1	5.8	2
101	Effects of temperature variation on wastewater sludge electro-dewatering. *Journal of Cleaner Production*, **2019**, 214, 873-880	10.3	27
100	Effect of different carbon sources on denitrification performance, microbial community structure and denitrification genes. *Science of the Total Environment*, **2018**, 634, 195-204	10.2	113
99	Kinetic assessment of simultaneous removal of arsenite, chlorate and nitrate under autotrophic and mixotrophic conditions. *Science of the Total Environment*, **2018**, 628-629, 85-93	10.2	5
98	PHBV polymer supported denitrification system efficiently treated high nitrate concentration wastewater: Denitrification performance, microbial community structure evolution and key denitrifying bacteria. *Chemosphere*, **2018**, 197, 96-104	8.4	37
97	Model-based assessment of estrogen removal by nitrifying activated sludge. *Chemosphere*, **2018**, 197, 430-437	8.4	11
96	Enhanced dewaterability of sludge during anaerobic digestion with thermal hydrolysis pretreatment: New insights through structure evolution. *Water Research*, **2018**, 131, 177-185	12.5	65
95	Development of polymeric iron/zirconium-pillared clinoptilolite for simultaneous removal of multiple inorganic contaminants from wastewater. *Chemical Engineering Journal*, **2018**, 347, 819-827	14.7	14
94	Two-phase high solid anaerobic digestion with dewatered sludge: Improved volatile solid degradation and specific methane generation by temperature and pH regulation. *Bioresource Technology*, **2018**, 259, 253-258	11	28
93	Development of sludge-derived mesoporous material with loaded nano CaO2 and doped Fe for re-utilization of dewatered waste-activated sludge as dewatering aids. *Chemical Engineering Journal*, **2018**, 335, 161-168	14.7	15
92	Comparing two start up strategies and the effect of temperature fluctuations on the performance of mainstream anammox reactors. *Chemosphere*, **2018**, 209, 632-639	8.4	20
91	Free-conditioning dewatering of sewage sludge through in situ propane hydrate formation. *Water Research*, **2018**, 145, 464-472	12.5	10
90	Mechanism insights into bio-floc bound water transformation based on synchrotron X-ray computed microtomography and viscoelastic acoustic response analysis. *Water Research*, **2018**, 142, 480-489	12.5	23

89	New insights into the enhanced performance of high solid anaerobic digestion with dewatered sludge by thermal hydrolysis: Organic matter degradation and methanogenic pathways. *Journal of Hazardous Materials*, **2018**, 342, 1-9	12.8	72
88	Reforming sewage sludge pyrolysis volatile with Fe-embedded char: Minimization of liquid product yield. *Waste Management*, **2018**, 73, 464-475	8.6	31
87	Rotating Magnetic Field-Assisted Adsorption Mechanism of Pollutants on Mechanically Strong Sodium Alginate/Graphene/l-Cysteine Beads in Batch and Fixed-Bed Column Systems. *Environmental Science & Technology*, **2018**, 52, 13925-13934	10.3	41
86	Molecular characteristics of the refractory organic matter in the anaerobic and aerobic digestates of sewage sludge.. *RSC Advances*, **2018**, 8, 33138-33148	3.7	5
85	Enhancing Anaerobic Digestion of Waste Activated Sludge by Solid□liquid Separation via Isoelectric Point Pretreatment. *ACS Sustainable Chemistry and Engineering*, **2018**, 6, 14774-14784	8.3	16
84	Spatial Configuration of Extracellular Organic Substances Responsible for the Biogas Conversion of Sewage Sludge. *ACS Sustainable Chemistry and Engineering*, **2018**, 6, 8308-8316	8.3	22
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