Michael E Kornaros

List of Publications by Year in descending order

Source: https://exaly.com/author-pdf/809447/publications.pdf

Version: 2024-02-01

128 papers 6,262 citations

66343 42 h-index 76900 74 g-index

132 all docs

132 docs citations

times ranked

132

6183 citing authors

#	Article	IF	CITATIONS
1	The utilization of leaf-based adsorbents for dyes removal: A review. Journal of Molecular Liquids, 2019, 276, 728-747.	4.9	312
2	Degradation of conventional plastic wastes in the environment: A review on current status of knowledge and future perspectives of disposal. Science of the Total Environment, 2021, 771, 144719.	8.0	258
3	Biological treatment of wastewaters from a dye manufacturing company using a trickling filter. Journal of Hazardous Materials, 2006, 136, 95-102.	12.4	242
4	Using cheese whey for hydrogen and methane generation in a two-stage continuous process with alternative pH controlling approaches. Bioresource Technology, 2009, 100, 3713-3717.	9.6	228
5	Purification of olive mill wastewater phenols through membrane filtration and resin adsorption/desorption. Journal of Hazardous Materials, 2015, 285, 69-76.	12.4	209
6	Removal of phenolics in olive mill wastewaters using the white-rot fungus Pleurotus ostreatus. Water Research, 2002, 36, 4735-4744.	11.3	187
7	On the occasional biodegradation of pharmaceuticals in the activated sludge process: The example of the antibiotic sulfamethoxazole. Journal of Hazardous Materials, 2005, 122, 259-265.	12.4	183
8	Plastic wastes biodegradation: Mechanisms, challenges and future prospects. Science of the Total Environment, 2021, 780, 146590.	8.0	173
9	Biohydrogen and Methane Production from Cheese Whey in a Two-Stage Anaerobic Process. Industrial & Engineering Chemistry Research, 2008, 47, 5227-5233.	3.7	158
10	Exploitation of olive oil mill wastewater for combined biohydrogen and biopolymers production. Bioresource Technology, 2009, 100, 3724-3730.	9.6	157
11	Hydrogen production from sugars and sweet sorghum biomass using Ruminococcus albus. International Journal of Hydrogen Energy, 2008, 33, 1153-1163.	7.1	154
12	Partial Nitrification/Denitrification Can Be Attributed to the Slow Response of Nitrite Oxidizing Bacteria to Periodic Anoxic Disturbances. Environmental Science & Environmental Science & 2010, 44, 7245-7253.	10.0	154
13	A review on halloysite-based adsorbents to remove pollutants in water and wastewater. Journal of Molecular Liquids, 2018, 269, 855-868.	4.9	150
14	Sequential cultivation of microalgae in raw and recycled dairy wastewater: Microalgal growth, wastewater treatment and biochemical composition. Bioresource Technology, 2019, 273, 556-564.	9.6	148
15	Bio-Based Products from Microalgae Cultivated in Digestates. Trends in Biotechnology, 2018, 36, 819-833.	9.3	138
16	Effect of hydraulic retention time (HRT) on the anaerobic co-digestion of agro-industrial wastes in a two-stage CSTR system. Bioresource Technology, 2014, 167, 407-415.	9.6	129
17	Aloe vera waste biomass-based adsorbents for the removal of aquatic pollutants: A review. Journal of Environmental Management, 2018, 227, 354-364.	7.8	110
18	Effect of pH on the anaerobic acidogenesis of agroindustrial wastewaters for maximization of bio-hydrogen production: A lab-scale evaluation using batch tests. Bioresource Technology, 2014, 162, 218-227.	9.6	104

#	Article	IF	CITATIONS
19	Effect of nitrogen concentration on the growth rate and biochemical composition of the microalga, Isochrysis galbana. Egyptian Journal of Aquatic Research, 2020, 46, 153-158.	2.2	100
20	Olive oil mill wastewater toxicity in the marine environment: Alterations of stress indices in tissues of mussel Mytilus galloprovincialis. Aquatic Toxicology, 2011, 101, 358-366.	4.0	98
21	Optimization of thermo-chemical hydrolysis of kitchen wastes. Waste Management, 2013, 33, 740-745.	7.4	98
22	Investigation on the feasibility of Chlorella vulgaris cultivation in a mixture of pulp and aquaculture effluents: Treatment of wastewater and lipid extraction. Bioresource Technology, 2018, 255, 104-110.	9.6	95
23	Nanobiotechnological advancements in agriculture and food industry: Applications, nanotoxicity, and future perspectives. Science of the Total Environment, 2021, 792, 148359.	8.0	92
24	Anaerobic mesophilic co-digestion of ensiled sorghum, cheese whey and liquid cow manure in a two-stage CSTR system: Effect of hydraulic retention time. Bioresource Technology, 2015, 175, 553-562.	9.6	90
25	Effect of pH on growth and lipid accumulation kinetics of the microalga Chlorella vulgaris grown heterotrophically under sulfur limitation. Bioresource Technology, 2016, 219, 694-701.	9.6	87
26	Biogas production from anaerobic co-digestion of agroindustrial wastewaters under mesophilic conditions in a two-stage process. Desalination, 2009, 248, 891-906.	8.2	80
27	Valorizing lignin-like dyes and textile dyeing wastewater by a newly constructed lipid-producing and lignin modifying oleaginous yeast consortium valued for biodiesel and bioremediation. Journal of Hazardous Materials, 2021, 403, 123575.	12.4	65
28	Optimization of thermo-chemical pretreatment and enzymatic hydrolysis of kitchen wastes. Waste Management, 2014, 34, 167-173.	7.4	64
29	Chlorella vulgaris as a green biofuel factory: Comparison between biodiesel, biogas and combustible biomass production. Bioresource Technology, 2019, 273, 237-243.	9.6	63
30	Agricultural and livestock sector's residues in Greece & Dina: Comparative qualitative and quantitative characterization for assessing their potential for biogas production. Renewable and Sustainable Energy Reviews, 2022, 154, 111821.	16.4	62
31	Kinetic modelling of pseudomonas denitrificans growth and denitrification under aerobic, anoxic and transient operating conditions. Water Research, 1998, 32, 1912-1922.	11.3	61
32	Polyhydroxyalkanoates from Pseudomonas sp. using synthetic and olive mill wastewater under limiting conditions. International Journal of Biological Macromolecules, 2015, 74, 202-210.	7.5	60
33	Kinetic modeling of a mixed culture of Pseudomonas Denitrificans and Bacillus subtilis under aerobic and anoxic operating conditions. Water Research, 2003, 37, 1239-1251.	11.3	59
34	Exploitation of olive mill wastewater and liquid cow manure for biogas production. Waste Management, 2010, 30, 1841-1848.	7.4	57
35	Coupling azo dye degradation and biodiesel production by manganese-dependent peroxidase producing oleaginous yeasts isolated from wood-feeding termite gut symbionts. Biotechnology for Biofuels, 2021, 14, 61.	6.2	56
36	Kinetics of denitrification by Pseudomonas denitrificans under growth conditions limited by carbon and/or nitrate or nitrite. Water Environment Research, 1996, 68, 934-945.	2.7	55

#	Article	IF	Citations
37	Impacts of a marine fish farm in Argolikos Gulf (Greece) on the water column and the sediment. Desalination, 2007, 210, 110-124.	8.2	51
38	On the fate of LAS, NPEOs and DEHP in municipal sewage sludge during composting. Bioresource Technology, 2009, 100, 1634-1642.	9.6	51
39	Construction of novel microbial consortia CS-5 and BC-4 valued for the degradation of catalpa sawdust and chlorophenols simultaneously with enhancing methane production. Bioresource Technology, 2020, 301, 122720.	9.6	50
40	\hat{l}^2 -Carotene Production and Its Role in Sclerotial Differentiation of Sclerotium rolfsii. Fungal Genetics and Biology, 2001, 34, 11-20.	2.1	47
41	Enhanced anaerobic digestion performance by two artificially constructed microbial consortia capable of woody biomass degradation and chlorophenols detoxification. Journal of Hazardous Materials, 2020, 389, 122076.	12.4	47
42	Assessing the potential of Chlorella vulgaris for valorization of liquid digestates from agro-industrial and municipal organic wastes in a biorefinery approach. Journal of Cleaner Production, 2021, 280, 124352.	9.3	45
43	Kinetics of growth and lipids accumulation in Chlorella vulgaris during batch heterotrophic cultivation: Effect of different nutrient limitation strategies. Bioresource Technology, 2017, 243, 356-365.	9.6	44
44	Selection of microalgae intended for valorization of digestate from agro-waste mixtures. Waste Management, 2018, 73, 123-129.	7.4	43
45	Used disposable nappies and expired food products valorisation through one- & two-stage anaerobic co-digestion. Renewable Energy, 2020, 147, 610-619.	8.9	43
46	Biopolymers production from microalgae and cyanobacteria cultivated in wastewater: Recent advances. Biotechnology Advances, 2022, 60, 107999.	11.7	40
47	Clay minerals used in sanitary landfills for the retention of organic and inorganic pollutants. Applied Clay Science, 2010, 49, 372-382.	5.2	38
48	Illegal trawling and induced invasive algal spread as collaborative factors in a Posidonia oceanica meadow degradation. Biological Invasions, 2011, 13, 669-678.	2.4	38
49	Gateâ€toâ€gate life cycle assessment of biosurfactants and bioplasticizers production via biotechnological exploitation of fats and waste oils. Journal of Chemical Technology and Biotechnology, 2018, 93, 2833-2841.	3.2	36
50	Pretreatment of azo dyes using ozone. Water Science and Technology, 1997, 36, 155.	2.5	35
51	Matrix effect during the application of a rapid method using HS-SPME followed by GC–ECD for the analysis of 2,4,6-TCA in wine and cork soaks. Food Chemistry, 2007, 105, 681-690.	8.2	34
52	Microalgal post-treatment of anaerobically digested agro-industrial wastes for nutrient removal and lipids production. Bioresource Technology, 2017, 224, 473-480.	9.6	34
53	Kinetic modelling of biological phosphorus removal with a pure culture of Acinetobacter sp. under aerobic, anaerobic and transient operating conditions. Water Research, 1999, 33, 2769-2788.	11.3	32
54	Effect of pH on Continuous Biohydrogen Production from End-of-Life Dairy Products (EoL-DPs) via Dark Fermentation. Waste and Biomass Valorization, 2016, 7, 753-764.	3.4	31

#	Article	IF	CITATIONS
55	Valorisation of wastepaper using the fibrolytic/hydrogen producing bacterium Ruminococcus albus. Bioresource Technology, 2009, 100, 5928-5933.	9.6	30
56	Artificial neural network (ANN) approach to optimize cultivation conditions of microalga Chlorella vulgaris in view of biodiesel production. Biochemical Engineering Journal, 2021, 173, 108072.	3.6	29
57	Olive Mill Wastewater (OMW) Polyphenols Adsorption onto Polymeric Resins: Part I—Batch Anaerobic Digestion of OMW. Waste and Biomass Valorization, 2021, 12, 2271-2281.	3.4	28
58	Two-stage anaerobic digestion harnesses more energy from the co-digestion of end-of-life dairy products with agro-industrial waste compared to the single-stage process. Biochemical Engineering Journal, 2020, 153, 107404.	3.6	27
59	A pilot scale study of a sequencing batch reactor treating municipal wastewater operated via the UP-PND process. Water Science and Technology, 2008, 58, 435-438.	2.5	26
60	Biodegradation of creosote-treated wood by two novel constructed microbial consortia for the enhancement of methane production. Bioresource Technology, 2021, 323, 124544.	9.6	26
61	Kinetics of aerobic growth of a denitrifying bacterium, Pseudomonas denitrificans, in the presence of nitrates and/or nitrites. Water Research, 1997, 31, 479-488.	11.3	25
62	Production of PHAs from mixed and pure cultures of Pseudomonas sp. using short-chain fatty acids as carbon source under nitrogen limitation. Desalination, 2009, 248, 723-732.	8.2	25
63	Biodegradation of olive mill wastewater phenolic compounds in a thermophilic anaerobic upflow packed bed reactor and assessment of their toxicity in digester effluents. Journal of Environmental Management, 2020, 255, 109882.	7.8	25
64	Construction of a novel microbial consortium valued for the effective degradation and detoxification of creosote-treated sawdust along with enhanced methane production. Journal of Hazardous Materials, 2021, 418, 126091.	12.4	25
65	Utilization of the microalga Scenedesmus quadricauda for hexavalent chromium bioremediation and biodiesel production. Bioresource Technology, 2022, 346, 126665.	9.6	25
66	Investigation of olive mill wastewater (OMW) ozonation efficiency with the use of a battery of selected ecotoxicity and human toxicity assays. Aquatic Toxicology, 2015, 164, 135-144.	4.0	23
67	Effect of pH on the Anaerobic Fermentation of Fruit/Vegetables and Disposable Nappies Hydrolysate for Bio-hydrogen Production. Waste and Biomass Valorization, 2020, 11, 539-551.	3.4	23
68	Adaptive optimization of a nitrifying sequencing batch reactor. Water Research, 1999, 33, 3569-3576.	11.3	22
69	Wastewater-based microalgal biorefineries for the production of astaxanthin and co-products: Current status, challenges and future perspectives. Bioresource Technology, 2021, 342, 126018.	9.6	22
70	Molecular characterization of virulence and drug resistance genes-producing Escherichia coli isolated from chicken meat: Metal oxide nanoparticles as novel antibacterial agents. Microbial Pathogenesis, 2020, 143, 104164.	2.9	21
71	Wood-feeding termite gut symbionts as an obscure yet promising source of novel manganese peroxidase-producing oleaginous yeasts intended for azo dye decolorization and biodiesel production. Biotechnology for Biofuels, 2021, 14, 229.	6.2	21
72	Inoculum origin and waste solid content influence the biochemical methane potential of olive mill wastewater under mesophilic and thermophilic conditions. Biochemical Engineering Journal, 2019, 151, 107301.	3.6	20

#	Article	IF	CITATIONS
73	Biodegradation of Polyphenolic Compounds from Olive Mill Wastewaters (OMW) During Two-Stage Anaerobic Co-digestion of Agro-industrial Mixtures. Waste and Biomass Valorization, 2020, 11 , 5783-5791.	3.4	20
74	Pretreatment of used disposable nappies: Super absorbent polymer deswelling. Waste Management, 2020, 112, 20-29.	7.4	19
75	Polymeric Nanoparticles of Pistacia lentiscus var. chia Essential Oil for Cutaneous Applications. Pharmaceutics, 2020, 12, 353.	4.5	18
76	Total Phenolic Content, Biomass Composition, and Antioxidant Activity of Selected Marine Microalgal Species with Potential as Aquaculture Feed. Antioxidants, 2022, 11, 1320.	5.1	18
77	Anaerobic co-digestion of End-of-Life dairy products with agroindustrial wastes in a mesophilic pilot-scale two-stage system: Assessment of system's performance. Energy Conversion and Management, 2018, 165, 851-860.	9.2	17
78	Assessment of Single- vs. Two-Stage Process for the Anaerobic Digestion of Liquid Cow Manure and Cheese Whey. Energies, 2021, 14, 5423.	3.1	17
79	A nappies management by-product for the treatment of uranium-contaminated waters. Journal of Hazardous Materials, 2021, 404, 124147.	12.4	16
80	Biochemical \hat{l} $\hat{\omega}$ ethane potential of most promising agricultural residues in Northern and Southern Greece. Chemosphere, 2022, 296, 133985.	8.2	16
81	Development and evaluation of alternative processes for sterilization and deodorization of cork barks and natural cork stoppers. European Food Research and Technology, 2007, 225, 653-663.	3.3	15
82	Effect of organic carbon and nutrient supplementation on the digestate-grown microalga, Parachlorella kessleri. Bioresource Technology, 2019, 294, 122232.	9.6	15
83	Composting of anaerobic sludge from the co-digestion of used disposable nappies and expired food products. Waste Management, 2020, 118, 655-666.	7.4	15
84	Dark Fermentation of Sweet Sorghum Stalks, Cheese Whey and Cow Manure Mixture: Effect of pH, Pretreatment and Organic Load. Processes, 2021, 9, 1017.	2.8	15
85	Impact of five selected xenobiotics on isolated ammonium oxidizers and on nitrifying activated sludge. Environmental Toxicology, 2006, 21, 310-316.	4.0	14
86	Expired food products and used disposable adult nappies mesophilic anaerobic co-digestion: Biochemical methane potential, feedstock pretreatment and two-stage system performance. Renewable Energy, 2021, 168, 309-318.	8.9	14
87	Development of a high-rate anaerobic thermophilic upflow packed bed reactor for efficient bioconversion of diluted three-phase olive mill wastewater into methane. Fuel, 2022, 310, 122263.	6.4	14
88	Biogas production from energy crops in northern Greece: economics of electricity generation associated with heat recovery in a greenhouse. Clean Technologies and Environmental Policy, 2017, 19, 1147-1167.	4.1	13
89	Thermophilic anaerobic digestion of olive mill wastewater in an upflow packed bed reactor: Evaluation of 16S rRNA amplicon sequencing for microbial analysis. Journal of Environmental Management, 2022, 301, 113853.	7.8	13
90	Ultrasound-Assisted Extraction of Nannochloropsis oculata with Ethanol and Betaine: 1,2-Propanediol Eutectic Solvent for Antioxidant Pigment-Rich Extracts Retaining Nutritious the Residual Biomass. Antioxidants, 2022, 11, 1103.	5.1	13

#	Article	IF	CITATIONS
91	Safe Recycling of Sewage Sludge on Agricultural Landâ€"Biowaste. Chemical Engineering Research and Design, 2006, 84, 253-257.	5.6	12
92	The application of pine-based adsorbents to remove potentially toxic elements from aqueous solutions. , 2021 , , $113-133$.		12
93	Effect of pH on the Economic Potential of Dark Fermentation Products from Used Disposable Nappies and Expired Food Products. Applied Sciences (Switzerland), 2021, 11, 4099.	2.5	12
94	Effect of wall growth on the kinetic modeling of nitrite oxidation in a CSTR. Biotechnology and Bioengineering, 2006, 93, 718-726.	3.3	11
95	Microalgae-based Remediation of Wastewaters. , 2020, , 317-335.		11
96	Treatment of dairy wastewater by microalgae Chlorella vulgaris for biofuels production. Biomass Conversion and Biorefinery, 2023, 13, 3259-3265.	4.6	11
97	Combined chemical and biological treatment of azo dye-containing wastewaters. Chemical Engineering Communications, 2003, 190, 645-661.	2.6	10
98	Evaluation of a battery of marine species-based bioassays against raw and treated municipal wastewaters. Journal of Hazardous Materials, 2017, 321, 537-546.	12.4	10
99	Performance evaluation of three mesophilic upflow anaerobic sludge blanket bioreactors treating olive mill wastewater: Flocculent and granular inocula tests, organic loading rate effect and anaerobic consortia structure. Fuel, 2022, 313, 122951.	6.4	10
100	Hydrogen and Methane Production from Anaerobic Co-Digestion of Sorghum and Cow Manure: Effect of pH and Hydraulic Retention Time. Fermentation, 2022, 8, 304.	3.0	9
101	The efficiency of microalgae-based remediation as a green process for industrial wastewater treatment. Algal Research, 2022, 66, 102775.	4.6	9
102	On the complete aerobic microbial mineralization of linear alkylbenzene sulfonate. Desalination, 2007, 215, 198-208.	8.2	8
103	Ozone pretreatment of olive mill wastewaters (OMW) and its effect on OMW biochemical methane potential (BMP). Water Science and Technology, 2013, 68, 2712-2717.	2.5	8
104	Calcium-modified clinoptilolite as a recovery medium of phosphate and potassium from anaerobically digested olive mill wastewater. Environmental Science and Pollution Research, 2020, 27, 2977-2991.	5.3	8
105	Microalgal Biorefinery. , 2020, , 163-185.		8
106	Assessment of substrate load and process pH for bioethanol production – Development of a kinetic model. Fuel, 2022, 313, 123007.	6.4	8
107	Kinetics of p-Aminoazobenzene Degradation by Bacillus subtilis Under Denitrifying Conditions. Water Environment Research, 1999, 71, 323-331.	2.7	7
108	Integrated Biorefinery Approach for the Valorization of Olive Mill Waste Streams Towards Sustainable Biofuels and Bio-Based Products., 2017,, 211-238.		7

#	Article	IF	Citations
109	Effects of Burkholderia thailandensis rhamnolipids on the unicellular algae Dunaliella tertiolecta. Ecotoxicology and Environmental Safety, 2019, 182, 109413.	6.0	7
110	Assessing the Economic Viability of an Animal Byproduct Rendering Plant: Case Study of a Slaughterhouse in Greece. Sustainability, 2020, 12, 5870.	3.2	7
111	Used disposable nappies and expired food products co-digestion: A pilot-scale system assessment. Renewable Energy, 2021, 165, 109-117.	8.9	7
112	Comparative Assessment of Nitrogen Concentration Effect on Microalgal Growth and Biochemical Characteristics of Two Chlorella Strains Cultivated in Digestate. Marine Drugs, 2022, 20, 415.	4.6	7
113	Life cycle assessment of the anaerobic co-digestion of used disposable nappies and expired food products. Journal of Cleaner Production, 2021, 304, 127118.	9.3	6
114	Recovery of Water from Secondary Effluent through Pilot Scale Ultrafiltration Membranes: Implementation at Patras' Wastewater Treatment Plant. Membranes, 2021, 11, 663.	3.0	6
115	Thermophilic Dark Fermentation of Olive Mill Wastewater in Batch Reactors: Effect of pH and Organic Loading. Applied Sciences (Switzerland), 2022, 12, 2881.	2.5	6
116	Bioactive compounds from microalgae cultivated in wastewaters. , 2022, , 177-202.		5
117	Phosphorus and potassium recovery from anaerobically digested olive mill wastewater using modified zeolite, fly ash and zeolitic fly ash: a comparative study. Journal of Chemical Technology and Biotechnology, 2022, 97, 1860-1873.	3.2	5
118	On the Impact of Land Application of Secondary Sludge. Water, Air and Soil Pollution, 2004, 4, 349-357.	0.8	4
119	Nonlinear Reduced-Order Observer Design for State and Disturbance Estimation. , 0, , .		4
120	Life cycle assessment (LCA) of endâ€ofâ€life dairy products (EoLâ€DPs) valorization via anaerobic coâ€digestion with agroâ€industrial wastes for biogas production. Journal of Chemical Technology and Biotechnology, 2019, 94, 3687-3697.	3.2	4
121	Dilute acid pretreatment of Hippophae rhamnoeides prunings towards their biotechnological exploitation through anaerobic digestion. Biomass Conversion and Biorefinery, 2022, 12, 4585-4597.	4.6	3
122	Used Disposable Nappies: environmental burden or resource for biofuel production and material recovery?. Resources, Conservation and Recycling, 2022, 185, 106493.	10.8	3
123	Sensitivity analysis of a biofilm model describing mixed growth of nitrite oxidisers in a CSTR. Water Science and Technology, 2006, 53, 313-320.	2.5	2
124	Multipurpose, Integrated 2nd Generation Biorefineries. BioMed Research International, 2016, 2016, 1-2.	1.9	2
125	Microalgae as a Renewable Resource for Bioplastic Production. Impact of Meat Consumption on Health and Environmental Sustainability, 2022, , 471-500.	0.4	2
126	Exploring the Potential of Algae in the Mitigation of Plastic Pollution in Aquatic Environments. Impact of Meat Consumption on Health and Environmental Sustainability, 2022, , 501-523.	0.4	2

#	#	Article	IF	CITATIONS
1	L 27	Polyhydroxyalkanoates (PHAs) Production From Microalgae Cultivated in Wastewater. Impact of Meat Consumption on Health and Environmental Sustainability, 2022, , 585-609.	0.4	2
1	128	Wastewater treatment coupled to algal biomass production. , 2022, , 203-230.		1