Idania Valdez-Vazquez

List of Publications by Year
in descending order

59 papers	2,149 citations	304602 22 h-index	233338 45 g-index
60 all docs	60 docs citations	60 times ranked	1919 citing authors

#	Article	IF	Citations
1	Hydrogen production by fermentative consortia. Renewable and Sustainable Energy Reviews, 2009, 13, 1000-1013.	8.2	312
2	Semi-continuous solid substrate anaerobic reactors for H production from organic waste: Mesophilic versus thermophilic regime. International Journal of Hydrogen Energy, 2005, 30, 1383-1391.	3.8	212
3	Stability problems in the hydrogen production by dark fermentation: Possible causes and solutions. Renewable and Sustainable Energy Reviews, 2020, 119, 109602.	8.2	137
4	Hydrogen generation via anaerobic fermentation of paper mill wastes. Bioresource Technology, 2005, 96, 1907-1913.	4.8	127
5	Distribution and potential of bioenergy resources from agricultural activities in Mexico. Renewable and Sustainable Energy Reviews, 2010, 14, 2147-2153.	8.2	93
6	Hydrogen and butanol production from native wheat straw by synthetic microbial consortia integrated by species of Enterococcus and Clostridium. Fuel, 2015, 159, 214-222.	3.4	86
7	Lactate- and acetate-based biohydrogen production through dark co-fermentation of tequila vinasse and nixtamalization wastewater: Metabolic and microbial community dynamics. Bioresource Technology, 2019, 282, 236-244.	4.8	72
8	A novel gas separation integrated membrane bioreactor to evaluate the impact of self-generated biogas recycling on continuous hydrogen fermentation. Applied Energy, 2017, 190, 813-823.	5.1	64
9	Sulfur-selective desulfurization of dibenzothiophene and diesel oil by newly isolatedRhodococcussp. strains. FEMS Microbiology Letters, 2002, 215, 157-161.	0.7	63
10	Improvement of Biohydrogen Production from Solid Wastes by Intermittent Venting and Gas Flushing of Batch Reactors Headspace. Environmental Science & Technology, 2006, 40, 3409-3415.	4.6	62
11	A review on the factors influencing biohydrogen production from lactate: The key to unlocking enhanced dark fermentative processes. Bioresource Technology, 2021, 324, 124595.	4.8	57
12	Alkalinity and high total solids affecting H2 production from organic solid waste by anaerobic consortia. International Journal of Hydrogen Energy, 2009, 34, 3639-3646.	3.8	55
13	Improvement of hydrogen production by reduction of the photosynthetic oxygen in microalgae cultures of Chlamydomonas gloeopara and Scenedesmus obliquus. International Journal of Hydrogen Energy, 2015, 40, 7291-7300.	3.8	51
14	Distinct effects of furfural, hydroxymethylfurfural and its mixtures on dark fermentation hydrogen production and microbial structure of a mixed culture. International Journal of Hydrogen Energy, 2019, 44, 2289-2297.	3.8	47
15	Wheat straw, corn stover, sugarcane, and Agave biomasses: chemical properties, availability, and cellulosicâ€bioethanol production potential in Mexico. Biofuels, Bioproducts and Biorefining, 2019, 13, 1143-1159.	1.9	47
16	Effect of inhibition treatment, type of inocula, and incubation temperature on batch H2 production from organic solid waste. Biotechnology and Bioengineering, 2006, 95, 342-349.	1.7	46
17	Intensified recovery of lipids, proteins, and carbohydrates from wastewater-grown microalgae Desmodesmus sp. by using ultrasound or ozone. Ultrasonics Sonochemistry, 2020, 62, 104852.	3.8	39
18	Enhanced hydrogen production from lignocellulosic substrates via bioaugmentation with Clostridium strains. Industrial Crops and Products, 2019, 137, 105-111.	2.5	33

#	Article	IF	Citations
19	A comparison of biological, enzymatic, chemical and hydrothermal pretreatments for producing biomethane from Agave bagasse. Industrial Crops and Products, 2020, 145, 112160.	2.5	32
20	Microscopic analysis of wheat straw cell wall degradation by microbial consortia for hydrogen production. International Journal of Hydrogen Energy, 2015, 40, 151-160.	3.8	31
21	History of adaptation determines shortâ€term shifts in performance and community structure of hydrogenâ€producing microbial communities degrading wheat straw. Microbial Biotechnology, 2017, 10, 1569-1580.	2.0	27
22	Ecological perspectives of hydrogen fermentation by microbial consortia: What we have learned and the way forward. International Journal of Hydrogen Energy, 2016, 41, 17297-17308.	3.8	24
23	An environment-economic analysis of hydrogen production using advanced biorefineries and its comparison with conventional technologies. International Journal of Hydrogen Energy, 2020, 45, 27994-28006.	3.8	24
24	Proposal for biorefineries based on mixed cultures for lignocellulosic biofuel production: a technoâ€economic analysis. Biofuels, Bioproducts and Biorefining, 2018, 12, 56-67.	1.9	23
25	Hydration treatments increase the biodegradability of native wheat straw for hydrogen production by a microbial consortium. International Journal of Hydrogen Energy, 2014, 39, 19899-19904.	3.8	22
26	Heat-shock treatment applied to inocula for H2 production decreases microbial diversities, interspecific interactions and performance using cellulose as substrate. International Journal of Hydrogen Energy, 2019, 44, 13126-13134.	3.8	22
27	Effect of volatile fatty acids mixtures on the simultaneous photofermentative production of hydrogen and polyhydroxybutyrate. Bioprocess and Biosystems Engineering, 2017, 40, 231-239.	1.7	21
28	Comparison of suspended and granular cell anaerobic bioreactors for hydrogen production from acid agave bagasse hydrolyzates. International Journal of Hydrogen Energy, 2020, 45, 275-285.	3.8	21
29	Lignocellulosic n-butanol co-production in an advanced biorefinery using mixed cultures. Biomass and Bioenergy, 2017, 102, 1-12.	2.9	20
30	Batch biohydrogen production from dilute acid hydrolyzates of fruits-and-vegetables wastes and corn stover as co-substrates. Biomass and Bioenergy, 2020, 140, 105666.	2.9	20
31	The duo Clostridium and Lactobacillus linked to hydrogen production from a lignocellulosic substrate. Water Science and Technology, 2021, 83, 3033-3040.	1.2	20
32	Optimization of volatile fatty acids concentration for photofermentative hydrogen production by a consortium. International Journal of Hydrogen Energy, 2015, 40, 17212-17223.	3.8	19
33	Fermentation of organic wastes and CO2 + H2 off-gas by microbiotas provides short-chain fatty acids and ethanol for n-caproate production. Journal of CO2 Utilization, 2020, 42, 101314.	3.3	18
34	Nutrients related to spore germination improve H2 production from heat-shock-treated consortia. International Journal of Hydrogen Energy, 2009, 34, 4291-4295.	3.8	16
35	Proposal for a sustainability evaluation framework for bioenergy production systems using the MESMIS methodology. Renewable and Sustainable Energy Reviews, 2017, 68, 360-369.	8.2	16
36	Re-fermentation of washed spent solids from batch hydrogenogenic fermentation for additional production of biohydrogen from the organic fraction of municipal solid waste. Journal of Environmental Management, 2012, 95, S355-S359.	3.8	15

#	Article	IF	Citations
37	Particle size and hydration medium effects on hydration properties and sugar release of wheat straw fibers. Biomass and Bioenergy, 2014, 68, 67-74.	2.9	14
38	Physicochemical Characterization of Wheat Straw during a Continuous Pretreatment Process. Chemical Engineering and Technology, 2018, 41, 1350-1350.	0.9	14
39	Characterization of a Lignocellulolytic Consortium and Methane Production from Untreated Wheat Straw: Dependence on Nitrogen and Phosphorous Content. BioResources, 2016, 11, .	0.5	14
40	Essential Nutrients for Improving the Direct Processing of Raw Lignocellulosic Substrates Through the Dark Fermentation Process. Bioenergy Research, 2020, 13, 349-357.	2.2	9
41	Butanol production coupled with acidogenesis and CO2 conversion for improved carbon utilization. Biomass Conversion and Biorefinery, 2022, 12, 2121-2131.	2.9	9
42	A Cellulolytic Streptomyces Sp. Isolated from a Highly Oligotrophic Niche Shows Potential for Hydrolyzing Agricultural Wastes. Bioenergy Research, 2021, 14, 333-343.	2.2	9
43	CO-DIGESTION OF Agave angustifolia Haw BAGASSE AND VINASSES FOR BIOGAS PRODUCTION FROM MEZCAL INDUSTRY. Revista Mexicana De Ingeniera Quimica, 2019, 18, 1073-1083.	0.2	9
44	Profitability of single- and mixed-culture fermentations for the butyric acid production from a lignocellulosic substrate. Chemical Engineering Research and Design, 2022, 182, 558-570.	2.7	9
45	Plant-associated microbial communities converge in fermentative hydrogen production and form a core microbiome. International Journal of Hydrogen Energy, 2022, 47, 20049-20063.	3.8	9
46	A biorefinery based on the biomechanical configuration of the digestive system of a ruminant for ABE production: a consolidated bioprocessing approach. Biomass Conversion and Biorefinery, 2021, 11, 2079-2088.	2.9	8
47	Simultaneous hydrogen production and decolorization of denim textile wastewater: kinetics of decolorizing of indigo dye by bacterial and fungal strains. Brazilian Journal of Microbiology, 2020, 51, 701-709.	0.8	8
48	Nutrient influence on acidogenesis and native microbial community of Agave bagasse. Industrial Crops and Products, 2021, 170, 113751.	2.5	8
49	Optimization of Culture Conditions for Production of Cellulase by Stenotrophomonas maltophilia. BioResources, 2018, 13, .	0.5	6
50	Potential of hydrogen production from organic Urban Solid Waste fermentation in Mexico. International Journal of Environment and Waste Management, 2009, 3, 36.	0.2	5
51	Sequential pretreatment to recover carbohydrates and phosphorus from Desmodesmus sp. cultivated in municipal wastewater. Water Science and Technology, 2020, 82, 1237-1246.	1.2	5
52	Effects of experimental parameters on methane production and volatile solids removal from tomato and pepper plant wastes. BioResources, 2020, 15, 4763-4780.	0.5	4
53	A framework for integrating functional and microbial data: The case of dark fermentation H2 production. International Journal of Hydrogen Energy, 2020, 45, 31706-31718.	3.8	4
54	Microscopy Applied In Biomass Characterization. , 2016, , 173-196.		3

#	Article	IF	Citations
55	Methane production and bromatological characteristics of the different fractions of organic municipal solid waste. Detritus, 2021, , 13-23.	0.4	3
56	Butanol recovery from synthetic fermentation broth by vacuum distillation in a rotating packed bed. Separation and Purification Technology, 2022, 297, 121551.	3.9	3
57	Effect of transient pH variation on microbial activity and physical characteristics of aerobic granules treating 4-chlorophenol. Journal of Environmental Science and Health - Part A Toxic/Hazardous Substances and Environmental Engineering, 2020, 55, 878-885.	0.9	2
58	Cover Image, Volume 12, Issue 1. Biofuels, Bioproducts and Biorefining, 2018, 12, i.	1.9	0
59	Activated sludge as inoculum improves methane production and community functionality during the anaerobic digestion of mixed agave wastes. Biomass Conversion and Biorefinery, 2024, 14, 4635-4644.	2.9	0