Yiannis A Levendis

List of Publications by Year
in descending order

131	5,675	66315	88593
papers	citations	42 h-index	70 g-index

136	136	136	3410
all docs	docs citations	times ranked	citing authors

#	Article	IF	Citations
1	Single-coal-particle combustion in O2/N2 and O2/CO2 environments. Combustion and Flame, 2008, 153, 270-287.	2.8	307
2	Upcycling waste plastics into carbon nanomaterials: A review. Journal of Applied Polymer Science, 2014, 131, .	1.3	216
3	Combustion behavior of single particles from three different coal ranks and from sugar cane bagasse in O2/N2 and O2/CO2 atmospheres. Combustion and Flame, 2012, 159, 1253-1271.	2.8	211
4	Ignition characteristics of single coal particles from three different ranks in O2/N2 and O2/CO2 atmospheres. Combustion and Flame, 2012, 159, 3554-3568.	2.8	200
5	Combustion behavior in air of single particles from three different coal ranks and from sugarcane bagasse. Combustion and Flame, 2011, 158, 452-465.	2.8	188
6	Single particle ignition and combustion of anthracite, semi-anthracite and bituminous coals in air and simulated oxy-fuel conditions. Combustion and Flame, 2014, 161, 1096-1108.	2.8	174
7	Carbon, sulfur and nitrogen oxide emissions from combustion of pulverized raw and torrefied biomass. Fuel, 2017, 188, 310-323.	3.4	163
8	Emissions of SO2, NOx, CO2, and HCl from Co-firing of coals with raw and torrefied biomass fuels. Fuel, 2018, 211, 363-374.	3.4	155
9	Combustion of single biomass particles in air and in oxy-fuel conditions. Biomass and Bioenergy, 2014, 64, 162-174.	2.9	138
10	Experimental and modeling study of single coal particle combustion in O2/N2 and Oxy-fuel (O2/CO2) atmospheres. Combustion and Flame, 2013, 160, 2559-2572.	2.8	131
11	Synthesis of carbon nanotubes by sequential pyrolysis and combustion of polyethylene. Carbon, 2010, 48, 4024-4034.	5.4	112
12	Development of multicolor pyrometers to monitor the transient response of burning carbonaceous particles. Review of Scientific Instruments, 1992, 63, 3608-3622.	0.6	109
13	A laboratory study on the NO, NO2, SO2, CO and CO2 emissions from the combustion of pulverized coal, municipal waste plastics and tires. Fuel, 1998, 77, 183-196.	3.4	109
14	An overview of coal rank influence on ignition and combustion phenomena at the particle level. Combustion and Flame, 2016, 164, 22-34.	2.8	108
15	Emissions of NO_x and SO₂ from Coals of Various Ranks, Bagasse, and Coal-Bagasse Blends Burning in O₂/N₂ and O₂/CO₂ Environments.. Energy & Fuels, 2011, 25, 2850-2861.	2.5	103
16	Exploratory study on the combustion and PAH emissions of selected municipal waste plastics. Environmental Science & Technology, 1993, 27, 2885-2895.	4.6	96
17	Comparative Study on the Combustion and Emissions of Waste Tire Crumb and Pulverized Coal. Environmental Science & Technology, 1996, 30, 2742-2754.	4.6	88
18	On the deduction of single coal particle combustion temperature from three-color optical pyrometry. Combustion and Flame, 2011, 158, 1822-1836.	2.8	88

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19	PAH formation in one-dimensional premixed fuel-rich atmospheric pressure ethylbenzene and ethyl alcohol flames. Combustion and Flame, 2006, 144, 757-772.	2.8	87
20	Laboratory study on the high-temperature capture of HCl gas by dry-injection of calcium-based sorbents. Chemosphere, 2001, 42, 785-796.	4.2	84
21	Measurements of particle flame temperatures using three-color optical pyrometry. Combustion and Flame, 1996, 104, 272-287.	2.8	81
22	Comparison of the combustion behaviour of pulverized waste tyres and coal. Fuel, 1995, 74, 1570-1581.	3.4	75
23	On the Correlation of CO and PAH Emissions from the Combustion of Pulverized Coal and Waste Tires. Environmental Science & Technology, 1998, 32, 3767-3777.	4.6	74
24	Combustion of coal, bagasse and blends thereof. Fuel, 2012, 96, 51-58.	3.4	69
25	Synthesis of Carbon Nanomaterials through Up-Cycling Agricultural and Municipal Solid Wastes. Industrial & Engineering Chemistry Research, 2012, 51, 2922-2930.	1.8	67
26	Soot loading, temperature and size of single coal particle envelope flames in conventional- and oxy-combustion conditions (O2/N2 and O2/CO2). Combustion and Flame, 2015, 162, 2508-2517.	2.8	63
27	Physical properties and oxidation rates of chars from three bituminous coals. Fuel, 1988, 67, 275-283.	3.4	61
28	A study on the combustion characteristics of PVC, poly(styrene), poly(ethylene), and poly(propylene) particles under high heating rates. Combustion and Flame, 1994, 99, 53-74.	2.8	59
29	Comparative Study on Polycyclic Aromatic Hydrocarbons, Light Hydrocarbons, Carbon Monoxide, and Particulate Emissions from the Combustion of Polyethylene, Polystyrene, and Poly(vinyl chloride). Energy & Fuels, 2003, 17, 999-1013.	2.5	58
30	On the particle sizing of torrefied biomass for co-firing with pulverized coal. Combustion and Flame, 2018, 194, 72-84.	2.8	58
31	Catalytic conversion of wastes from the bioethanol production into carbon nanomaterials. Applied Catalysis B: Environmental, 2011, 106, 433-444.	10.8	56
32	Direct observations on the combustion characteristics of Miscanthus and Beechwood biomass including fusion and spherodization. Fuel Processing Technology, 2017, 166, 41-49.	3.7	56
33	Curtailing the generation of sulfur dioxide and nitrogen oxide emissions by blending and oxy-combustion of coals. Fuel, 2016, 181, 772-784.	3.4	55
34	Hydrogen chloride emissions from combustion of raw and torrefied biomass. Fuel, 2017, 200, 37-46.	3.4	54
35	Soot surface area evolution during air oxidation as evaluated by small angle X-ray scattering and CO2 adsorption. Carbon, 2005, 43, 241-251.	5.4	51
36	Oxidative heat treatment of 316L stainless steel for effective catalytic growth of carbon nanotubes. Applied Surface Science, 2014, 313, 227-236.	3.1	51

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37	Polycyclic Aromatic Hydrocarbon and Particulate Emissions from Two-Stage Combustion of Polystyrene:Â The Effect of the Primary Furnace Temperature. Environmental Science & Technology, 2001, 35, 3541-3552.	4.6	50
38	The effect of equivalence ratio on the soot onset chemistry in one-dimensional, atmospheric-pressure, premixed ethylbenzene flames. Combustion and Flame, 2007, 151, 173-195.	2.8	49
39	Particulates Generated from Combustion of Polymers (Plastics). Journal of the Air and Waste Management Association, 2000, 50, 94-102.	0.9	48
40	On the survivability and pyrosynthesis of PAH during combustion of pulverized coal and tire crumb. Combustion and Flame, 1997, 110, 462-478.	2.8	47
41	Synthesis, formation and characterization of micron-sized glassy carbon spheres of controlled pore structure. Carbon, 1989, 27, 265-283.	5.4	44
42	COMBUSTION OF COAL CHARS IN OXYGEN-ENRICHED ATMOSPHERES. Combustion Science and Technology, 2007, 179, 1569-1587.	1.2	42
43	Effectiveness of calcium magnesium acetate as dual SO2 -NOx emission Control Agent. AICHE Journal, 1995, 41, 712-722.	1.8	40
44	PAH and soot emissions from burning components of medical waste: examination/surgical gloves and cotton pads. Chemosphere, 2001, 42, 775-783.	4.2	39
45	Comparison of single particle combustion behaviours of raw and torrefied biomass with Turkish lignites. Fuel, 2019, 241, 1085-1094.	3.4	39
46	Polynuclear Aromatic Hydrocarbon and Particulate Emissions from Two-Stage Combustion of Polystyrene:Â The Effects of the Secondary Furnace (Afterburner) Temperature and Soot Filtration. Environmental Science & Technology, 2002, 36, 797-808.	4.6	38
47	Aromatic Hydrocarbon Emissions from Burning Poly(styrene), Poly(ethylene) and PVC Particles at High Temperatures. Combustion Science and Technology, 1996, 116-117, 91-128.	1.2	37
48	A Laboratory Investigation on Combined In-Furnace Sorbent Injection and Hot Flue-Gas Filtration to Simultaneously Capture SO2, NOx, HCl, and Particulate Emissions. Environmental Science & Technology, 2000, 34, 4855-4866.	4.6	37
49	Combustion details of raw and torrefied biomass fuel particles with individually-observed size, shape and mass. Combustion and Flame, 2019, 207, 327-341.	2.8	37
50	Oxidation kinetics of monodisperse spherical carbonaceous particles of variable properties. Combustion and Flame, 1989, 76, 221-241.	2.8	34
51	Influence of the fuel structure on the flame synthesis of carbon nanomaterials. Carbon, 2011, 49, 3412-3423.	5.4	33
52	Particle shape and Stefan flow effects on the burning rate of torrefied biomass. Fuel, 2017, 210, 107-120.	3.4	33
53	Influence of Stainless-Steel Catalyst Substrate Type and Pretreatment on Growing Carbon Nanotubes from Waste Postconsumer Plastics. Industrial & Engineering Chemistry Research, 2019, 58, 3009-3023.	1.8	33
54	Physical Properties of Particulate Matter Emitted from Combustion of Coals of Various Ranks in O₂/N₂ and O₂/CO₂ Environments. Energy & Fuels, 2012, 26, 7127-7139.	2.5	32

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55	Laboratory Investigation of the Products of the Incomplete Combustion of Waste Plastics and Techniques for Their Minimization. Industrial & Engineering Chemistry Research, 2004, 43, 2873-2886.	1.8	31
56	Emissions from the combustion of polystyrene, styrene and ethylbenzene under diverse conditions. Fuel, 2007, 86, 1789-1799.	3.4	31
57	Chemical Composition of Submicrometer Particulate Matter (PM₁) Emitted from Combustion of Coals of Various Ranks in O₂/N₂ and O₂/CO₂ Environments. Energy & Fuels, 2013, 27, 4984-4998.	2.5	31
58	Temperature and oxygen partial pressure dependencies of the coal-bound nitrogen to NOx conversion in O2/CO2 environments. Combustion and Flame, 2019, 206, 98-111.	2.8	31
59	Investigation of critical equivalence ratio and chemical speciation in flames of ethylbenzeneâ€“ethanol blends. Combustion and Flame, 2010, 157, 296-312.	2.8	29
60	Reduction of Sulfur Dioxide Emissions by Burning Coal Blends. Journal of Energy Resources Technology, Transactions of the ASME, 2016, 138, .	1.4	29
61	Emissions of Batch Combustion of Waste Tire Chips:â€‰ The Afterburner Effect. Energy & Fuels, 2003, 17, 225-239.	2.5	27
62	Effects of Carbon Dioxide on Laminar Burning Speed and Flame Instability of Methane/Air and Propane/Air Mixtures: A Literature Review. Energy & Fuels, 2019, 33, 9403-9418.	2.5	26
63	A study on toxic organic emissions from batch combustion of styrene. Chemosphere, 2002, 49, 395-412.	4.2	25
64	Combustion of coal, bagasse and blends thereof. Fuel, 2012, 96, 43-50.	3.4	24
65	On the minimum oxygen requirements for oxy-combustion of single particles of torrefied biomass. Combustion and Flame, 2020, 213, 426-440.	2.8	24
66	Torrefaction of corn straw in oxygen and carbon dioxide containing gases: Mass/energy yields and evolution of gaseous species. Fuel, 2021, 285, 119044.	3.4	24
67	Effect of Carbon Dioxide on the Laminar Burning Speed of Propaneâ€“Air Mixtures. Journal of Energy Resources Technology, Transactions of the ASME, 2019, 141, .	1.4	23
68	Spectral emissivity and temperature of heated surfaces based on spectrometry and digital thermal imaging â€“ Validation with thermocouple temperature measurements. Experimental Thermal and Fluid Science, 2020, 112, 110017.	1.5	23
69	Performance maximization by temperature glide matching in energy exchangers of cooling systems operating with natural hydrocarbon/CO2 refrigerants. International Journal of Refrigeration, 2020, 119, 294-304.	1.8	23
70	High-temperature pyrolysis of biomass pellets: The effect of ash melting on the structure of the char residue. Fuel, 2021, 285, 119084.	3.4	23
71	The effect of the bulk equivalence ratio on the pah emissions from the combustion of PVC, poly(styrene), and poly(ethylene). Proceedings of the Combustion Institute, 1996, 26, 2421-2430.	0.3	22
72	Observations on the Combustion of Pulverized PVC and Poly(ethylene). Combustion Science and Technology, 1996, 112, 117-140.	1.2	22

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73	The effect of temperature on the soot onset chemistry in one-dimensional, atmospheric-pressure, premixed ethylbenzene flames. Combustion and Flame, 2008, 155, 232-246.	2.8	22
74	Pyrolytic Conversion of Biomass Residues to Gaseous Fuels for Electricity Generation. Journal of Energy Resources Technology, Transactions of the ASME, 2014, 136, .	1.4	22
75	Reduction of HCl Emissions from Combustion of Biomass by Alkali Carbonate Sorbents or by Thermal Pretreatment. Journal of Energy Engineering - ASCE, 2018, 144, 04018045.	1.0	21
76	Generation of spherical and monodisperse particles of poly(styrene) and poly(methyl methacrylate) by atomization of monomers and dissolved polymer precursors. Journal of Applied Polymer Science, 1991, 43, 1549-1558.	1.3	20
77	Comparative Environmental Evaluation of JP-8 and Diesel Fuels Burned in Direct Injection (DI) or Indirect Injection (IDI) Diesel Engines and in a Laboratory Furnace. Energy & Fuels, 2004, 18, 1302-1308.	2.5	20
78	Emissions from the Premixed Combustion of Gasified Polyethylene. Energy & Fuels, 2008, 22, 372-381.	2.5	20
79	Comparison of Fine Ash Emissions Generated from Biomass and Coal Combustion and Valuation of Predictive Furnace Deposition Indices: A Review. Journal of Energy Engineering - ASCE, 2016, 142, .	1.0	20
80	Evolution of Chlorine-Bearing Gases During Corn Straw Torrefaction at Different Temperatures. Energy & Fuels, 2017, 31, 13713-13723.	2.5	20
81	Flame characteristics of propane-air-carbon dioxide blends at elevated temperatures and pressures. Energy, 2021, 228, 120624.	4.5	20
82	In-Furnace Sulfur Capture by Cofiring Coal With Alkali-Based Sorbents. Journal of Energy Resources Technology, Transactions of the ASME, 2017, 139, .	1.4	19
83	Hydrogen Chloride Release From Combustion of Corn Straw in a Fixed Bed. Journal of Energy Resources Technology, Transactions of the ASME, 2018, 140, .	1.4	19
84	Nitrogen-Bearing Emissions From Burning Corn Straw in a Fixed-Bed Reactor: Effects of Fuel Moisture, Torrefaction, and Air Flowrate. Journal of Energy Resources Technology, Transactions of the ASME, 2019, 141, .	1.4	19
85	Development of a New Diesel Particulate Control System with Wall-Flow Filters and Reverse Cleaning Regeneration. , 0, , .		18
86	Chemical speciation of premixed ethylbenzene flames at the soot onset limit at various (Ï•,TÏ•,T) pairs. Combustion and Flame, 2009, 156, 1014-1022.	2.8	17
87	Control of the HCl Emissions from the Combustion of PVC by In-Furnace Injection of Calcium-Magnesium-Based Sorbents. Environmental Engineering Science, 1998, 15, 123-135.	0.8	16
88	EMISSIONS OF BATCH COMBUSTION OF WASTE TIRE CHIPS: THE PYROLYSIS EFFECT. Combustion Science and Technology, 2005, 177, 347-381.	1.2	16
89	PAH emissions from high-temperature oxidation of vaporized anthracene. Proceedings of the Combustion Institute, 2007, 31, 491-499.	2.4	16
90	Pool fire extinction by remotely controlled application of liquid nitrogen. Process Safety Progress, 2011, 30, 164-167.	0.4	16

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91	Post-ignition transients in the combustion of single char particles. Fuel, 1989, 68, 849-855.	3.4	15
92	Emissions of Batch Combustion of Waste Tire Chips:â€‰ The Hot Flue-Gas Filtering Effect. Energy & Fuels, 2004, 18, 102-115.	2.5	14
93	Ignition behavior of coal and biomass blends under oxy-firing conditions with steam additions. , 2013, 3, 397-414.		14
94	Thermodynamic Study on Blends of Hydrocarbons and Carbon Dioxide as Zeotropic Refrigerants. Journal of Energy Resources Technology, Transactions of the ASME, 2020, 142, .	1.4	14
95	Laminar burning speeds and flame instabilities of isobutane carbon dioxide air mixtures at high pressures and temperatures. Fuel, 2020, 268, 117410.	3.4	13
96	Cryogenic extinguishment of liquid pool fires. Process Safety Progress, 2010, 29, 79-86.	0.4	12
97	Emissions From Oxy-Combustion of Raw and Torrefied Biomass. Journal of Energy Resources Technology, Transactions of the ASME, 2020, 142, .	1.4	12
98	Sulfur and Nitrogen Release From Co-Pyrolysis of Coal and Biomass Under Oxidative and Non-Oxidative Conditions. Journal of Energy Resources Technology, Transactions of the ASME, 2021, 143, .	1.4	12
99	Pyrolytic Gasification of Post-consumer Polyolefins To Allow for â€œCleanâ€•Premixed Combustion. Energy & Fuels, 2013, 27, 4859-4868.	2.5	11
100	Diesel Vehicle Application of an Aerodynamically Regenerated Trap and EGR System. , 1995, , .		10
101	Comparative study on destruction of polycyclic aromatic hydrocarbons from combustion of waste polystyrene. Proceedings of the Combustion Institute, 2002, 29, 2477-2484.	2.4	10
102	Utilization of a High-Alkali Lignite Coal Ash for SO2 Capture in Power Generation. Journal of Energy Engineering - ASCE, 2017, 143, 04016067.	1.0	10
103	Use of Alkali Carbonate Sorbents for Capturing Chlorine-Bearing Gases from Corn Straw Torrefaction. Energy & Fuels, 2018, 32, 11843-11851.	2.5	10
104	Product Compositions from Sequential Biomass Pyrolysis and Gasification of Its Char Residue. Journal of Energy Engineering - ASCE, 2020, 146, 04020049.	1.0	10
105	Reducing Diesel Particulate and NOx Emissions via Filtration and Particle-Free Exhaust Gas Recirculation. , 0, , .		9
106	Filtration Assessment and Thermal Effects on Aerodynamic Regeneration in Silicon Carbide and Cordierite Particulate Filters. , 0, , .		9
107	Effects of Air Flowrate on the Combustion and Emissions of Blended Corn Straw and Pinewood Wastes. Journal of Energy Resources Technology, Transactions of the ASME, 2019, 141, .	1.4	8
108	Determination of Flame Temperatures and Soot Volume Fractions during Combustion of Biomass Pellets. Energy & Fuels, 2021, 35, 2313-2325.	2.5	8

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109	On the trajectory and reach of fire-suppressant liquid nitrogen droplets released from a spray nozzle. Chemical Engineering Research and Design, 2022, 161, 273-284.	2.7	8
110	Determination of size and porosity of chars during combustion of biomass particles. Combustion and Flame, 2022, 242, 112182.	2.8	8
111	Release of Alkalis and Chlorine from Combustion of Waste Pinewood in a Fixed Bed. Energy & Fuels, 2019, 33, 1256-1266.	2.5	7
112	On the Influences of Carrier Gas Type and Flow Rate on CVD Synthesis of CNTs from Postconsumer Polyethylene. Industrial & Engineering Chemistry Research, 2020, 59, 14004-14014.	1.8	7
113	Effects of Activation Conditions on the Properties of Sludge-Based Activated Coke. ACS Omega, 2021, 6, 22020-22032.	1.6	6
114	A Numerical and Experimental Study on the Effects of CO2 on Laminar Diffusion Methane/Air Flames. Journal of Energy Resources Technology, Transactions of the ASME, 2020, 142, .	1.4	6
115	Preparation of monodisperse carbonaceous particles with micro-, meso-, and macroporous structures. Journal of Applied Polymer Science, 1992, 45, 2061-2073.	1.3	5
116	Comparison of Products of Incomplete Combustion of Waste Polystyrene and Styrene in Diffusion Flames and Ethyl Benzene in Fuel-Rich Premixed Flames. , 2004, , 605.		5
117	Emissions from Premixed Combustion of Polystyrene. Energy & Fuels, 2008, 22, 354-362.	2.5	5
118	Carbon Nanotube Production From Ethylene in CO2/N2 Environments. Journal of Energy Resources Technology, Transactions of the ASME, 2018, 140, .	1.4	5
119	A method to assess downward flame spread and dripping characteristics of fireâ€retardant polymer composites. Fire and Materials, 2018, 42, 347-357.	0.9	5
120	Effects of Carbonization on the Co-Activation of Sludge and Biomass to Produce Activated Coke. Journal of Energy Resources Technology, Transactions of the ASME, 2021, 143, .	1.4	5
121	A Novel Technology for Green(er) Manufacturing of CNTs via Recycling of Waste Plastics. Materials Research Society Symposia Proceedings, 2011, 1317, 1.	0.1	4
122	Soot Volume Fractions in Volatile Matter Envelope Flames of Bituminous Coal Particles in Air and Oxy-Fuel Combustion. , 2013, , .		4
123	EXPERIMENTAL AND NUMERICAL STUDY OF EMISSIONS FROM FUEL-RICH COMBUSTION OF PULVERIZED POLYSTYRENE. Combustion Science and Technology, 2006, 178, 1297-1324.	1.2	3
124	Preparation of Activated Coke by One-Step Activation Method, Ammonization, and K2CO3 Modification of Coal and Biomass. Journal of Energy Resources Technology, Transactions of the ASME, 2022, 144, .	1.4	3
125	Waste-to-Energy Conversion by Stepwise Liquefaction, Pyrolysis and â€œClean Combustionâ€•of Waste Plastics. , 2012, , .		2
126	Feasibility Study on Power Generation from Waste Plastics with Partial Precombustion Carbon Capture and Conversion. Journal of Energy Engineering - ASCE, 2015, 141, .	1.0	2

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127	Evolution of Gases From the Pyrolysis of Raw and Torrefied Biomass and From the Oxy-Combustion of Their Bio-Chars. Journal of Energy Resources Technology, Transactions of the ASME, 2022, 144, .	1.4	2
128	Effects of CO2 on Carbon Nanotube Formation from Thermal Decomposition of Ethylene. Materials Research Society Symposia Proceedings, 2015, 1747, 13.	0.1	1
129	A simple experiment on global warming. Royal Society Open Science, 2020, 7, 192075.	1.1	1
130	Ash Fusion During Combustion of Single Corn Straw Pellets. Journal of Energy Resources Technology, Transactions of the ASME, 2021, 143, .	1.4	1
131	Emissions From Direct or Indirect Combustion of Tire-Derived-Fuel. , 2008, , .		0