

Diane Hildebrandt

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The third column is the impact factor (IF) of the journal, and the fourth column is the number of citations of the article.

235
papers

2,926
citations

27
h-index

44
g-index

250
ext. papers

3,246
ext. citations

4.5
avg, IF

5.35
L-index

#	Paper	IF	Citations
235	A geometric approach to steady flow reactors: the attainable region and optimization in concentration space. <i>Industrial & Engineering Chemistry Research</i> , 1987 , 26, 1803-1810	3.9	184
234	Fischer-Tropsch synthesis over iron catalysts supported on carbon nanotubes. <i>Applied Catalysis A: General</i> , 2005 , 287, 60-67	5.1	174
233	Optimal reactor design from a geometric viewpoint – Universal properties of the attainable region. <i>Chemical Engineering Science</i> , 1997 , 52, 1637-1665	4.4	112
232	The attainable region and optimal reactor structures. <i>Chemical Engineering Science</i> , 1990 , 45, 2161-2168	4.4	103
231	Geometry of the attainable region generated by reaction and mixing: with and without constraints. <i>Industrial & Engineering Chemistry Research</i> , 1990 , 29, 49-58	3.9	101
230	Fe-Ru small particle bimetallic catalysts supported on carbon nanotubes for use in Fischer-Tropsch synthesis. <i>Applied Catalysis A: General</i> , 2007 , 328, 243-251	5.1	81
229	Fischer-Tropsch Synthesis Using H ₂ /CO/CO ₂ Syngas Mixtures over a Cobalt Catalyst. <i>Industrial & Engineering Chemistry Research</i> , 2010 , 49, 11061-11066	3.9	67
228	Fischer-Tropsch Synthesis Using H ₂ /CO/CO ₂ Syngas Mixtures over an Iron Catalyst. <i>Industrial & Engineering Chemistry Research</i> , 2011 , 50, 11002-11012	3.9	58
227	Heat transfer study with and without Fischer-Tropsch reaction in a fixed bed reactor with TiO ₂ , SiO ₂ , and SiC supported cobalt catalysts. <i>Chemical Engineering Journal</i> , 2014 , 247, 75-84	14.7	38
226	Wastewater treatment of reactive dyestuffs by ozonation in a semi-batch reactor. <i>Chemical Engineering Journal</i> , 2011 , 166, 662-668	14.7	38
225	The application of the attainable region analysis to comminution. <i>Chemical Engineering Science</i> , 2006 , 61, 5969-5980	4.4	38
224	Column Profile Maps. 1. Derivation and Interpretation. <i>Industrial & Engineering Chemistry Research</i> , 2004 , 43, 364-374	3.9	38
223	Linear programming formulations for attainable region analysis. <i>Chemical Engineering Science</i> , 2002 , 57, 2015-2028	4.4	38
222	The effect of sulfur on supported cobalt Fischer-Tropsch catalysts. <i>Catalysis Today</i> , 1999 , 49, 33-40	5.3	38
221	Chemistry. Producing transportation fuels with less work. <i>Science</i> , 2009 , 323, 1680-1	33.3	36
220	Effect of the addition of Au on Co/TiO ₂ catalyst for the Fischer-Tropsch reaction. <i>Topics in Catalysis</i> , 2007 , 44, 129-136	2.3	34
219	Determination of the milling parameters of a platinum group minerals ore to optimize product size distribution for flotation purposes. <i>Minerals Engineering</i> , 2013 , 43-44, 67-78	4.9	33

218	Recent advances in understanding the Fischer-Tropsch synthesis (FTS) reaction. <i>Current Opinion in Chemical Engineering</i> , 2012 , 1, 296-302	5.4	32
217	Use of the attainable region analysis to optimize particle breakage in a ball mill. <i>Chemical Engineering Science</i> , 2009 , 64, 3766-3777	4.4	32
216	A comparison of Au/Co/Al ₂ O ₃ and Au/Co/SiO ₂ catalysts in the Fischer-Tropsch reaction. <i>Applied Catalysis A: General</i> , 2011 , 395, 1-9	5.1	31
215	A critical review of the impact of water on cobalt-based catalysts in Fischer-Tropsch synthesis. <i>Fuel Processing Technology</i> , 2019 , 192, 105-129	7.2	30
214	The role of vapour-liquid equilibrium in Fischer-Tropsch product distribution. <i>Chemical Engineering Science</i> , 2011 , 66, 6254-6263	4.4	30
213	Study of Radial Heat Transfer in a Tubular Fischer-Tropsch Synthesis Reactor. <i>Industrial & Engineering Chemistry Research</i> , 2010 , 49, 10682-10688	3.9	30
212	Optimal mixing for exothermic reversible reactions. <i>Industrial & Engineering Chemistry Research</i> , 1992 , 31, 1541-1549	3.9	30
211	Fischer-Tropsch synthesis using H ₂ /CO/CO ₂ syngas mixtures: A comparison of paraffin to olefin ratios for iron and cobalt based catalysts. <i>Applied Catalysis A: General</i> , 2012 , 433-434, 58-68	5.1	29
210	The effect of CO ₂ on a cobalt-based catalyst for low temperature Fischer-Tropsch synthesis. <i>Chemical Engineering Journal</i> , 2012 , 193-194, 318-327	14.7	28
209	Vapor recompression for efficient distillation. 1. A new synthesis perspective on standard configurations. <i>AIChE Journal</i> , 2013 , 59, 2977-2992	3.6	28
208	An attainable region analysis of the effect of ball size on milling. <i>Powder Technology</i> , 2011 , 210, 36-46	5.2	27
207	Choosing Optimal Control Policies Using the Attainable Region Approach. <i>Industrial & Engineering Chemistry Research</i> , 1999 , 38, 639-651	3.9	27
206	Reactor and process synthesis. <i>Computers and Chemical Engineering</i> , 1997 , 21, S775-S783	4	26
205	Metal-organic framework (MOF)-derived catalysts for Fischer-Tropsch synthesis: Recent progress and future perspectives. <i>Journal of Energy Chemistry</i> , 2020 , 51, 230-245	12	25
204	A study of Fischer-Tropsch synthesis: Product distribution of the light hydrocarbons. <i>Applied Catalysis A: General</i> , 2016 , 517, 217-226	5.1	23
203	Thermodynamics Analysis of Processes. 1. Implications of Work Integration. <i>Industrial & Engineering Chemistry Research</i> , 2005 , 44, 3529-3537	3.9	23
202	Column Profile Maps. 2. Singular Points and Phase Diagram Behaviour in Ideal and Nonideal Systems. <i>Industrial & Engineering Chemistry Research</i> , 2004 , 43, 3590-3603	3.9	23
201	Application of basic process modeling in investigating the breakage behavior of UG2 ore in wet milling. <i>Powder Technology</i> , 2015 , 279, 42-48	5.2	22

200	An experimental validation of a specific energy-based approach for comminution. <i>Chemical Engineering Science</i> , 2007 , 62, 2765-2776	4.4	22
199	Classification of Chemical Processes: A Graphical Approach to Process Synthesis To Improve Reactive Process Work Efficiency. <i>Industrial & Engineering Chemistry Research</i> , 2010 , 49, 8227-8237	3.9	21
198	On-line deactivation of Au/TiO ₂ for CO oxidation in H ₂ -rich gas streams. <i>Catalysis Today</i> , 2007 , 122, 254-259	3.5	21
197	Optimal reactor structures for exothermic reversible reactions with complex kinetics. <i>Chemical Engineering Science</i> , 1996 , 51, 2399-2407	4.4	21
196	Variation of residence time with chain length for products in a slurry-phase Fischer-Tropsch reactor. <i>Journal of Catalysis</i> , 2012 , 287, 93-101	7.3	20
195	The impact and challenges of sustainable biogas implementation: moving towards a bio-based economy. <i>Energy, Sustainability and Society</i> , 2017 , 7,	3.9	20
194	A vapor-liquid equilibrium thermodynamic model for a Fischer-Tropsch reactor. <i>Fluid Phase Equilibria</i> , 2012 , 314, 38-45	2.5	20
193	Improving comminution efficiency using classification: An attainable region approach. <i>Powder Technology</i> , 2008 , 187, 252-259	5.2	20
192	Ultra-deep desulphurization of both model and commercial diesel fuels by adsorption method. <i>Journal of Environmental Chemical Engineering</i> , 2019 , 7, 102957	6.8	19
191	A laboratory scale application of the attainable region technique on a platinum ore. <i>Powder Technology</i> , 2015 , 274, 14-19	5.2	19
190	Olefin pseudo-equilibrium in the Fischer-Tropsch reaction. <i>Chemical Engineering Journal</i> , 2012 , 181-182, 667-676	14.7	19
189	The Attainable Region for Segregated, Maximum Mixed, and Other Reactor Models. <i>Industrial & Engineering Chemistry Research</i> , 1994 , 33, 1136-1144	3.9	19
188	The effect of silanol groups on the metal-support interactions in silica-supported cobalt Fischer-Tropsch catalysts. A temperature programmed surface reaction. <i>Journal of Catalysis</i> , 2020 , 381, 121-129	7.3	19
187	Reactor and Process Synthesis. <i>Computers and Chemical Engineering</i> , 1997 , 21, S775-S783	4	18
186	Ball size distribution for the maximum production of a narrowly-sized mill product. <i>Powder Technology</i> , 2015 , 284, 12-18	5.2	17
185	Incorporation of solar-thermal energy into a gasification process to co-produce bio-fertilizer and power. <i>Environmental Pollution</i> , 2020 , 266, 115103	9.3	17
184	Study of the effects of temperature on syngas composition from pyrolysis of wood pellets using a nitrogen plasma torch reactor. <i>Journal of Analytical and Applied Pyrolysis</i> , 2018 , 130, 159-168	6	17
183	Making Sense of the Fischer-Tropsch Synthesis Reaction: Start-Up. <i>Industrial & Engineering Chemistry Research</i> , 2010 , 49, 9753-9758	3.9	17

182	Complex Column Design by Application of Column Profile Map Techniques: Sharp-Split Petlyuk Column Design. <i>Industrial & Engineering Chemistry Research</i> , 2010 , 49, 327-349	3.9	17
181	The simultaneous adsorption, activation and in situ reduction of carbon dioxide over Au-loading BiOCl with rich oxygen vacancies. <i>Nanoscale</i> , 2021 , 13, 2585-2592	7.7	17
180	A long term study of the gas phase of low pressure Fischer-Tropsch products when reducing an iron catalyst with three different reducing gases. <i>Applied Catalysis A: General</i> , 2017 , 534, 1-11	5.1	16
179	Analysis of an exothermic reversible reaction in a catalytic reactor with periodic flow reversal. <i>Chemical Engineering Science</i> , 1992 , 47, 1825-1837	4.4	16
178	Scale-up of batch grinding data for simulation of industrial milling of platinum group minerals ore. <i>Minerals Engineering</i> , 2014 , 63, 100-109	4.9	15
177	Application of attainable region theory to batch reactors. <i>Chemical Engineering Science</i> , 2013 , 99, 203-214	4.4	15
176	Synthesis and Integration of Chemical Processes from a Mass, Energy, and Entropy Perspective. <i>Industrial & Engineering Chemistry Research</i> , 2007 , 46, 8756-8766	3.9	15
175	Fischer-Tropsch synthesis over Co/TiO ₂ : Effect of ethanol addition. <i>Fuel</i> , 2007 , 86, 73-80	7.1	15
174	Reactive distillation in conventional Fischer-Tropsch reactors. <i>Fuel Processing Technology</i> , 2015 , 130, 54-61	7.2	14
173	Novel separation system design using moving triangles. <i>Computers and Chemical Engineering</i> , 2004 , 29, 181-189	4	14
172	Variables indicating the cost of vapour-liquid equilibrium separation processes. <i>Chemical Engineering Science</i> , 1996 , 51, 4749-4757	4.4	14
171	DRIFT spectroscopy and optical reflectance of heat-treated coal from a quenched gasifier. <i>Fuel</i> , 1995 , 74, 1216-1219	7.1	14
170	Process synthesis for reaction systems with cooling via finding the Attainable Region. <i>Computers and Chemical Engineering</i> , 1997 , 21, S35-S40	4	14
169	Turning wine (waste) into water: Toward technological advances in the use of constructed wetlands for winery effluent treatment. <i>AIChE Journal</i> , 2014 , 60, 420-431	3.6	13
168	Estimating rate constants of contaminant removal in constructed wetlands treating winery effluent: A comparison of three different methods. <i>Chemical Engineering Research and Design</i> , 2014 , 92, 903-916	5.5	13
167	A graphical approach to process synthesis and its application to steam reforming. <i>AIChE Journal</i> , 2013 , 59, 3714-3729	3.6	13
166	High yield syngas formation by partial oxidation of methane over Co-alumina catalysts. <i>Studies in Surface Science and Catalysis</i> , 1997 , 461-465	1.8	13
165	A Process Synthesis Approach To Investigate the Effect of the Probability of Chain Growth on the Efficiency of Fischer-Tropsch Synthesis. <i>Industrial & Engineering Chemistry Research</i> , 2006 , 45, 5928-5935	3.9	13

164	Use of the attainable region approach to determine major trends and optimize particle breakage in a laboratory mill. <i>Powder Technology</i> , 2016 , 291, 414-419	5.2	12
163	A Thermodynamic Approach to Olefin Product Distribution in Fischer-Tropsch Synthesis. <i>Industrial & Engineering Chemistry Research</i> , 2012 , 51, 16544-16551	3.9	12
162	A New Way to Look at Fischer-Tropsch Synthesis Using Flushing Experiments. <i>Industrial & Engineering Chemistry Research</i> , 2011 , 50, 4359-4365	3.9	12
161	The Attainable Region and Pontryagin's Maximum Principle. <i>Industrial & Engineering Chemistry Research</i> , 1999 , 38, 652-659	3.9	12
160	Cobalt hybrid catalysts in Fischer-Tropsch synthesis. <i>Reviews in Chemical Engineering</i> , 2020 , 36, 437-457	5	12
159	Fischer-Tropsch synthesis: product distribution, operating conditions, iron catalyst deactivation and catalyst speciation. <i>International Journal of Industrial Chemistry</i> , 2018 , 9, 317-333	3.1	12
158	Use of the attainable region method to simulate a full-scale ball mill with a realistic transport model. <i>Minerals Engineering</i> , 2015 , 73, 116-123	4.9	11
157	Variation of the Short-Chain Paraffin and Olefin Formation Rates with Time for a Cobalt Fischer-Tropsch Catalyst. <i>Industrial & Engineering Chemistry Research</i> , 2017 , 56, 469-478	3.9	10
156	Effects of CO ₂ on South African fresh water microalgae growth. <i>Environmental Progress and Sustainable Energy</i> , 2012 , 31, 24-28	2.5	10
155	Using the attainable region analysis to determine the effect of process parameters on breakage in a ball mill. <i>AIChE Journal</i> , 2012 , 58, 2665-2673	3.6	10
154	A Revised Method of Attainable Region Construction Utilizing Rotated Bounding Hyperplanes. <i>Industrial & Engineering Chemistry Research</i> , 2010 , 49, 10549-10557	3.9	10
153	Effect of cobalt carboxylate precursor chain length on Fischer-Tropsch cobalt/alumina catalysts. <i>Applied Catalysis A: General</i> , 2007 , 326, 164-172	5.1	10
152	Low-pressure methanol/ dimethylether synthesis from syngas on gold-based catalysts 2007 , 40, 219-224		10
151	Fischer-Tropsch Results and Their Analysis for Reactor Synthesis. <i>Industrial & Engineering Chemistry Research</i> , 2005 , 44, 5987-5994	3.9	10
150	Binary distillation re-visited using the attainable region theory. <i>Computers and Chemical Engineering</i> , 2000 , 24, 231-237	4	10
149	Predicting phase and chemical equilibrium using the convex hull of the Gibbs free energy. <i>The Chemical Engineering Journal and the Biochemical Engineering Journal</i> , 1994 , 54, 187-197		10
148	A fundamental investigation on the breakage of a bed of silica sand particles: An attainable region approach. <i>Powder Technology</i> , 2016 , 301, 1208-1212	5.2	10
147	Low-Pressure Fischer-Tropsch Synthesis: In Situ Oxidative Regeneration of Iron Catalysts. <i>Industrial & Engineering Chemistry Research</i> , 2017 , 56, 4267-4274	3.9	9

146	Effect of feeding nitrogen to a fixed bed Fischer-Tropsch reactor while keeping the partial pressures of reactants the same. <i>Chemical Engineering Journal</i> , 2016 , 293, 151-160	14.7	9
145	Optimization of the Thermal Efficiency of a Fixed-Bed Gasifier using Computational Fluid Dynamics. <i>Computer Aided Chemical Engineering</i> , 2018 , 44, 1747-1752	0.6	9
144	Liquid Fuels from Alternative Carbon Sources Minimizing Carbon Dioxide Emissions. <i>AICHE Journal</i> , 2013 , 59, 2062-2078	3.6	9
143	Conversion of Synthesis Gas to Dimethylether Over Gold-based Catalysts. <i>Topics in Catalysis</i> , 2012 , 55, 771-781	2.3	9
142	Work to Chemical Processes: The Relationship between Heat, Temperature, Pressure, and Process Complexity. <i>Industrial & Engineering Chemistry Research</i> , 2011 , 50, 8603-8619	3.9	9
141	Process synthesis for reaction systems with cooling via finding the Attainable Region. <i>Computers and Chemical Engineering</i> , 1997 , 21, S35-S40	4	9
140	Application of Membrane Residue Curve Maps to Batch and Continuous Processes. <i>Industrial & Engineering Chemistry Research</i> , 2008 , 47, 2361-2376	3.9	9
139	Synthesizing a Process from Experimental Results: A Fischer-Tropsch Case Study. <i>Industrial & Engineering Chemistry Research</i> , 2007 , 46, 156-167	3.9	9
138	Desulphurization of diesel fuels using intermediate Lewis acids loaded on activated charcoal and alumina. <i>Chemical Engineering Communications</i> , 2019 , 206, 572-580	2.2	9
137	Synthesis, structure, and performance of carbide phases in Fischer-Tropsch synthesis: A critical review. <i>Fuel</i> , 2021 , 296, 120689	7.1	9
136	Process flow sheet synthesis: Reaching targets for idealized coal gasification. <i>AICHE Journal</i> , 2014 , 60, 3258-3266	3.6	8
135	A Study of the Fischer-Tropsch Synthesis in a Batch Reactor: Rate, Phase of Water, and Catalyst Oxidation. <i>Energy & Fuels</i> , 2017 , 31, 7405-7412	4.1	8
134	Recursive constant control policy algorithm for attainable regions analysis. <i>Computers and Chemical Engineering</i> , 2009 , 33, 309-320	4	8
133	A new method of locating all pinch points in nonideal distillation systems, and its application to pinch point loci and distillation boundaries. <i>Computers and Chemical Engineering</i> , 2011 , 35, 1072-1087	4	8
132	Column profile maps as a tool for synthesizing complex column configurations. <i>Computers and Chemical Engineering</i> , 2010 , 34, 1487-1496	4	8
131	Derivation and Properties of Membrane Residue Curve Maps. <i>Industrial & Engineering Chemistry Research</i> , 2006 , 45, 9080-9087	3.9	8
130	Automating reactor network synthesis: finding a candidate attainable region for the water-gas shift (WGS) reaction. <i>Computers and Chemical Engineering</i> , 2004 , 28, 149-160	4	8
129	The luck factor of biogas technology: Naturalness concerns, social acceptance and community dynamics in South Africa. <i>Energy Research and Social Science</i> , 2021 , 71, 101846	7.7	8

128	Distribution between C2 and C3 in low temperature Fischer-Tropsch synthesis over a TiO ₂ -supported cobalt catalyst. <i>Applied Catalysis A: General</i> , 2015 , 506, 67-76	5.1	7
127	Experimental Simulation of Three-Dimensional Attainable Region for the Synthesis of Exothermic Reversible Reaction: Ethyl Acetate Synthesis Case Study. <i>Industrial & Engineering Chemistry Research</i> , 2015 , 54, 2619-2626	3.9	7
126	The oxidative dehydrogenation of n-butane in a differential side-stream catalytic membrane reactor. <i>Catalysis Today</i> , 2010 , 156, 237-245	5.3	7
125	Can the Operating Leaves of a Distillation Column Really Be Expanded?. <i>Industrial & Engineering Chemistry Research</i> , 2005 , 44, 7511-7519	3.9	7
124	The Oxidative Dehydrogenation of n-Butane in a Fixed-Bed Reactor and in an Inert Porous Membrane Reactor Maximizing the Production of Butenes and Butadiene. <i>Industrial & Engineering Chemistry Research</i> , 2006 , 45, 2661-2671	3.9	7
123	Application of the attainable region method to determine optimal conditions for milling and leaching. <i>Powder Technology</i> , 2017 , 317, 400-407	5.2	6
122	Making processes work. <i>Computers and Chemical Engineering</i> , 2015 , 81, 22-31	4	6
121	2011 ,		6
120	Systems approach to reducing energy usage and carbon dioxide emissions. <i>AIChE Journal</i> , 2009 , 55, 2203-2206	3.8	6
119	Crossing Reaction Equilibrium in an Adiabatic Reactor System. <i>Asia-Pacific Journal of Chemical Engineering</i> , 2008 , 6, 41-54		6
118	Study of Carbon Monoxide Hydrogenation Over Supported Au Catalysts. <i>Studies in Surface Science and Catalysis</i> , 2007 , 163, 141-151	1.8	6
117	An experimental simulation of distillation column concentration profiles using a batch apparatus. <i>Chemical Engineering Science</i> , 2003 , 58, 479-486	4.4	6
116	2012 ,		6
115	Kinetics of the Decomposition of Hydrogen Peroxide in Acidic Copper Sulfate Solutions. <i>Industrial & Engineering Chemistry Research</i> , 2015 , 54, 5589-5597	3.9	5
114	Applying thermodynamics to digestion/gasification processes: the Attainable Region approach. <i>Journal of Thermal Analysis and Calorimetry</i> , 2018 , 131, 25-36	4.1	5
113	Batch Distillation Targets for Minimum Energy Consumption. <i>Industrial & Engineering Chemistry Research</i> , 2014 , 53, 2751-2757	3.9	5
112	Efficient Combustion: A Process Synthesis Approach to Improve the Efficiency of Coal-Fired Power Stations. <i>Industrial & Engineering Chemistry Research</i> , 2012 , 51, 9061-9077	3.9	5
111	An unconventional Au/TiO ₂ PROX system for complete removal of CO from non-reformate hydrogen 2008 , 41, 318-325		5

110	Application of the Attainable Region Concept to the Oxidative Dehydrogenation of 1-Butene in Inert Porous Membrane Reactors. <i>Industrial & Engineering Chemistry Research</i> , 2004 , 43, 1827-1831	3.9	5
109	The cost of crossing reaction equilibrium in a system that is overall adiabatic. <i>Computers and Chemical Engineering</i> , 2002 , 26, 803-809	4	5
108	The attainable region for systems with mixing and multiple-rate processes: finding optimal reactor structures. <i>The Chemical Engineering Journal and the Biochemical Engineering Journal</i> , 1994 , 54, 175-186		5
107	Role of CoO-Co nanoparticles supported on SiO ₂ in Fischer-Tropsch synthesis: Evidence for enhanced CO dissociation and olefin hydrogenation. <i>Fuel Processing Technology</i> , 2021 , 216, 106781	7.2	5
106	Lu Plot and Yao Plot: Models To Analyze Product Distribution of Long-Term Gas-Phase Fischer-Tropsch Synthesis Experimental Data on an Iron Catalyst. <i>Energy & Fuels</i> , 2017 , 31, 5682-5690	4.1	4
105	Process flow sheet synthesis: Systems-level design applied to synthetic crude production. <i>AIChE Journal</i> , 2017 , 63, 5413-5424	3.6	4
104	Experimental Simulation of a Two-Dimensional Attainable Region and Its Application in the Optimization of Production Rate and Process Time of an Adiabatic Batch Reactor. <i>Industrial & Engineering Chemistry Research</i> , 2014 , 53, 13308-13319	3.9	4
103	Fischer-Tropsch synthesis: DRIFTS and SIMS surface investigation of Co and Co/Ru on titania supports. <i>Studies in Surface Science and Catalysis</i> , 1997 , 107, 243-248	1.8	4
102	Reactive column profile map topology: Continuous distillation column with non-reversible kinetics. <i>Computers and Chemical Engineering</i> , 2008 , 32, 622-629	4	4
101	Efficiency of polymer beads in the removal of heparin: toward the development of a novel reactor. <i>Artificial Cells, Blood Substitutes, and Biotechnology</i> , 2006 , 34, 419-32		4
100	Attainable products for the vapour-liquid separation of homogeneous ternary mixtures. <i>The Chemical Engineering Journal and the Biochemical Engineering Journal</i> , 1995 , 59, 51-70		4
99	An anatomic and physiological model of hepatic vascular system. <i>Journal of Applied Physiology</i> , 1995 , 79, 1008-26	3.7	4
98	A periodic flow reversal reactor: An infinitely fast switching model and a practical proposal for its implementation. <i>Canadian Journal of Chemical Engineering</i> , 1996 , 74, 760-765	2.3	4
97	Analysis of the Carbon Efficiency of a Hybrid XTL-CSP process. <i>Computer Aided Chemical Engineering</i> , 2016 , 38, 835-840	0.6	4
96	The effect of hydrophobicity on SiO ₂ -supported Co catalysts in Fischer-Tropsch synthesis. <i>Fuel</i> , 2021 , 296, 120667	7.1	4
95	Fischer-Tropsch synthesis: A long term comparative study of the product selectivity and paraffin to olefin ratios over an iron-based catalyst activated by syngas or H ₂ . <i>Applied Catalysis A: General</i> , 2020 , 602, 117700	5.1	3
94	Steady-State Attainment Period for Fischer-Tropsch Products. <i>Topics in Catalysis</i> , 2014 , 57, 582-587	2.3	3
93	A thermodynamic approach toward defining the limits of biogas production. <i>AIChE Journal</i> , 2015 , 61, 4270-4276	3.6	3

92	Attainable regions for a reactor: Application of H _∞ plot. <i>Chemical Engineering Research and Design</i> , 2012 , 90, 1590-1609	5.5	3
91	A Graphical Method of Improving the Production Rate from Batch Reactors. <i>Industrial & Engineering Chemistry Research</i> , 2012 , 51, 13562-13573	3.9	3
90	On Column Profile Maps: An Analysis of Sharp Splits. <i>Industrial & Engineering Chemistry Research</i> , 2011 , 50, 6331-6342	3.9	3
89	Toward zero waste production in the paint industry. <i>Water S A</i> , 2007 , 30,	1.3	3
88	Process Synthesis for a Reactor-Separator-Recycle System using the Attainable Region Approach. <i>Asia-Pacific Journal of Chemical Engineering</i> , 2008 , 6, 21-39		3
87	Expanding the operating leaves in distillation column sections by distributed feed addition and sidestream withdrawal. <i>Computer Aided Chemical Engineering</i> , 2003 , 15, 1050-1057	0.6	3
86	Costing distillation systems from residue curve based designs. <i>Computers and Chemical Engineering</i> , 2000 , 24, 1275-1280	4	3
85	A catalytic trap for low-temperature complete NO reduction in oxygen-rich media. <i>Chemical Communications</i> , 1996 , 2081	5.8	3
84	Reaction of ethylene over a typical Fischer-Tropsch synthesis Co/TiO ₂ catalyst. <i>Engineering Reports</i> , 2020 , 2, e12232	1.2	3
83	Fischer-Tropsch synthesis with ethene co-feeding: Experimental evidence of the CO-insertion mechanism at low temperature. <i>AIChE Journal</i> , 2020 , 66, e17029	3.6	3
82	Contributing to energy sustainability: a review of mesoporous material supported catalysts for Fischer-Tropsch synthesis. <i>Sustainable Energy and Fuels</i> , 2021 , 5, 79-107	5.8	3
81	The effect of poly-L-lysine/alginate bead membrane characteristics on the absorption of heparin. <i>Artificial Cells, Blood Substitutes, and Biotechnology</i> , 2009 , 37, 13-22		2
80	Introducing novel graphical techniques to assess gasification. <i>Energy Conversion and Management</i> , 2011 , 52, 547-563	10.6	2
79	An overall thermodynamic view of processes: Comparison of fuel producing processes. <i>Chemical Engineering Research and Design</i> , 2010 , 88, 844-860	5.5	2
78	Experimental simulation of distillation concentration profiles using batch apparatus: Column stripping section. <i>Chemical Engineering Science</i> , 2005 , 60, 6815-6823	4.4	2
77	ZIF-8-derived ZnO/C decorated hydroxyl-functionalized multi-walled carbon nanotubes as a new composite electrode for supercapacitor application. <i>Colloids and Interface Science Communications</i> , 2022 , 47, 100589	5.4	2
76	The influence of hydrophobicity on Fischer-Tropsch synthesis catalysts. <i>Reviews in Chemical Engineering</i> , 2019 ,	5	2
75	Production of Fuels and Chemicals from a CO ₂ /H ₂ Mixture. <i>Reactions</i> , 2020 , 1, 130-146	1.5	2

74	Insight into the role of Co ₂ C supported on reduced graphene oxide in Fischer-Tropsch synthesis and ethene hydroformylation. <i>Applied Catalysis A: General</i> , 2021 , 614, 118050	5.1	2
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