Hamilton Varela

List of Publications by Year in descending order

Source: https://exaly.com/author-pdf/5381042/publications.pdf

Version: 2024-02-01

156 papers 3,301 citations

147801 31 h-index 223800 46 g-index

168 all docs

168 docs citations

168 times ranked 2825 citing authors

#	Article	IF	CITATIONS
1	SO2 electrooxidation reaction on Pt single crystal surfaces in acidic media: Electrochemical and in situ FTIR studies. Electrochimica Acta, 2022, 403, 139601.	5.2	8
2	The Impact of Water Concentration on the Electro-Oxidation of Formic Acid on Platinum. Journal of the Electrochemical Society, 2022, 169, 026514.	2.9	3
3	A microkinetic description of electrocatalytic reactions: the role of self-organized phenomena. New Journal of Chemistry, 2022, 46, 6837-6846.	2.8	7
4	Sensitivity Analysis in the Microkinetic Description of Electrocatalytic Reactions. Journal of Physical Chemistry A, 2022, 126, 2746-2749.	2.5	6
5	Modeling the triple-path electro-oxidation of formic acid on platinum: Cyclic voltammetry and oscillations. Catalysis Today, 2021, 359, 90-98.	4.4	30
6	Electrocatalytic Efficiency of the Oxidation of Ethylene Glycol, Glycerol, and Glucose under Oscillatory Regime. Energy & Decimolar Scillatory Regime. Energy & Decimolar Science Scillatory Regime. Energy & Decimolar Scilla	5.1	16
7	The Efficiency of the Electro-Oxidation of Small Organic Molecules: Oscillations and Mechanism. ECS Meeting Abstracts, 2021, MA2021-01, 1949-1949.	0.0	0
8	Micro-Kinetic Modelling of the Electro-Oxidation of Methanol on Platinum. ECS Meeting Abstracts, 2021, MA2021-01, 1961-1961.	0.0	0
9	The Role of Self-Organized Reaction Rates in the Micro-Kinetic Description of Electrocatalytic Reactions. ECS Meeting Abstracts, 2021, MA2021-01, 1952-1952.	0.0	0
10	A Numerical Investigation of the Effect of External Resistance and Applied Potential on the Distribution of Periodicity and Chaos in the Anodic Dissolution of Nickel. ECS Meeting Abstracts, 2021, MA2021-01, 1959-1959.	0.0	0
11	Effect of the oxidation state and morphology of SnOx-based electrocatalysts on the CO2 reduction reaction. Journal of Materials Research, 2021, 36, 4240-4248.	2.6	5
12	Experimental Approaches for Testing the Hypothesis of the Emergence of Life at Submarine Alkaline Vents. Life, 2021, 11, 777.	2.4	9
13	Electro-reduced graphene oxide nanosheets coupled with RuAu bimetallic nanoparticles for efficient hydrogen evolution electrocatalysis. Chemical Engineering Journal, 2021, 421, 129987.	12.7	27
14	Surface and Volumetric Phenomena on Polyaniline-Supported Electrocatalysts. Journal of Physical Chemistry C, 2021, 125, 26073-26083.	3.1	1
15	Phase diagrams and dynamical evolution of the triple-pathway electro-oxidation of formic acid on platinum. Physical Chemistry Chemical Physics, 2020, 22, 1078-1091.	2.8	18
16	Apparent Activation Energy in Electrochemical Multistep Reactions: A Description via Sensitivities and Degrees of Rate Control. ACS Catalysis, 2020, 10, 9336-9345.	11.2	19
17	Active electrochemical interfaces stabilized through self-organized potential oscillations. Electrochemistry Communications, 2020, 121, 106853.	4.7	3
18	Metallic single-atoms confined in carbon nanomaterials for the electrocatalysis of oxygen reduction, oxygen evolution, and hydrogen evolution reactions. Catalysis Science and Technology, 2020, 10, 6420-6448.	4.1	33

#	Article	IF	Citations
19	Thorough Analysis of the Effect of Temperature on the Electro-Oxidation of Formic Acid. Journal of Physical Chemistry C, 2020, 124, 24259-24270.	3.1	9
20	Direct Liquid Fuel Cellsâ€"The Influence of Temperature and Dynamic Instabilities. Energy & Direct Liquid Fuel Cellsâ€"The Influence of Temperature and Dynamic Instabilities. Energy & Direct Liquid Fuel Cellsâ€"The Influence of Temperature and Dynamic Instabilities. Energy & Direct Liquid Fuel Cellsâ€"The Influence of Temperature and Dynamic Instabilities. Energy & Direct Liquid Fuel Cellsâ€"The Influence of Temperature and Dynamic Instabilities. Energy & Direct Liquid Fuel Cellsâ€"The Influence of Temperature and Dynamic Instabilities. Energy & Direct Liquid Fuel Cellsâ€"The Influence of Temperature and Dynamic Instabilities. Energy & Direct Liquid Fuel Cellsâ€"The Influence of Temperature and Dynamic Instabilities. Energy & Direct Liquid Fuel Cellsâ€"The Influence of Temperature and Dynamic Instabilities. Energy & Direct Liquid Fuel Cellsâ€"The Influence of Temperature and Dynamic Instabilities. Energy & Direct Liquid Fuel Cellsâ€"The Influence of Temperature and Dynamic Instabilities. Energy & Direct Liquid Fuel Cellsâ€"The Influence of Temperature and Dynamic Instabilities. Energy & Direct Liquid Fuel Cellsâ€"The Influence of Temperature and Dynamic Instabilities. Energy & Direct Liquid Fuel Cellsâ€"The Influence of Temperature and Dynamic Instabilities. Energy & Direct Liquid Fuel Cellsâ§ The Influence of Temperature and Dynamic Instabilities. Energy & Direct Liquid Fuel Cellsâ§ The Influence of Temperature and Dynamic Instabilities. Energy & Direct Liquid Fuel Cellsâ§ The Influence of Temperature and Dynamic Instabilities. Energy & Direct Liquid Fuel Cellsâ§ The Influence of Temperature and Dynamic Instabilities. Energy & Direct Liquid Fuel Cellsâ§ The Influence of Temperature and Dynamic Instabilities. Energy & Direct Liquid Fuel Cellsâ§ The Influence of Temperature and Dynamic Instabilities. Energy & Direct Liquid Fuel Cellsâ§ The Influence of Temperature and Dynamic Instabilities. Energy & Direct Liquid Fuel Cellsâ§ The Influence of Temperature and Dynamic Instabilities. Energy & Direct Liquid Fuel Ce	5.1	10
21	A numerical investigation of the effect of external resistance and applied potential on the distribution of periodicity and chaos in the anodic dissolution of nickel. Physical Chemistry Chemical Physics, 2020, 22, 21823-21834.	2.8	11
22	Mechanistic aspects of the comparative oscillatory electrochemical oxidation of formic acid and methanol on platinum electrode. Journal of Solid State Electrochemistry, 2020, 24, 1811-1818.	2.5	7
23	A sugar derived carbon-red phosphorus composite for oxygen evolution reaction and supercapacitor activities. Materials Science for Energy Technologies, 2020, 3, 508-514.	1.8	6
24	Trifunctional catalytic activities of trimetallic FeCoNi alloy nanoparticles embedded in a carbon shell for efficient overall water splitting. Journal of Materials Chemistry A, 2020, 8, 9021-9031.	10.3	72
25	Electrocatalytic oxidation of small organic molecules on well-defined Pt single-crystal surfaces with controlled density of electrochemically generated defects. Current Opinion in Electrochemistry, 2020, 23, 123-130.	4.8	5
26	Investigation of persulfate production on BDD anode by understanding the impact of water concentration. Journal of Electroanalytical Chemistry, 2020, 860, 113927.	3.8	53
27	The Impact of Water Concentration on the Electro-Oxidation of Methanol on Platinum. Journal of the Electrochemical Society, 2020, 167, 046506.	2.9	6
28	Influence of Anion Chaotropicity on the SO ₂ Oxidation Reaction: When Spectator Species Determine the Reaction Pathway. ChemElectroChem, 2020, 7, 1843-1850.	3.4	8
29	The Role of Surface Sites on the Oscillatory Oxidation of Methanol on Stepped $Pt[n(111) \tilde{A}-(110)]$ Electrodes. Journal of Physical Chemistry C, 2020, 124, 10993-11004.	3.1	12
30	Pinus nigra pine derived hierarchical carbon foam for high performance supercapacitors. Journal of Electroanalytical Chemistry, 2020, 863, 114053.	3.8	24
31	Electrochemical reduction of CO ₂ to formic acid on Bi ₂ O ₂ CO ₃ /carbon fiber electrodes. Journal of Materials Research, 2020, 35, 272-280.	2.6	14
32	Comparative Oscillatory Electro-Oxidation of Formic Acid on Palladium and on Platinum. ECS Meeting Abstracts, 2020, MA2020-02, 3676-3676.	0.0	0
33	Oscillatory Reaction Rates in the Electro-Oxidation of Formaldehyde on Palladium. ECS Meeting Abstracts, 2020, MA2020-02, 3675-3675.	0.0	0
34	Coupled Dynamics of Anode and Cathode in Protonâ€Exchange Membrane Fuel Cells. ChemPhysChem, 2019, 20, 3081-3088.	2.1	12
35	Opportunities and Knowledge Gaps of SO ₂ Electrocatalytic Oxidation for H ₂ Electrochemical Generation. ACS Catalysis, 2019, 9, 8136-8143.	11.2	22
36	In-situ deposition of reduced graphene oxide layers on textile surfaces by the reactive inkjet printing technique and their use in supercapacitor applications. Synthetic Metals, 2019, 256, 116144.	3.9	46

3

#	Article	IF	CITATIONS
37	8-Hydroxyquinoline-5-sulfonic acid on reduced graphene oxide layers as a metal-free electrode material for supercapacitor applications. Journal of Electroanalytical Chemistry, 2019, 847, 113193.	3.8	14
38	The oscillatory electro-oxidation of formic acid: Insights on the adsorbates involved from time-resolved ATR-SEIRAS and UV reflectance experiments. Journal of Electroanalytical Chemistry, 2019, 840, 249-254.	3.8	6
39	Tuning of catalytic properties for electrooxidation of small organic molecules on Pt-based thin films via controlled thermal treatment. Journal of Catalysis, 2019, 371, 96-105.	6.2	6
40	Oscillatory electro-oxidation of ethanol on platinum studied by in situ ATR-SEIRAS. Electrochimica Acta, 2019, 293, 166-173.	5.2	5
41	Probing the surface fine structure through electrochemical oscillations. Physical Chemistry Chemical Physics, 2018, 20, 5674-5682.	2.8	14
42	A general potentiodynamic approach for red phosphorus and sulfur nanodot incorporation on reduced graphene oxide sheets: metal-free and binder-free electrodes for supercapacitor and hydrogen evolution activities. Journal of Materials Chemistry A, 2018, 6, 3141-3150.	10.3	32
43	Influence of the Electrode and Chaotropicity of the Electrolyte on the Oscillatory Behavior of the Electrocatalytic Oxidation of SO ₂ . Journal of Physical Chemistry C, 2018, 122, 1243-1247.	3.1	11
44	Multifunctional electrocatalysts derived from conducting polymer and metal organic framework complexes. Nano Energy, 2018, 45, 127-135.	16.0	166
45	Nano-flocks of a bimetallic organic framework for efficient hydrogen evolution electrocatalysis. Chemical Communications, 2018, 54, 11048-11051.	4.1	31
46	The effect of solution pH on the oscillatory electro-oxidation of methanol. Journal of Electroanalytical Chemistry, 2018, 826, 164-169.	3.8	21
47	Kinetic Instabilities in Electrocatalysis. , 2018, , 701-718.		11
48	Effect of Annealing Treatment on Electrocatalytic Properties of Copper Electrodes toward Enhanced CO ₂ Reduction. ChemistrySelect, 2018, 3, 9046-9055.	1.5	17
49	Uniformly self-decorated Co ₃ O ₄ nanoparticles on N, S co-doped carbon layers derived from a camphor sulfonic acid and metal–organic framework hybrid as an oxygen evolution electrocatalyst. Journal of Materials Chemistry A, 2018, 6, 12106-12114.	10.3	36
50	Periodic Transition between Breathing Spots and Synchronous Sulfur Deposition/Dissolution in Transpassive Region of the Electroâ€Oxidation of Sulfide on Platinum. ChemElectroChem, 2017, 4, 2075-2078.	3.4	0
51	Microwave-Assisted Synthesis of Pt-Au Nanoparticles with Enhanced Electrocatalytic Activity for the Oxidation of Formic Acid. Electrochimica Acta, 2017, 224, 56-63.	5.2	43
52	The Effect of Solution pH and Temperature on the Oscillatory Electroâ€Oxidation of Formic Acid on Platinum. ChemistrySelect, 2017, 2, 8679-8685.	1.5	9
53	Spectrometric Evidence of the Synergy between Formic Acid and Hydrazine on Their Electro-Oxidation. Journal of the Electrochemical Society, 2017, 164, H647-H650.	2.9	2
54	The effect of flow rate on the oscillatory activation energy of an oscillating reaction. Chemical Physics Letters, 2017, 684, 219-224.	2.6	3

#	Article	IF	Citations
55	Rrde Studies of Glycerol Electro-Oxidation: Local pH Variation and Oscillatory Dynamics. ECS Transactions, 2017, 77, 1643-1650.	0.5	7
56	Voltage Oscillations in a Polymer Electrolyte Membrane Fuel Cell with Pdâ€Pt/C and Pd/C Anodes. ChemistryOpen, 2017, 6, 629-636.	1.9	4
57	Complex Oscillatory Kinetics in the Electro-Oxidation of Glucose on Gold. Journal of the Electrochemical Society, 2017, 164, H603-H607.	2.9	10
58	Temperature dependence of the evolving oscillations along the electrocatalytic oxidation of methanol. Journal of Electroanalytical Chemistry, 2017, 800, 99-105.	3.8	18
59	The effect of temperature on the coupled slow and fast dynamics of an electrochemical oscillator. Scientific Reports, 2016, 6, 24553.	3.3	24
60	Oscillatory Electro-oxidation of Methanol on Platinum Single Crystal Electrodes. Electrocatalysis, 2016, 7, 276-279.	3.0	18
61	Electrocatalytic Efficiency of the Oxidation of Small Organic Molecules under Oscillatory Regime. Journal of Physical Chemistry C, 2016, 120, 22365-22374.	3.1	35
62	Autonomous Voltage Oscillations in a Direct Methanol Fuel Cell. Electrochimica Acta, 2016, 212, 545-552.	5.2	20
63	Complex Dynamics in the Electro-Oxidation of Formic Acid Assisted by Hydrazine in Acidic Media. Journal of the Electrochemical Society, 2016, 163, H186-H191.	2.9	3
64	TURING PATTERNS IN CHEMICAL SYSTEMS. Quimica Nova, 2016, , .	0.3	2
65	Oscillatory Electro-oxidation of Methanol on Nanoarchitectured Pt _{pc} /Rh/Pt Metallic Multilayer. ACS Catalysis, 2015, 5, 1045-1052.	11.2	20
66	Impact of the Alkali Cation on the Oscillatory Electro-Oxidation of Ethylene Glycol on Platinum. Journal of Physical Chemistry C, 2015, 119, 1464-1472.	3.1	27
67	Synergy in the Hydrazine Assisted Electro-Oxidation of Formic Acid. ECS Transactions, 2015, 64, 1-9.	0.5	1
68	Periodicity hubs and spirals in an electrochemical oscillator. Journal of Solid State Electrochemistry, 2015, 19, 3287-3296.	2.5	9
69	Development of a versatile rotating ring-disc electrode for in situ pH measurements. Analytica Chimica Acta, 2015, 897, 17-23.	5.4	23
70	Coupled slow and fast surface dynamics in an electrocatalytic oscillator: Model and simulations. Journal of Chemical Physics, 2014, 141, 234701.	3.0	24
71	Longâ€Lasting Oscillations in the Electroâ€Oxidation of Formic Acid on PtSn Intermetallic Surfaces. ChemPhysChem, 2014, 15, 1753-1760.	2.1	33
72	The effect of the alkali metal cation on the electrocatalytic oxidation of formate on platinum. RSC Advances, 2014, 4, 15271-15275.	3 . 6	19

#	Article	IF	CITATIONS
73	The effect of temperature on the dynamics of a homogeneous oscillatory system operated in batch and under flow. RSC Advances, 2014, 4, 30412-30421.	3.6	6
74	Production of Volatile Species during the Oscillatory Electro-oxidation of Small Organic Molecules. Journal of Physical Chemistry C, 2014, 118, 17699-17709.	3.1	24
75	Oscillatory electro-oxidation of thiosulfate on gold. Electrochimica Acta, 2014, 133, 308-315.	5.2	23
76	ELECTROCHEMICAL SETUP FOR A MULTICHANNEL DATA ACQUISITION SYSTEM WITH SPATIOTEMPORAL RESOLUTION. Quimica Nova, 2014, , .	0.3	0
77	The significance of non-covalent interactions on the electro-oxidation of alcohols on Pt and Au in alkaline media. Electrochemistry Communications, 2013, 33, 10-13.	4.7	45
78	Real-time determination of CO2 production and estimation of adsorbate coverage on a proton exchange membrane fuel cell under oscillatory operation. Journal of Solid State Electrochemistry, 2013, 17, 1851-1859.	2.5	11
79	Amplitude-modulated spiral waves arising from a secondary Hopf bifurcation in mixed-mode oscillatory media. Chemical Physics Letters, 2013, 567, 55-59.	2.6	2
80	Influence of Anion Adsorption on the Parallel Reaction Pathways in the Oscillatory Electro-oxidation of Methanol. Journal of Physical Chemistry C, 2013, 117, 15098-15105.	3.1	38
81	On the failure of sustained oscillations in the bromate/hypophosphite–acetone/dual catalyst flow system. Chemical Physics Letters, 2013, 557, 191-193.	2.6	1
82	Mechanistic aspects of the linear stabilization of non-stationary electrochemical oscillations. Physical Chemistry Chemical Physics, 2013, 15, 1437-1442.	2.8	32
83	Electrocatalytic activity under oscillatory regime: The electro-oxidation of formic acid on ordered Pt3Sn intermetallic phase. Catalysis Communications, 2013, 30, 23-26.	3.3	25
84	The effect of chloride on spatiotemporal dynamics in the electro-oxidation of sulfide on platinum. Electrochimica Acta, 2013, 98, 116-122.	5.2	14
85	Reprint of: Reply to the "Comment on the paper †The role of HBF4 in electro-catalysis: Arsenic contamination and anion adsorption' by A.L. Santos, R. Nagao, C.P. Oliveira, R.B. de Lima, H. Varela [J. Electroanal. Chem. 660 (2011) 147–152]― Journal of Electroanalytical Chemistry, 2013, 689, 318-319.	3.8	0
86	The Electro-Oxidation of Ethylene Glycol on Platinum over a Wide pH Range: Oscillations and Temperature Effects. PLoS ONE, 2013, 8, e75086.	2.5	24
87	Oscillatory Instabilities in the Electrooxidation of Borohydride on Platinum. Journal of the Brazilian Chemical Society, 2013, , .	0.6	1
88	Electrooxidation of ethanol on Pt and PtRu surfaces investigated by ATR surface-enhanced infrared absorption spectroscopy. Journal of the Brazilian Chemical Society, 2012, 23, 831-837.	0.6	7
89	Oscillatory electro-oxidation of glycerol on platinum. Electrochimica Acta, 2012, 85, 674-679.	5.2	29
90	Reply to the "Comment on the paper †The role of HBF4 in electro-catalysis: Arsenic contamination and anion adsorption†by A.L. Santos, R. Nagao, C.P. Oliveira, R.B. de Lima, H. Varela [J. Electroanal. Chem. 660 (2011) 147†152]†Journal of Electroanalytical Chemistry, 2012, 687, 1-2.	3.8	0

#	Article	IF	Citations
91	On the Limit of Frequency of Electrochemical Oscillators and Its Relationship to Kinetic Parameters. Journal of Physical Chemistry C, 2012, 116, 9561-9567.	3.1	10
92	Din \tilde{A}^{ξ} mica oscilat \tilde{A}^{3} ria em sistemas contendo bromato e 1,4-ciclo-hexanodiona em meio \tilde{A}_{i} cido: I. Efeito da temperatura. Quimica Nova, 2012, 35, 348-354.	0.3	1
93	Spatiotemporal Pattern Formation during Electrochemical Oxidation of Hydrogen on Platinum. ChemistryOpen, 2012, 1, 165-168.	1.9	6
94	The dual pathway in action: decoupling parallel routes for CO2 production during the oscillatory electro-oxidation of methanol. Physical Chemistry Chemical Physics, 2012, 14, 8294.	2.8	58
95	The role of Ce(III) in BZ oscillating reactions. Chemical Physics Letters, 2012, 530, 137-139.	2.6	10
96	Open circuit interaction of borohydride with oxidized platinum surfaces. Electrochemistry Communications, 2012 , 16 , $107-109$.	4.7	8
97	Experimental Assessment of the Sensitiveness of an Electrochemical Oscillator towards Chemical Perturbations. PLoS ONE, 2012, 7, e50145.	2.5	18
98	The impact of the alkali cation on the mechanism of the electro-oxidation of ethylene glycol on Pt. Chemical Communications, 2011, 47, 3775.	4.1	50
99	Comment on "Electrochemical Quartz Crystal Microbalance Study of Borohydride Electro-Oxidation on Pt: The Effect of Borohydride Concentration and Thiourea Adsorption― Journal of Physical Chemistry C, 2011, 115, 10310-10311.	3.1	2
100	Spatiotemporal Pattern Formation in the Oscillatory Electro-Oxidation of Sulfide on a Platinum Disk. Journal of Physical Chemistry C, 2011, 115, 12965-12971.	3.1	12
101	Self-organized distribution of periodicity and chaos in an electrochemical oscillator. Physical Chemistry Chemical Physics, 2011, 13, 441-446.	2.8	47
102	The effect of poisoning species on the oscillatory dynamics of an electrochemical reaction. Journal of Physics: Conference Series, 2011, 285, 012003.	0.4	8
103	The role of HBF4 in electro-catalysis: Arsenic contamination and anion adsorption. Journal of Electroanalytical Chemistry, 2011, 660, 147-152.	3.8	5
104	Potential oscillations in a proton exchange membrane fuel cell with a Pd–Pt/C anode. Journal of Power Sources, 2011, 196, 84-89.	7.8	41
105	Da parte para o todo: auto-organização dinâmica em sistemas fÃsico-quÃmicos. Ciência E Cultura, 2011, 63, 23-25.	0.0	2
106	A surface-enhanced infrared absorption spectroscopic (SEIRAS) study of the oscillatory electro-oxidation of methanol on platinum. Journal of Electroanalytical Chemistry, 2010, 642, 17-21.	3.8	54
107	Beta Oscillations in the Electro-oxidation of Ethylene Glycol on Platinum. Electrocatalysis, 2010, 1, 19-21.	3.0	18
108	The impact of water concentration on the catalytic oxidation of ethanol on platinum electrode in concentrated phosphoric acid. Electrochemistry Communications, 2010, 12, 140-143.	4.7	11

#	Article	IF	Citations
109	Effect of temperature on the electro-oxidation of ethanol on platinum. Quimica Nova, 2010, 33, 2143-2147.	0.3	12
110	PEMFC Oscillatory Behavior on a Pd-Pt/C Electrocatalyst. ECS Transactions, 2010, 33, 1-10.	0.5	2
111	Mechanism and model of the oscillatory electro-oxidation of methanol. Journal of Chemical Physics, 2010, 132, 154901.	3.0	15
112	Stabilizing Nonstationary Electrochemical Time Series. Journal of Physical Chemistry C, 2010, 114, 22262-22268.	3.1	55
113	Open Circuit Interaction of Formic Acid with Oxidized Pt Surfaces: Experiments, Modeling, and Simulations. Journal of Physical Chemistry C, 2010, 114, 18494-18500.	3.1	19
114	Complex kinetics, high frequency oscillations and temperature compensation in the electro-oxidation of ethylene glycol on platinum. Physical Chemistry Chemical Physics, 2010, 12, 15195.	2.8	49
115	Complex Oscillatory Response of a PEM Fuel Cell Fed with H[sub 2]/CO and Oxygen. Journal of the Electrochemical Society, 2010, 157, B1301.	2.9	43
116	Nanogravimetric study of the complex voltammetric response in the electro-oxidation of methanol on platinum. Electrochimica Acta, 2009, 55, 404-409.	5.2	9
117	Temperature effects on the oscillatory electro-oxidation of methanol on platinum. Physical Chemistry Chemical Physics, 2009, 11, 665-670.	2.8	49
118	Activation Energies of the Electrooxidation of Formic Acid on Pt(100). Journal of Physical Chemistry C, 2009, 113, 18835-18841.	3.1	32
119	Complex Dynamics in a PEM Fuel Cell. ECS Transactions, 2009, 25, 81-89.	0.5	8
120	Catalytic oxidation of ethanol on gold electrode in alkaline media. Gold Bulletin, 2008, 41, 15-22.	2.7	50
121	On the open-circuit interaction between methanol and oxidized platinum electrodes. Journal of Solid State Electrochemistry, 2008, 12, 559-567.	2.5	20
122	Temperature (Over)Compensation in an Oscillatory Surface Reaction. Journal of Physical Chemistry A, 2008, 112, 4617-4624.	2.5	74
123	The effect of ultra-low proton concentration on the electrocatalytic reduction of nitrate over platinum. Catalysis Communications, 2008, 9, 269-272.	3.3	16
124	Time Evolution of the Activation Energy in a Batch Chemical Oscillator. Journal of Physical Chemistry A, 2008, 112, 12412-12415.	2.5	9
125	Autocatalysis in the open circuit interaction of alcohol molecules with oxidized Pt surfaces. Physical Chemistry Chemical Physics, 2008, 10, 6686.	2.8	18
126	Oscillatory instabilities during the electrocatalytic oxidation of methanol on platinum. Journal of the Brazilian Chemical Society, 2008, 19, 679-687.	0.6	37

#	Article	IF	Citations
127	Co-eletrodeposição oscilatória de cobre e estanho. Quimica Nova, 2008, 31, 1444-1449.	0.3	2
128	Electrocatalytic Reduction of Nitrate over Palladium Nanoparticle Catalysts. Journal of the Electrochemical Society, 2007, 154, F159.	2.9	15
129	Dinâmica complexa no sistema bromato/hipofosfito/acetona/manganês e ferroÃna. Quimica Nova, 2007, 30, 1930-1937.	0.3	3
130	Electrode passivation caused by polymerization of different phenolic compounds. Electrochimica Acta, 2006, 52, 434-442.	5.2	210
131	Asymmetric Target Patterns in One-Dimensional Oscillatory Media with Genuine Nonlocal Coupling. Physical Review Letters, 2005, 94, 198301.	7.8	19
132	Pattern formation in stiff oscillatory media with nonlocal coupling: A numerical study of the hydrogen oxidation reaction on Pt electrodes in the presence of poisons. Physical Review E, 2005, 72, 066211.	2.1	10
133	Transitions to Electrochemical Turbulence. Physical Review Letters, 2005, 94, 174104.	7.8	46
134	A hierarchy of global coupling induced cluster patterns during the oscillatory H2-electrooxidation reaction on a Pt ring-electrode. Physical Chemistry Chemical Physics, 2005, 7, 2429.	2.8	33
135	Stationary Spatial Patterns during Bulk CO Electrooxidation on Platinum. Journal of Physical Chemistry B, 2005, 109, 3408-3415.	2.6	24
136	Stationary Small and Large Amplitude Patterns during Bulk CO Electrooxidation on Platinum. ChemPhysChem, 2003, 4, 1260-1263.	2.1	25
137	Trapping Electrochemical Oscillations between Self-Organized Potential Walls. ChemPhysChem, 2003, 4, 1348-1351.	2.1	7
138	Stability of uniform electrode states in the presence of ohmic drop compensation. Electrochimica Acta, 2003, 49, 103-115.	5.2	35
139	lonic transport in conducting polymers/nickel tetrasulfonated phthalocyanine modified electrodes. Polymer, 2003, 44, 5369-5379.	3.8	34
140	Quantitative Modeling of the Oscillatory Electrooxidation of Hydrogen on Pt in the Presence of Poisons. Zeitschrift Fur Physikalische Chemie, 2003, 217, 365-382.	2.8	14
141	Materiais para cátodos de baterias secundárias de lÃŧio. Quimica Nova, 2002, 25, 287-299.	0.3	29
142	Deciphering the Origin of High-Order Periodic and Aperiodic Cyclic Voltammetric Responses During Oxidation Processes on Platinum. Journal of Physical Chemistry B, 2002, 106, 12258-12266.	2.6	18
143	Spatial bifurcations of fixed points and limit cycles during the electrochemical oxidation of H2 on Pt ring-electrodes. Faraday Discussions, 2002, 120, 165-178.	3.2	29
144	Aspectos relacionados à utilização da equação logÃstica quadrática em processos eletroquÃmicos. Quimica Nova, 2002, 25, 99-106.	0.3	3

#	Article	IF	CITATIONS
145	On the electrochemical polymerization of poly(p-phenylene vinylene) and poly(o-phenylene vinylene). Synthetic Metals, 2001, 118, 65-70.	3.9	19
146	Comparisons of charge compensation process in aqueous media of polyaniline and self-doped polyanilines. Synthetic Metals, 2001, 122, 321-327.	3.9	54
147	Microgravimetric study of the influence of the solvent on the redox properties of polypyrrol modified electrodes. Journal of Power Sources, 2001, 92, 50-55.	7.8	16
148	Nonlinear phenomena during electrochemical oxidation of hydrogen on platinum electrodes. Catalysis Today, 2001, 70, 411-425.	4.4	40
149	Electrodeposition of PbO2 onto Au and Ti substrates. Electrochemistry Communications, 2000, 2, 646-652.	4.7	65
150	Study of charge compensation during the redox process of self-doped polyaniline in aqueous media. Journal of the Brazilian Chemical Society, 2000, 11, 32.	0.6	31
151	Técnicas in situ de baixo custo em eletroquÃmica: a microbalança a cristal de quartzo. Quimica Nova, 2000, 23, 664-679.	0.3	32
152	Ionic Exchange Phenomena Related to the Redox Processes of Polyaniline in Nonaqueous Media. Journal of the Electrochemical Society, 2000, 147, 665.	2.9	41
153	Mixed Cation and Anion Transport during Redox Cycling of a Self-Doped Polyaniline Derivative in Nonaqueous Media. Journal of the Electrochemical Society, 2000, 147, 4217.	2.9	18
154	Reação de geração de oxigênio em eletrodos de Mn2O3 suportados em aço inoxidável. Quimica Nova, 2000, 23, 721-726.	0.3	2
155	Voltage Inversion Caused by Self-organized Oscillations in a Direct Formic Acid Fuel Cell. Matters, 0, ,	1.0	2
156	Electro-oxidation of methanol and glucose on preferentially oriented platinum surfaces: the role of oscillatory kinetics. Reaction Kinetics, Mechanisms and Catalysis, 0, , 1.	1.7	2