Barbara PaÅ‚ys

List of Publications by Year
in descending order

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78 papers	2,227 citations	201385 27 h-index	243296 44 g-index
79 all docs	79 docs citations	79 times ranked	2864 citing authors

#	Article	IF	Citations
1	Network Films Composed of Conducting Polymer-Linked and Polyoxometalate-Stabilized Platinum Nanoparticles. Chemistry of Materials, 2004, 16, 4128-4134.	3.2	148
2	Polyaniline nanotubulesâ€"anion effect on conformation and oxidation state of polyaniline studied by Raman spectroscopy. Synthetic Metals, 2004, 142, 223-229.	2.1	123
3	Template synthesis of polyaniline and poly(2-methoxyaniline) nanotubes: comparison of the formation mechanisms. Electrochemistry Communications, 2003, 5, 403-407.	2.3	88
4	Asymmetry of Electron Transmission through Monolayers of Helical Polyalanine Adsorbed on Gold Surfaces. Journal of Physical Chemistry B, 2005, 109, 18433-18438.	1.2	82
5	Modification of Pt nanoparticles with polyoxometallate monolayers: Competition between activation and blocking of reactive sites for the electrocatalytic oxygen reduction. Electrochimica Acta, 2007, 52, 5574-5581.	2.6	79
6	Microplastics on sandy beaches of the southern Baltic Sea. Marine Pollution Bulletin, 2020, 155, 111170.	2.3	78
7	Contribution of Intermolecular Interactions to Electron Transfer through Monolayers of Alkanethiols Containing Amide Groups. Journal of Physical Chemistry B, 2002, 106, 5907-5914.	1.2	77
8	SERS of 1,8-diaminonaphthalene on gold, silver and copper electrodes Polymerisation and complexes formed with the electrode material. Journal of Electroanalytical Chemistry, 1997, 428, 19-24.	1.9	76
9	Polyoxometallates as inorganic templates for electrocatalytic network films of ultra-thin conducting polymers and platinum nanoparticles. Bioelectrochemistry, 2005, 66, 79-87.	2.4	67
10	Preparation and Characterization of Composites that Contain Small Carbon Nanoâ€Onions and Conducting Polyaniline. Chemistry - A European Journal, 2012, 18, 2600-2608.	1.7	63
11	Sensitivity of poly 1,8-diaminonaphthalene to heavy metal ions â€" electrochemical and vibrational spectra studies. Journal of Electroanalytical Chemistry, 1997, 433, 41-48.	1.9	54
12	Effective Charge Transport in Poly(3,4-ethylenedioxythiophene) Based Hybrid Films Containing Polyoxometallate Redox Centers. Journal of the Electrochemical Society, 2005, 152, E98.	1.3	53
13	Electrochemically reduced graphene oxide on gold nanoparticles modified with a polyoxomolybdate film. Highly sensitive non-enzymatic electrochemical detection of H2O2. Sensors and Actuators B: Chemical, 2018, 258, 745-756.	4.0	52
14	Multiphase-Separated Polyurethanes Studied by Micro-Raman Spectroscopy. Macromolecular Rapid Communications, 2003, 24, 265-268.	2.0	51
15	Orientation of Laccase on Charged Surfaces. Mediatorless Oxygen Reduction on Amino- and Carboxyl-Ended Ethylphenyl Groups. Journal of Physical Chemistry C, 2012, 116, 25911-25918.	1.5	49
16	Resonance Raman spectra of phthalocyanine monolayers on different supports. A normal mode analysis of zinc phthalocyanine by means of the MNDO method. Journal of Raman Spectroscopy, 1995, 26, 63-76.	1.2	48
17	Effect of anions on the electrosynthesis, electroactivity and molecular structure of poly(o-methoxyaniline). Synthetic Metals, 1998, 94, 265-272.	2.1	47
18	Electrosynthesis and spectroelectrochemical characterization of poly(3,4-dimethoxy-thiophene), poly(3,4-dipropyloxythiophene) and poly(3,4-dioctyloxythiophene) films. Electrochimica Acta, 2003, 48, 3665-3676.	2.6	47

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19	Hydration of a Polysulfone Anion-Exchange Membrane Studied by Vibrational Spectroscopy. Langmuir, 2003, 19, 3282-3287.	1.6	44
20	Redox transformations of polyaniline nanotubes. Electrochimica Acta, 2006, 51, 4115-4124.	2.6	38
21	Influence of anions on formation and electroacitivity of poly-2,5-dimethoxyaniline. Synthetic Metals, 2000, 108, 111-119.	2.1	35
22	Graphene and Graphene Oxide Applications for SERS Sensing and Imaging. Current Medicinal Chemistry, 2019, 26, 6878-6895.	1.2	35
23	Ammonia modified graphene oxide â€“ Gold nanoparticles composite as a substrate for surface enhanced Raman spectroscopy. Applied Surface Science, 2021, 554, 149060.	3.1	33
24	Poly-o-phenylenediamine as redox mediator for laccase. Electrochimica Acta, 2007, 52, 7075-7082.	2.6	32
25	The Electrochemical Properties of Nanocomposite Films Obtained by Chemical In Situ Polymerization of Aniline and Carbon Nanostructures. ChemPhysChem, 2013, 14, 116-124.	1.0	32
26	Oxygen reduction in acid media: influence of the activity of CoNPc(1,2) bilayer deposits in relation to their attachment to the carbon black support and role of surface groups as a function of heat treatment. Journal of Electroanalytical Chemistry, 1994, 365, 239-246.	1.9	30
27	Supramolecular polyaniline hydrogel as a support for urease. Electrochimica Acta, 2014, 126, 90-97.	2.6	29
28	Electrode modified with ionic liquid covalently bonded to silicate matrix for accumulation of electroactive anions. Electrochemistry Communications, 2007, 9, 2580-2584.	2.3	26
29	Raman spectroscopic evidence of the bronze-like recharging behavior for conducting films deposited from isopolytungstates. Electrochimica Acta, 2005, 50, 1693-1702.	2.6	23
30	Gold Nanoparticles Tethered to Gold Surfaces Using Nitroxyl Radicals. Journal of Physical Chemistry C, 2011, 115, 7347-7354.	1.5	23
31	Intermolecular interactions in electron transfer through stretched helical peptides. Physical Chemistry Chemical Physics, 2012, 14, 10332.	1.3	23
32	Synthesis and characterization of porous carbonâ€“MoS₂ nanohybrid materials: electrocatalytic performance towards selected biomolecules. Journal of Materials Chemistry B, 2016, 4, 1448-1457.	2.9	23
33	Preparation and spectroelectrochemical characterization of composite films of poly(3,4-ethylenedioxythiophene) with 4-(pyrrole-1-yl) benzoic acid. Journal of Solid State Electrochemistry, 2007, 11, 1023-1030.	1.2	22
34	Fabrication of polyoxometallate-modified gold nanoparticles and their utilization as supports for dispersed platinum in electrocatalysis. Electrochimica Acta, 2011, 56, 10744-10750.	2.6	22
35	Electrodeposited graphene nano-stacks for biosensor applications. Surface groups as redox mediators for laccase. Electrochimica Acta, 2013, 98, 75-81.	2.6	22
36	Enantioselective recognition of sutezolid by cyclodextrin modified non-aqueous capillary electrophoresis and explanation of complex formation by means of infrared spectroscopy, NMR and molecular modelling. Journal of Pharmaceutical and Biomedical Analysis, 2019, 169, 49-59.	1.4	22

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37	Characterisation of gold electrodes modified with methyltrimethoxysilane and (3-mercaptopropyl) trimethoxysilane solâ€“gel processed films. Journal of Electroanalytical Chemistry, 2005, 578, 239-245.	1.9	21
38	Controlled fabrication of multilayered 4-(pyrrole-1-yl) benzoate supported poly(3,4-ethylenedioxythiophene) linked hybrid films of Prussian blue type nickel hexacyanoferrate. Electrochimica Acta, 2007, 53, 1235-1243.	2.6	18
39	Poly-o-aminophenol as a laccase mediator and influence of the enzyme on the polymer electrodeposition. Bioelectrochemistry, 2010, 80, 43-48.	2.4	18
40	Degradability of composites of low density polyethylene/polypropylene blends filled with rape straw. Polymer Degradation and Stability, 2010, 95, 536-542.	2.7	18
41	Spectroscopic and Electrochemical Studies of Bilayer Lipid Membranes Tethered to the Surface of Gold. Journal of the Electrochemical Society, 2002, 149, E189.	1.3	17
42	Electrochemically Reduced Graphene Oxide on Electrochemically Roughened Gold as a Support for Horseradish Peroxidase. Journal of Physical Chemistry C, 2014, 118, 29731-29738.	1.5	17
43	Raman spectra of zinc phthalocyanine monolayers adsorbed on glassy carbon and gold electrodes by application of a confocal Raman microspectrometer. Journal of Electroanalytical Chemistry, 1992, 326, 105-112.	1.9	16
44	Catalytic properties of 4-hydroxythiophenol protected gold nanoclusters supported on gold electrodes. Journal of Electroanalytical Chemistry, 2004, 564, 93-98.	1.9	16
45	In situ deposition of poly(1,8-diaminonaphthalene): from thin films to nanometer-sized structures. Electrochimica Acta, 2005, 50, 2363-2370.	2.6	16
46	Modified Filamentous Bacteriophage as a Scaffold for Carbon Nanofiber. Bioconjugate Chemistry, 2016, 27, 2900-2910.	1.8	16
47	Layers of Polyaniline Nanotubes Deposited by Langmuirâ€“Blodgett Method. Journal of Physical Chemistry C, 2012, 116, 10424-10429.	1.5	14
48	An in-situ Raman study of the effect of the support for adsorbed iridium-chelates in catalysing oxygen reduction. Journal of Electroanalytical Chemistry, 1996, 406, 195-202.	1.9	13
49	One-step electrodeposition of carbonâ€“silicate sponge assisted by a three-phase junction for efficient bioelectrocatalysis. Electrochemistry Communications, 2011, 13, 566-569.	2.3	13
50	Electrosynthesis of thin solâ€“gel films at a three-phase junction. Electrochimica Acta, 2011, 56, 3311-3316.	2.6	12
51	Application of Polarization Modulated Infrared Reflection Absorption Spectroscopy for electrocatalytic activity studies of laccase adsorbed on modified gold electrodes. Electrochimica Acta, 2013, 110, 105-111.	2.6	12
52	Sulphate sensing in self-assembled monolayers by surface infrared and Raman spectroscopy techniques. Sensors and Actuators B: Chemical, 2019, 283, 172-181.	4.0	12
53	Electrochemically Reduced Graphene Oxide â€“ Noble Metal Nanoparticles Nanohybrids for Sensitive Enzyme-Free Detection of Hydrogen Peroxide. Electrocatalysis, 2020, 11, 215-225.	1.5	12
54	Characterisation of biphasic electrodes based on the liquid N,N-didodecyl-Nâ€²Nâ€²-diethylphenylenediamine redox system immobilised on porous hydrophobic silicates and immersed in aqueous media. Journal of Electroanalytical Chemistry, 2005, 582, 202-208.	1.9	11

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55	Silver nanoparticles stabilized by polyoxotungstates. Influence of the silver â€“ Polyoxotungstate molar ratio on UV/Vis spectra and SERS characteristics. Journal of Electroanalytical Chemistry, 2019, 854, 113537.	1.9	11
56	Silverâ€“Graphene Oxide Nanohybrids for Highly Sensitive, Stable SERS Platforms. Frontiers in Chemistry, 2021, 9, 665205.	1.8	11
57	Adsorption of asparagine on the gold electrode and air/solution interface. Electrochimica Acta, 2004, 49, 4109-4118.	2.6	10
58	Covalent binding of sensor phases - a recipe for stable potentials of solid-state ion-selective sensors. Analytica Chimica Acta, 2008, 625, 137-144.	2.6	10
59	Enhancement of Direct Electrocatalytic Activity of Horseradish Peroxidase on Polyaniline Nanotubes. Journal of Physical Chemistry C, 2015, 119, 12514-12522.	1.5	10
60	Comprehensive study of the electrochemical growth and physicochemical properties of polycatecholamines and polycatechol. Electrochimica Acta, 2021, 386, 138515.	2.6	10
61	Effect of axial ligands on the spectroelectrochemical properties of zinc phthalocyanine films. In situ Raman and electroreflection spectra. Journal of Electroanalytical Chemistry, 1994, 379, 89-101.	1.9	9
62	Preparation of ultrathin films of polyaniline and its derivatives by electrochemical deposition on thiol modified gold. Journal of Electroanalytical Chemistry, 2002, 533, 145-152.	1.9	9
63	Effect of the polymerization bath on structure and electrochemical properties of polyaniline-poly(styrene sulfonate) hydrogels. Journal of Electroanalytical Chemistry, 2017, 784, 115-123.	1.9	9
64	Noble Metal Nanoparticles in Pectin Matrix. Preparation, Film Formation, Property Analysis, and Application in Electrocatalysis. ACS Omega, 2020, 5, 23909-23918.	1.6	9
65	Influence of buffer solution on structure and electrochemical properties of poly(3,4-ethylenedioxythiophene)/poly(styrenesulfonate) hydrogels. Synthetic Metals, 2020, 263, 116363.	2.1	9
66	Decoration of MoS2 Nanopetal Stacks with Positively Charged Gold Nanoparticles for Synergistic Electrocatalytic Oxidation of Biologically Relevant Compounds. Electrochimica Acta, 2015, 182, 659-667.	2.6	8
67	Dependence of Interfacial Film Organization on Lipid Molecular Structure. Langmuir, 2014, 30, 11329-11339.	1.6	6
68	Electroassisted click chemistry immobilisation of gold nanoparticles on a solid substrate. Electrochemistry Communications, 2015, 53, 20-23.	2.3	6
69	pH-tunable equilibria in azocrown ethers with histidine moieties. Bioelectrochemistry, 2007, 71, 99-106.	2.4	5
70	Thioacetate-Functionalized Fullerene: Redox Properties and Self-Assembly on the Au(111) Surface. Journal of the Electrochemical Society, 2013, 160, H28-H32.	1.3	5
71	Stabilization and activation of Pd nanoparticles for efficient CO2-reduction: Importance of their generation within supramolecular network of tridentate Schiff-base ligands with N,N coordination sites. Electrochimica Acta, 2021, 388, 138550.	2.6	5
72	Interactions of dithiolated tetraazamacrocyclic copper(ii) and nickel(ii) complexes self-assembled on goldelectrodes with Ï€-electron deficient molecules in solution. Dalton Transactions, 2010, 39, 730-735.	1.6	4

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73	Influence of amine and thiol modifications at the 3â€² ends of single stranded DNA molecules on their adsorption on gold surface and the efficiency of their hybridization. Spectrochimica Acta - Part A: Molecular and Biomolecular Spectroscopy, 2018, 203, 31-39.	2.0	4
74	Anchoring Gold Nanoparticles to Gold Surfaces through Nitroxyl Radicals. ECS Transactions, 2011, 35, 39-45.	0.3	3
75	Spectroscopic identification of intermediates and final products of the chiral pool synthesis of sutezolid. Journal of Molecular Structure, 2020, 1217, 128396.	1.8	2
76	Factors Influencing the Electrocatalytic Properties of Graphene Oxide â€“ Gold Nanoparticles Hybrid System. ChemElectroChem, 2021, 8, 3080-3088.	1.7	2
77	Diazonium-Based Covalent Molecular Wiring of Single-Layer Graphene Leads to Enhanced Unidirectional Photocurrent Generation through the p-doping Effect. Chemistry of Materials, 2022, 34, 3744-3758.	3.2	2
78	(Invited) Enhancement of Photoelectrochemical Water Splitting and Solar Energy Induced Electroreduction of Carbon Dioxide through Utilization of Plasmonic and Electrocatalytic Metal Nanoparticles. ECS Transactions, 2014, 58, 9-20.	0.3	0