Janos Voros

List of Publications by Year in descending order

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214 papers 16,161 citations

25014 57 h-index 121 g-index

222 all docs 222 docs citations

times ranked

222

18846 citing authors

#	Article	IF	CITATIONS
1	Electrochemical Biosensors - Sensor Principles and Architectures. Sensors, 2008, 8, 1400-1458.	2.1	1,607
2	Electronic dura mater for long-term multimodal neural interfaces. Science, 2015, 347, 159-163.	6.0	845
3	The Density and Refractive Index of Adsorbing Protein Layers. Biophysical Journal, 2004, 87, 553-561.	0.2	665
4	Poly(l-lysine)-g-Poly(ethylene glycol) Layers on Metal Oxide Surfaces: Attachment Mechanism and Effects of Polymer Architecture on Resistance to Protein Adsorptionâ€. Journal of Physical Chemistry B, 2000, 104, 3298-3309.	1.2	620
5	A comparative study of protein adsorption on titanium oxide surfaces using in situ ellipsometry, optical waveguide lightmode spectroscopy, and quartz crystal microbalance/dissipation. Colloids and Surfaces B: Biointerfaces, 2002, 24, 155-170.	2.5	608
6	Electrochemical Biosensors - Sensor Principles and Architectures. Sensors, 2008, 8, 1400-1458.	2.1	591
7	Poly(l-lysine)-g-poly(ethylene glycol) Layers on Metal Oxide Surfaces:Â Surface-Analytical Characterization and Resistance to Serum and Fibrinogen Adsorption. Langmuir, 2001, 17, 489-498.	1.6	490
8	Protein Resistance of Titanium Oxide Surfaces Modified by Biologically Inspired mPEGâ^'DOPA. Langmuir, 2005, 21, 640-646.	1.6	423
9	Poly(I-lysine)-graft-poly(ethylene glycol) Assembled Monolayers on Niobium Oxide Surfaces:  A Quantitative Study of the Influence of Polymer Interfacial Architecture on Resistance to Protein Adsorption by ToF-SIMS and in Situ OWLS. Langmuir, 2003, 19, 9216-9225.	1.6	382
10	Optical grating coupler biosensors. Biomaterials, 2002, 23, 3699-3710.	5.7	375
11	FluidFM: Combining Atomic Force Microscopy and Nanofluidics in a Universal Liquid Delivery System for Single Cell Applications and Beyond. Nano Letters, 2009, 9, 2501-2507.	4.5	369
12	RGD-grafted poly-l-lysine-graft-(polyethylene glycol) copolymers block non-specific protein adsorption while promoting cell adhesion. Biotechnology and Bioengineering, 2003, 82, 784-790.	1.7	301
13	Bovine Serum Albumin Adsorption onto Colloidal Al2O3Particles:Â A New Model Based on Zeta Potential and UVâ^'Vis Measurements. Langmuir, 2004, 20, 10055-10061.	1.6	289
14	Effects of Ionic Strength and Surface Charge on Protein Adsorption at PEGylated Surfaces. Journal of Physical Chemistry B, 2005, 109, 17545-17552.	1.2	289
15	Biotin-Derivatized Poly(l-lysine)-g-poly(ethylene glycol):Â A Novel Polymeric Interface for Bioaffinity Sensing. Langmuir, 2002, 18, 220-230.	1.6	261
16	Stretchable electronics based on Ag-PDMS composites. Scientific Reports, 2014, 4, 7254.	1.6	234
17	Highâ€Density Stretchable Electrode Grids for Chronic Neural Recording. Advanced Materials, 2018, 30, e1706520.	11.1	211
18	Liposome and Lipid Bilayer Arrays Towards Biosensing Applications. Small, 2010, 6, 2481-2497.	5.2	191

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19	Skin Conformal Polymer Electrodes for Clinical ECG and EEG Recordings. Advanced Healthcare Materials, 2018, 7, e1700994.	3.9	172
20	Biofunctional Polyelectrolyte Multilayers and Microcapsules: Control of Non-Specific and Bio-Specific Protein Adsorption. Advanced Functional Materials, 2005, 15, 357-366.	7.8	159
21	Optical microarray biosensing techniques. Surface and Interface Analysis, 2006, 38, 1442-1458.	0.8	159
22	Systematic study of osteoblast response to nanotopography by means of nanoparticle-density gradients. Biomaterials, 2007, 28, 5000-5006.	5.7	158
23	Engineering the Extracellular Environment: Strategies for Building 2D and 3D Cellular Structures. Advanced Materials, 2010, 22, 5443-5462.	11.1	147
24	Templateâ€Free 3D Microprinting of Metals Using a Forceâ€Controlled Nanopipette for Layerâ€byâ€Layer Electrodeposition. Advanced Materials, 2016, 28, 2311-2315.	11.1	141
25	An Aqueous-Based Surface Modification of Poly(dimethylsiloxane) with Poly(ethylene glycol) to Prevent Biofouling. Langmuir, 2005, 21, 11957-11962.	1.6	139
26	Title is missing!. Tribology Letters, 2003, 15, 231-239.	1.2	136
27	In situ Sensing of Single Binding Events by Localized Surface Plasmon Resonance. Nano Letters, 2008, 8, 3450-3455.	4.5	134
28	Nonâ€Toxic Dryâ€Coated Nanosilver for Plasmonic Biosensors. Advanced Functional Materials, 2010, 20, 4250-4257.	7.8	119
29	Nitrilotriacetic Acid Functionalized Graft Copolymers: A Polymeric Interface for Selective and Reversible Binding of Histidine-Tagged Proteins. Advanced Functional Materials, 2006, 16, 243-251.	7.8	116
30	Nonspecific Bindingâ€"Fundamental Concepts and Consequences for Biosensing Applications. Chemical Reviews, 2021, 121, 8095-8160.	23.0	113
31	Ligand-specific targeting of microspheres to phagocytes by surface modification with poly(L-lysine)-grafted poly(ethylene glycol) conjugate. Pharmaceutical Research, 2003, 20, 237-246.	1.7	109
32	Title is missing!. Tribology Letters, 2001, 10, 111-116.	1.2	106
33	Stretchable and suturable fibre sensors for wireless monitoring of connective tissue strain. Nature Electronics, 2021, 4, 291-301.	13.1	106
34	Chemically patterned, metal-oxide-based surfaces produced by photolithographic techniques for studying protein- and cell-interactions. II: Protein adsorption and early cell interactions. Biomaterials, 2003, 24, 1147-1158.	5.7	105
35	Single plasmonic nanoparticles for biosensing. Trends in Biotechnology, 2011, 29, 343-351.	4.9	102
36	Nanopatterns with Biological Functions. Journal of Nanoscience and Nanotechnology, 2006, 6, 2237-2264.	0.9	100

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37	Polyelectrolyte Coatings with a Potential for Electronic Control and Cell Sheet Engineering. Advanced Materials, 2008, 20, 560-565.	11.1	100
38	Review of Transducer Principles for Label-Free Biomolecular Interaction Analysis. Biosensors, 2011, 1, 70-92.	2.3	94
39	Switching Transport through Nanopores with pH-Responsive Polymer Brushes for Controlled Ion Permeability. ACS Applied Materials & Samp; Interfaces, 2013, 5, 1400-1407.	4.0	90
40	Micropatterning of DNA-Tagged Vesicles. Langmuir, 2004, 20, 11348-11354.	1.6	89
41	Waveguide excitation fluorescence microscopy: A new tool for sensing and imaging the biointerface. Biosensors and Bioelectronics, 2006, 21, 1476-1482.	5.3	89
42	Metallic Nanodot Arrays by Stencil Lithography for Plasmonic Biosensing Applications. ACS Nano, 2011, 5, 844-853.	7.3	87
43	pH-controlled recovery of placenta-derived mesenchymal stem cell sheets. Biomaterials, 2011, 32, 4376-4384.	5.7	87
44	Force-controlled spatial manipulation of viable mammalian cells and micro-organisms by means of FluidFM technology. Applied Physics Letters, 2010, 97, .	1.5	80
45	Film bulk acoustic resonators for DNA and protein detection and investigation of in vitro bacterial S-layer formation. Sensors and Actuators A: Physical, 2009, 156, 180-184.	2.0	77
46	Stretchable Silver Nanowire–Elastomer Composite Microelectrodes with Tailored Electrical Properties. ACS Applied Materials & Samp; Interfaces, 2015, 7, 13467-13475.	4.0	77
47	Electrochemistry on a Localized Surface Plasmon Resonance Sensor. Langmuir, 2010, 26, 7619-7626.	1.6	76
48	Fast and Efficient Fabrication of Intrinsically Stretchable Multilayer Circuit Boards by Wax Pattern Assisted Filtration. Small, 2016, 12, 180-184.	5.2	72
49	Electrochemical plasmonic sensors. Analytical and Bioanalytical Chemistry, 2012, 402, 1773-1784.	1.9	71
50	Electrochemical optical waveguide lightmode spectroscopy (EC-OWLS): A pilot study using evanescent-field optical sensing under voltage control to monitor polycationic polymer adsorption onto indium tin oxide (ITO)-coated waveguide chips. Biotechnology and Bioengineering, 2003, 82, 465-473.	1.7	69
51	Binding and direct electrochemistry of OmcA, an outer-membrane cytochrome from an iron reducing bacterium, with oxide electrodes: A candidate biofuel cell system. Inorganica Chimica Acta, 2008, 361, 769-777.	1.2	69
52	Engineered Polyelectrolyte Multilayer Substrates for Adhesion, Proliferation, and Differentiation of Human Mesenchymal Stem Cells. Tissue Engineering - Part A, 2009, 15, 2977-2990.	1.6	67
53	Modular microstructure design to build neuronal networks of defined functional connectivity. Biosensors and Bioelectronics, 2018, 122, 75-87.	5.3	67
54	Immobilization of the Enzyme β-Lactamase on Biotin-Derivatized Poly(I-lysine)-g-poly(ethylene) Tj ETQq0 0 0 rgBT	「/Overlock 1.6	10 Tf 50 67 64

and in Situ Optical Sensing. Langmuir, 2004, 20, 10464-10473.

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55	Use of PLL-g-PEG in Micro-Fluidic Devices for Localizing Selective and Specific Protein Binding. Langmuir, 2006, 22, 10103-10108.	1.6	62
56	Force-Controlled Patch Clamp of Beating Cardiac Cells. Nano Letters, 2015, 15, 1743-1750.	4.5	62
57	"Brains on a chip― Towards engineered neural networks. TrAC - Trends in Analytical Chemistry, 2016, 78, 60-69.	5.8	62
58	Swelling and Contraction of Ferrocyanide-Containing Polyelectrolyte Multilayers upon Application of an Electric Potential. Langmuir, 2008, 24, 13668-13676.	1.6	60
59	Improved Stimulation of Human Dendritic Cells by Receptor Engagement with Surface-modified Microparticles. Journal of Drug Targeting, 2003, 11, 11-18.	2.1	58
60	Layer-by-Layer Films Made from Extracellular Matrix Macromolecules on Silicone Substrates. Biomacromolecules, 2011, 12, 609-616.	2.6	57
61	High-Resolution Resistless Nanopatterning on Polymer and Flexible Substrates for Plasmonic Biosensing Using Stencil Masks. ACS Nano, 2012, 6, 5474-5481.	7.3	57
62	Mannose-Based Molecular Patterns on Stealth Microspheres for Receptor-Specific Targeting of Human Antigen-Presenting Cells. Langmuir, 2008, 24, 11790-11802.	1.6	56
63	Functionalizable Nanomorphology Gradients via Colloidal Self-Assembly. Langmuir, 2007, 23, 5929-5935.	1.6	55
64	Ion-induced cell sheet detachment from standard cell culture surfaces coated with polyelectrolytes. Biomaterials, 2012, 33, 3421-3427.	5.7	54
65	Nanoplasmonic sensing of metal–halide complex formation and the electric double layer capacitor. Nanoscale, 2012, 4, 2339.	2.8	53
66	Feasibility study of an online toxicological sensor based on the optical waveguide technique. Biosensors and Bioelectronics, 2000, 15, 423-429.	5.3	52
67	Electrochemical Crystallization of Plasmonic Nanostructures. Nano Letters, 2011, 11, 1337-1343.	4.5	52
68	Predictive Model for the Electrical Transport within Nanowire Networks. ACS Nano, 2018, 12, 11080-11087.	7.3	52
69	Aptamer Conformational Change Enables Serotonin Biosensing with Nanopipettes. Analytical Chemistry, 2021, 93, 4033-4041.	3.2	52
70	Biosensing by Densely Packed and Optically Coupled Plasmonic Particle Arrays. Small, 2009, 5, 1889-1896.	5.2	51
71	Electrochemically switchable platform for the micro-patterning and release of heterotypic cell sheets. Biomedical Microdevices, 2011, 13, 221-230.	1.4	49
72	Localized detection of ions and biomolecules with a force-controlled scanning nanopore microscope. Nature Nanotechnology, 2019, 14, 791-798.	15.6	49

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73	Optoâ€Eâ€Dura: A Soft, Stretchable ECoG Array for Multimodal, Multiscale Neuroscience. Advanced Healthcare Materials, 2020, 9, e2000814.	3.9	48
74	Interaction of Poly(L-Lysine)-g-Poly(Ethylene Glycol) with Supported Phospholipid Bilayers. Biophysical Journal, 2004, 87, 1711-1721.	0.2	47
75	Engineering 3D cell instructive microenvironments by rational assembly of artificial extracellular matrices and cell patterning. Integrative Biology (United Kingdom), 2011, 3, 1102.	0.6	47
76	Selective molecular assembly patterning at the nanoscale: a novel platform for producing protein patterns by electron-beam lithography on SiO2/indium tin oxide-coated glass substrates. Nanotechnology, 2005, 16, 1781-1786.	1.3	46
77	Multifunctional 3D electrode platform for real-time in situ monitoring and stimulation of cardiac tissues. Biosensors and Bioelectronics, 2018, 112, 149-155.	5 . 3	46
78	Techniques for recording reconstituted ion channels. Analyst, The, 2011, 136, 1077.	1.7	45
79	A guide towards long-term functional electrodes interfacing neuronal tissue. Journal of Neural Engineering, 2018, 15, 061001.	1.8	44
80	Exchangeable Colloidal AFM Probes for the Quantification of Irreversible and Long-Term Interactions. Biophysical Journal, 2013, 105, 463-472.	0.2	43
81	FluidFM as a lithography tool in liquid: spatially controlled deposition of fluorescent nanoparticles. Nanoscale, 2013, 5, 1097-1104.	2.8	43
82	Poly(I-lysine)-grafted-poly(ethylene glycol)-based surface-chemical gradients. Preparation, characterization, and first applications. Biointerphases, 2006, 1, 156-165.	0.6	42
83	Nanoscale labels: nanoparticles and liposomes in the development of high-performance biosensors. Nanomedicine, 2009, 4, 447-467.	1.7	42
84	Measuring cell adhesion forces during the cell cycle by force spectroscopy. Biointerphases, 2009, 4, 27-34.	0.6	42
85	Nanopatterning of gold colloids for label-free biosensing. Nanotechnology, 2007, 18, 155306.	1.3	41
86	Effect of polyelectrolyte interdiffusion on electron transport in redox-active polyelectrolyte multilayers. Journal of Materials Chemistry, 2012, 22, 11073.	6.7	40
87	Phosphorylcholine-containing polyurethanes for the control of protein adsorption and cell attachment via photoimmobilized laminin oligopeptides. Journal of Biomaterials Science, Polymer Edition, 1999, 10, 931-955.	1.9	39
88	Electrochemical tuning of the stability of PLL/DNA multilayers. Soft Matter, 2009, 5, 2415.	1.2	39
89	Soft Electronics Based on Stretchable and Conductive Nanocomposites for Biomedical Applications. Advanced Healthcare Materials, 2021, 10, e2001397.	3.9	39
90	Comparison of FBAR and QCM-D sensitivity dependence on adlayer thickness and viscosity. Sensors and Actuators A: Physical, 2011, 165, 415-421.	2.0	38

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91	Local surface modification via confined electrochemical deposition with FluidFM. RSC Advances, 2015, 5, 84517-84522.	1.7	37
92	Focal molography is a new method for the in situ analysis of molecular interactions in biological samples. Nature Nanotechnology, 2017, 12, 1089-1095.	15.6	36
93	Multiscale Additive Manufacturing of Metal Microstructures. Advanced Engineering Materials, 2020, 22, 1900961.	1.6	36
94	Bioactive Patterns at the 100-nm Scale Produced Using Multifunctional Physisorbed Monolayers. MRS Bulletin, 2005, 30, 202-206.	1.7	35
95	A novel crossed microfluidic device for the precise positioning of proteins and vesicles. Lab on A Chip, 2005, 5, 1387.	3.1	35
96	Easy to Apply Polyoxazoline-Based Coating for Precise and Long-Term Control of Neural Patterns. Langmuir, 2017, 33, 8594-8605.	1.6	35
97	A Gigaseal Obtained with a Self-Assembled Long-Lifetime Lipid Bilayer on a Single Polyelectrolyte Multilayer-Filled Nanopore. ACS Nano, 2010, 4, 5047-5054.	7.3	34
98	Swelling of electrochemically active polyelectrolyte multilayers. Current Opinion in Colloid and Interface Science, 2010, 15, 427-434.	3.4	33
99	Ion and Solvent Exchange Processes in PGA/PAH Polyelectrolyte Multilayers Containing Ferrocyanide. Journal of Physical Chemistry B, 2010, 114, 3759-3768.	1.2	33
100	Simultaneous Scanning Ion Conductance Microscopy and Atomic Force Microscopy with Microchanneled Cantilevers. Physical Review Letters, 2015, 115, 238103.	2.9	33
101	Effect of patterns and inhomogeneities on the surface of waveguides used for optical waveguide lightmode spectroscopy applications. Applied Physics B: Lasers and Optics, 2001, 72, 441-447.	1.1	32
102	Soft Electronic Strain Sensor with Chipless Wireless Readout: Toward Real†Time Monitoring of Bladder Volume. Advanced Materials Technologies, 2018, 3, 1800031.	3.0	32
103	Formation of supported lipid bilayers on indium tin oxide for dynamically-patterned membrane-functionalized microelectrode arrays. Lab on A Chip, 2009, 9, 718-725.	3.1	31
104	Cell Adhesion on Dynamic Supramolecular Surfaces Probed by Fluid Force Microscopy-Based Single-Cell Force Spectroscopy. ACS Nano, 2017, 11, 3867-3874.	7.3	31
105	Additive Manufacturing of Sub-Micron to Sub-mm Metal Structures with Hollow AFM Cantilevers. Micromachines, 2020, 11, 6.	1.4	31
106	Gâ€protein coupled receptor array technologies: Site directed immobilisation of liposomes containing the H ₁ â€histamine or M ₂ â€muscarinic receptors. Proteomics, 2009, 9, 2052-2063.	1.3	30
107	Local Polymer Replacement for Neuron Patterning and <i>in Situ</i> Neurite Guidance. Langmuir, 2014, 30, 7037-7046.	1.6	30
108	Multilayer Patterning of High Resolution Intrinsically Stretchable Electronics. Scientific Reports, 2016, 6, 25641.	1.6	30

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109	Strain mapping with optically coupled plasmonic particles embedded in a flexible substrate. Optics Letters, 2009, 34, 2009.	1.7	29
110	Influence of applied currents on the viability of cells close to microelectrodes. Integrative Biology (United Kingdom), 2009, 1, 108-115.	0.6	29
111	SU-8 hollow cantilevers for AFM cell adhesion studies. Journal of Micromechanics and Microengineering, 2016, 26, 055006.	1.5	29
112	Fast and Versatile Multiscale Patterning by Combining Template-Stripping with Nanotransfer Printing. ACS Nano, 2018, 12, 2514-2520.	7.3	29
113	Phagocytosis of poly(L-lysine)-graft-poly (ethylene glycol) coated microspheres by antigen presenting cells: Impact of grafting ratio and poly (ethylene glycol) chain length on cellular recognition. Biointerphases, 2006, 1, 123-133.	0.6	28
114	Electrochemically Stimulated Release from Liposomes Embedded in a Polyelectrolyte Multilayer. Advanced Functional Materials, 2011, 21, 1666-1672.	7.8	28
115	Controlled single-cell deposition and patterning by highly flexible hollow cantilevers. Lab on A Chip, 2016, 16, 1663-1674.	3.1	27
116	Continuous Heart Volume Monitoring by Fully Implantable Soft Strain Sensor. Advanced Healthcare Materials, 2020, 9, e2000855.	3.9	27
117	Global and local view on the electrochemically induced degradation of polyelectrolyte multilayers: from dissolution to delamination. Soft Matter, 2010, 6, 4246.	1.2	26
118	Electrical microcurrent to prevent conditioning film and bacterial adhesion to urological stents. Urological Research, 2011, 39, 81-88.	1.5	26
119	Quantifying the effect of electric current on cell adhesion studied by single-cell force spectroscopy. Biointerphases, 2016, 11, 011004.	0.6	26
120	Self-assembly of functionalized spherical nanoparticles on chemically patterned microstructures. Nanotechnology, 2005, 16, 3045-3052.	1.3	25
121	Location-specific nanoplasmonic sensing of biomolecular binding to lipid membranes with negative curvature. Nanoscale, 2015, 7, 15080-15085.	2.8	25
122	Creation of a functional heterogeneous vesicle array via DNA controlled surface sorting onto a spotted microarray. Biointerphases, 2006, 1, 142-145.	0.6	24
123	Dark-Field Microwells toward High-Throughput Direct miRNA Sensing with Gold Nanoparticles. ACS Sensors, 2019, 4, 1950-1956.	4.0	24
124	Locally Addressable Electrochemical Patterning Technique (LAEPT) applied to poly(L-lysine)-graft-poly(ethylene glycol) adlayers on titanium and silicon oxide surfaces. Biotechnology and Bioengineering, 2005, 91, 285-295.	1.7	22
125	Nanoscale dispensing in liquid environment of streptavidin on a biotin-functionalized surface using hollow atomic force microscopy probes. Microelectronic Engineering, 2009, 86, 1481-1484.	1.1	22
126	Monolayer Graphene Coupled to a Flexible Plasmonic Nanograting for Ultrasensitive Strain Monitoring. Small, 2018, 14, e1801187.	5.2	22

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127	Unsupervised data to content transformation with histogram-matching cycle-consistent generative adversarial networks. Nature Machine Intelligence, 2019, 1, 461-470.	8.3	22
128	Shape-dependent sensitivity of single plasmonic nanoparticles for biosensing. Journal of Biomedical Optics, 2009, 14, 064027.	1.4	21
129	Optical sensing and determination of complex reflection coefficients of plasmonic structures using transmission interferometric plasmonic sensor. Review of Scientific Instruments, 2010, 81, 053102.	0.6	21
130	A universal method for planar lipid bilayer formation by freeze and thaw. Soft Matter, 2012, 8, 5525.	1.2	21
131	Electrochemically driven delivery to cells from vesicles embedded in polyelectrolyte multilayers. Soft Matter, 2012, 8, 3641.	1.2	21
132	Directed Self-Assembly of Lipid Nanotubes from Inverted Hexagonal Structures. ACS Nano, 2012, 6, 6626-6632.	7.3	21
133	Enzyme Mediated Site-Specific Surface Modification. Langmuir, 2010, 26, 11127-11134.	1.6	19
134	Sensing serotonin secreted from human serotonergic neurons using aptamer-modified nanopipettes. Molecular Psychiatry, 2021, 26, 2753-2763.	4.1	19
135	Simultaneous OWLS and EIS monitoring of supported lipid bilayers with the pore forming peptide melittin. Sensors and Actuators B: Chemical, 2012, 161, 600-606.	4.0	18
136	An analytical method to control the surface density and stability of DNA-gold nanoparticles for an optimized biosensor. Colloids and Surfaces B: Biointerfaces, 2020, 187, 110650.	2.5	18
137	Electrically controlling cell adhesion, growth and migration. Colloids and Surfaces B: Biointerfaces, 2010, 79, 365-371.	2.5	17
138	From nanodroplets to continuous films: how the morphology of polyelectrolyte multilayers depends on the dielectric permittivity and the surface charge of the supporting substrate. Soft Matter, 2011, 7, 3861.	1.2	17
139	Adhesion of Polyelectrolyte Microcapsules through Biotinâ^'Streptavidin Specific Interaction. Biomacromolecules, 2006, 7, 2331-2336.	2.6	16
140	Vesicles for Signal Amplification in a Biosensor for the Detection of Low Antigen Concentrations. Sensors, 2008, 8, 7894-7903.	2.1	16
141	Electrochemical Control of the Enzymatic Polymerization of PEG Hydrogels: Formation of Spatially Controlled Biological Microenvironments. Advanced Healthcare Materials, 2014, 3, 508-514.	3.9	16
142	Simple and Inexpensive Paper-Based Astrocyte Co-culture to Improve Survival of Low-Density Neuronal Networks. Frontiers in Neuroscience, 2018, 12, 94.	1.4	16
143	Adsorption and electrically stimulated desorption of the triblock copolymer poly(propylene) Tj ETQq1 1 0.784314	4 rgBT /O\ 0.8	verlock 10 Tf 15
144	Simultaneous refractive index and thickness measurement with the transmission interferometric adsorption sensor. Journal Physics D: Applied Physics, 2010, 43, 405302.	1.3	15

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145	Optical Sensing with Simultaneous Electrochemical Control in Metal Nanowire Arrays. Sensors, 2010, 10, 9808-9830.	2.1	15
146	Simultaneous electrical and plasmonic monitoring of potential induced ion adsorption on metal nanowire arrays. Nanoscale, 2013, 5, 4966.	2.8	15
147	Principles for Sensitive and Robust Biomolecular Interaction Analysis: The Limits of Detection and Resolution of Diffraction-Limited Focal Molography. Physical Review Applied, 2019, 11, .	1.5	15
148	Engineered Biological Neural Networks on High Density CMOS Microelectrode Arrays. Frontiers in Neuroscience, 2022, 16, 829884.	1.4	15
149	Spontaneous Formation of a Vesicle Multilayer on Top of an Exponentially Growing Polyelectrolyte Multilayer Mediated by Diffusing Poly- <scp>l</scp> -lysine. Journal of Physical Chemistry B, 2011, 115, 12386-12391.	1.2	14
150	Tuning the Electrochemical Swelling of Polyelectrolyte Multilayers toward Nanoactuation. Langmuir, 2014, 30, 12057-12066.	1.6	14
151	Local Chemical Stimulation of Neurons with the Fluidic Force Microscope (FluidFM). ChemPhysChem, 2018, 19, 1234-1244.	1.0	14
152	A Versatile Protein and Cell Patterning Method Suitable for Long-Term Neural Cultures. Langmuir, 2019, 35, 2966-2975.	1.6	14
153	A Microwell Array Platform for Picoliter Membrane Protein Assays. Small, 2009, 5, 1070-1077.	5.2	13
154	Soft Hydrogels Featuring In-Depth Surface Density Gradients for the Simple Establishment of 3D Tissue Models for Screening Applications. SLAS Discovery, 2017, 22, 635-644.	1.4	13
155	An experimental paradigm to investigate stimulation dependent activity in topologically constrained neuronal networks. Biosensors and Bioelectronics, 2022, 201, 113896.	5. 3	13
156	Symmetry Decomposed Multiple Multipole Program Calculation of Plasmonic Particles on Substrate for Biosensing Applications. Journal of Computational and Theoretical Nanoscience, 2009, 6, 749-756.	0.4	12
157	Simultaneous scanning ion conductance and atomic force microscopy with a nanopore: Effect of the aperture edge on the ion current images. Journal of Applied Physics, 2018, 124, .	1.1	12
158	Topologically controlled circuits of human iPSC-derived neurons for electrophysiology recordings. Lab on A Chip, 2022, 22, 1386-1403.	3.1	12
159	Zirconium Ion Mediated Formation of Liposome Multilayers. Langmuir, 2010, 26, 10995-11002.	1.6	11
160	Microarrays Made Easy: Biofunctionalized Hydrogel Channels for Rapid Protein Microarray Production. ACS Applied Materials & Samp; Interfaces, 2011, 3, 50-57.	4.0	11
161	Twist on Protein Microarrays: Layering Wax-Patterned Nitrocellulose to Create Customizable and Separable Arrays of Multiplexed Affinity Columns. Analytical Chemistry, 2014, 86, 4209-4216.	3.2	11
162	Serial weighting of micro-objects with resonant microchanneled cantilevers. Nanotechnology, 2016, 27, 415502.	1.3	11

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163	Paper-based patterned 3D neural cultures as a tool to study network activity on multielectrode arrays. RSC Advances, 2017, 7, 39359-39371.	1.7	11
164	FluidFM: Development of the Instrument as well as Its Applications for 2D and 3D Lithography. , 0, , 295-323.		11
165	Ultra Stable Molecular Sensors by Submicron Referencing and Why They Should Be Interrogated by Optical Diffractionâ€"Part II. Experimental Demonstration. Sensors, 2021, 21, 9.	2.1	11
166	Quantification of Molecular Interactions in Living Cells in Real Time using a Membrane Protein Nanopattern. Analytical Chemistry, 2020, 92, 8983-8991.	3.2	10
167	Trends in Epidermal Stretchable Electronics for Noninvasive Long-term Healthcare Applications. International Journal of Automation and Smart Technology, 2017, 7, 37-52.	0.4	10
168	Light-Induced In Situ Patterning of DNA-Tagged Biomolecules and Nanoparticles. IEEE Transactions on Nanobioscience, 2006, 5, 215-219.	2.2	9
169	Nanowire Development and Characterization for Applications in Biosensing., 2009,, 143-173.		9
170	The entropy of water in swelling PGA/PAH polyelectrolyte multilayers. Soft Matter, 2014, 10, 688-693.	1.2	9
171	Femtomolar oligonucleotide detection by a one-step gold nanoparticle-based assay. Colloids and Surfaces B: Biointerfaces, 2015, 135, 193-200.	2.5	9
172	Force-Controlled Formation of Dynamic Nanopores for Single-Biomolecule Sensing and Single-Cell Secretomics. ACS Nano, 2020, 14, 12993-13003.	7.3	9
173	Visualizing and Analyzing 3D Metal Nanowire Networks for Stretchable Electronics. Advanced Theory and Simulations, 2020, 3, 2000038.	1.3	9
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