

Thomas Stieglitz

List of Publications by Year in descending order

Source: <https://exaly.com/author-pdf/5912648/publications.pdf>

Version: 2024-02-01

421
papers

14,313
citations

24978

57
h-index

28224

105
g-index

454
all docs

454
docs citations

454
times ranked

10404
citing authors

#	ARTICLE	IF	CITATIONS
1	Toward higher-performance bionic limbs for wider clinical use. <i>Nature Biomedical Engineering</i> , 2023, 7, 473-485.	11.6	104
2	Unilateral transfemoral amputees exhibit altered strength and dynamics of muscular co-activation modulated by visual feedback. <i>Journal of Neural Engineering</i> , 2022, 19, 016024.	1.8	1
3	On the longevity of flexible neural interfaces: Establishing biostability of polyimide-based intracortical implants. <i>Biomaterials</i> , 2022, 281, 121372.	5.7	27
4	Bidirectional bionic limbs: a perspective bridging technology and physiology. <i>Journal of Neural Engineering</i> , 2022, 19, 013001.	1.8	7
5	Poly(3,4-ethylenedioxythiophene)-Based Neural Interfaces for Recording and Stimulation: Fundamental Aspects and In Vivo Applications. <i>Advanced Science</i> , 2022, 9, e2104701.	5.6	32
6	An optoelectronic neural interface approach for precise superposition of optical and electrical stimulation in flexible array structures. <i>Biosensors and Bioelectronics</i> , 2022, 205, 114090.	5.3	3
7	Predicting Corrosion Delamination Failure in Active Implantable Medical Devices: Analytical Model and Validation Strategy. <i>Bioengineering</i> , 2022, 9, 10.	1.6	4
8	Why Neurotechnologies? About the Purposes, Opportunities and Limitations of Neurotechnologies in Clinical Applications. <i>Neuroethics</i> , 2021, 14, 5-16.	1.7	17
9	Implantable Device Fabrication and Packaging. , 2021, , 1-49.		2
10	Therapies of the Future. , 2021, , 355-377.		0
11	Low-frequency electrical stimulation reduces cortical excitability in the human brain. <i>NeuroImage: Clinical</i> , 2021, 31, 102778.	1.4	15
12	3D-Printed Hermetic Alumina Housings. <i>Materials</i> , 2021, 14, 200.	1.3	15
13	Reliability of Neural Implants—Effective Method for Cleaning and Surface Preparation of Ceramics. <i>Micromachines</i> , 2021, 12, 209.	1.4	5
14	A Psychometric Platform to Collect Somatosensory Sensations for Neuroprosthetic Use. <i>Frontiers in Medical Technology</i> , 2021, 3, 619280.	1.3	13
15	Computational approaches to decode grasping force and velocity level in upper-limb amputee from intraneural peripheral signals. <i>Journal of Neural Engineering</i> , 2021, 18, 055001.	1.8	12
16	Neurotech-Ethics: Suggestions for the Way Forward. , 2021, , .		0
17	A stepping stone to enable preclinical evaluation of multimodal thin-film probes in small animal models. , 2021, , .		0
18	An Optimized EEG-Based Seizure Detection Algorithm for Implantable Devices. , 2021, , .		0

#	ARTICLE	IF	CITATIONS
19	On the Stability of Porous Platinum Coatings for In-Ear EEG Applications. , 2021, , .		0
20	Prediction of Speech Onset by Micro-Electrocorticography of the Human Brain. International Journal of Neural Systems, 2021, 31, 2150025.	3.2	6
21	Numerical Evaluation on Residual Thermal Stress-Induced Delamination at PDMSâ€Metal Interface of Neural Prostheses. Micromachines, 2021, 12, 669.	1.4	4
22	Extraction of Radial-Artery Strain and Stiffness by Using Noninvasive Ultrasound and a Low-Power Peak Detector. , 2021, 5, 1-4.		1
23	Editorial: Wearable and Implantable Technologies in the Rehabilitation of Patients With Sensory Impairments. Frontiers in Neuroscience, 2021, 15, 740263.	1.4	0
24	Carbon-based neural electrodes: promises and challenges. Journal of Neural Engineering, 2021, 18, 041007.	1.8	29
25	Radium isotopes as submarine groundwater discharge (SGD) tracers: Review and recommendations. Earth-Science Reviews, 2021, 220, 103681.	4.0	51
26	Influence of Augmented Visual Feedback on Balance Control in Unilateral Transfemoral Amputees. Frontiers in Neuroscience, 2021, 15, 727527.	1.4	4
27	New Stimulation Device to Drive Multiple Transverse Intrafascicular Electrodes and Achieve Highly Selective and Rich Neural Responses. Sensors, 2021, 21, 7219.	2.1	6
28	Intrafascicular peripheral nerve stimulation produces fine functional hand movements in primates. Science Translational Medicine, 2021, 13, eabg6463.	5.8	30
29	Transcriptional characterization of the glial response due to chronic neural implantation of flexible microprobes. Biomaterials, 2021, 279, 121230.	5.7	12
30	Real-Time Multirate Filtering of Digitized Torque Signals on Tiva Microcontroller using Fixed-Point Design with MATLAB. Current Directions in Biomedical Engineering, 2021, 7, 717-720.	0.2	1
31	Design of Experiment Evaluation of a 2.5D Printing Process for Implantable PDMS-based Neural Interfaces. , 2021, 2021, 6433-6436.		1
32	Scalable Batch Transfer of Individual Silicon Dice for Ultra-Flexible Polyimide-Based Bioelectronic Devices. , 2021, 2021, 6880-6883.		4
33	Low-Temperature Sealing of Titanium for Hermetic Implant Packages. IEEE Transactions on Components, Packaging and Manufacturing Technology, 2021, 11, 2046-2054.	1.4	0
34	Automatic detection of high-frequency-oscillations and their sub-groups co-occurring with interictal-epileptic-spikes. Journal of Neural Engineering, 2020, 17, 016030.	1.8	22
35	Of Man and Mice: Translational Research in Neurotechnology. Neuron, 2020, 105, 12-15.	3.8	25
36	Flexible Bioelectronic Devices Based on Micropatterned Monolithic Carbon Fiber Mats. Advanced Materials Technologies, 2020, 5, 1900713.	3.0	21

#	ARTICLE	IF	CITATIONS
37	Tutorial: guidelines for standardized performance tests for electrodes intended for neural interfaces and bioelectronics. <i>Nature Protocols</i> , 2020, 15, 3557-3578.	5.5	142
38	Cortical plasticity after hand prostheses use: Is the hypothesis of deafferented cortex "invasion" always true?. <i>Clinical Neurophysiology</i> , 2020, 131, 2341-2348.	0.7	5
39	Intermuscular coupling and postural control in unilateral transfemoral amputees " a pilot study* . , 2020, 2020, 3815-3818.		0
40	Sensitivity to temporal parameters of intraneural tactile sensory feedback. <i>Journal of NeuroEngineering and Rehabilitation</i> , 2020, 17, 110.	2.4	15
41	Thin Film Metallization Stacks Serve as Reliable Conductors on Ceramic-Based Substrates for Active Implants. <i>IEEE Transactions on Components, Packaging and Manufacturing Technology</i> , 2020, 10, 1803-1813.	1.4	6
42	Conformable polyimide-based $\frac{1}{4}$ ECOGs: Bringing the electrodes closer to the signal source. <i>Biomaterials</i> , 2020, 255, 120178.	5.7	58
43	Stability of flexible thin-film metallization stimulation electrodes: analysis of explants after first-in-human study and improvement of in vivo performance. <i>Journal of Neural Engineering</i> , 2020, 17, 046006.	1.8	38
44	Decoding of grasping tasks from intraneural recordings in trans-radial amputee. <i>Journal of Neural Engineering</i> , 2020, 17, 026034.	1.8	39
45	Highly Porous Platinum Electrodes for Dry Ear-EEG Measurements. <i>Sensors</i> , 2020, 20, 3176.	2.1	15
46	Novel desiccant-based very low humidity indicator for condition monitoring in miniaturized hermetic packages of active implants. <i>Sensors and Actuators B: Chemical</i> , 2020, 322, 128555.	4.0	14
47	Medial forebrain bundle DBS differentially modulates dopamine release in the nucleus accumbens in a rodent model of depression. <i>Experimental Neurology</i> , 2020, 327, 113224.	2.0	13
48	Flexible Bioelectronics: Flexible Bioelectronic Devices Based on Micropatterned Monolithic Carbon Fiber Mats (Adv. Mater. Technol. 2/2020). <i>Advanced Materials Technologies</i> , 2020, 5, 2070009.	3.0	0
49	Morphological Neural Computation Restores Discrimination of Naturalistic Textures in Trans-radial Amputees. <i>Scientific Reports</i> , 2020, 10, 527.	1.6	30
50	Neural Implants Without Electronics: A Proof-of-Concept Study on a Human Skin Model. <i>IEEE Open Journal of Engineering in Medicine and Biology</i> , 2020, 1, 91-97.	1.7	2
51	Nutrient Fluxes Associated With Submarine Groundwater Discharge From Karstic Coastal Aquifers (Côte Bleue, French Mediterranean Coastline). <i>Frontiers in Environmental Science</i> , 2020, 7, .	1.5	11
52	Hand Control With Invasive Feedback Is Not Impaired by Increased Cognitive Load. <i>Frontiers in Bioengineering and Biotechnology</i> , 2020, 8, 287.	2.0	31
53	Fabrication and validation of reference structures for the localization of subdural standard- and micro-electrodes in MRI. <i>Journal of Neural Engineering</i> , 2020, 17, 046044.	1.8	4
54	Obstacles to Prosthetic Care"Legal and Ethical Aspects of Access to Upper and Lower Limb Prosthetics in Germany and the Improvement of Prosthetic Care from a Social Perspective. <i>Societies</i> , 2020, 10, 10.	0.8	5

#	ARTICLE	IF	CITATIONS
55	Wenn Technik den Nerv trifft â€“ Strom fÃ¼r elektronische Pillen und fÃ¼hlende Prothesen. , 2020, , 141-158.		0
56	Investigation of Long-Term Stability of Hybrid Systems-in-Foil (HySiF) for Biomedical Applications. , 2020, , .		1
57	Polyimide-based Thin Film Conductors for High Frequency Data Transmission in Ultra- Conformable Implants. Current Directions in Biomedical Engineering, 2020, 6, 481-485.	0.2	5
58	Multisensory bionic limb to achieve prosthesis embodiment and reduce distorted phantom limb perceptions. Journal of Neurology, Neurosurgery and Psychiatry, 2019, 90, 833-836.	0.9	101
59	Solder-free miniaturized interconnection technology for neural interfaces*. , 2019, , .		2
60	Developing Next-Generation Brain Sensing Technologiesâ€”A Review. IEEE Sensors Journal, 2019, 19, 10163-10175.	2.4	26
61	Robust and Precise Alignment Monitoring of Electrode Arrays for Capacitive Energy Supply and Signal Transmission. , 2019, , .		2
62	Quantitative synchrotron X-ray tomography of the material-tissue interface in rat cortex implanted with neural probes. Scientific Reports, 2019, 9, 7646.	1.6	12
63	Electrical connectors for neural implants: design, state of the art and future challenges of an underestimated component. Journal of Neural Engineering, 2019, 16, 061002.	1.8	28
64	Temporal variability of lagoonâ€™sea water exchange and seawater circulation through a Mediterranean barrier beach. Limnology and Oceanography, 2019, 64, 2059-2080.	1.6	20
65	Experimental Characterization of Optoacoustic Phantoms in Gel Wax and Polyvinyl Alcohol for Blood Pressure Measurements. , 2019, 2019, 5820-5823.		1
66	Stability of polyimide integrated ITO electrodes. , 2019, , .		0
67	3D Patterned Thin-Film Electrodes for Neural Prostheticsâ€”Proof of Concept. , 2019, , .		0
68	Sensory feedback restoration in leg amputees improves walking speed, metabolic cost and phantom pain. Nature Medicine, 2019, 25, 1356-1363.	15.2	174
69	Pulsed electropolymerization of PEDOT enabling controlled branching. Polymer Journal, 2019, 51, 1029-1036.	1.3	18
70	Neuromuscular adaptations and sensorimotor integration following a unilateral transfemoral amputation. Journal of NeuroEngineering and Rehabilitation, 2019, 16, 115.	2.4	29
71	Enhancing functional abilities and cognitive integration of the lower limb prosthesis. Science Translational Medicine, 2019, 11, .	5.8	133
72	Submarine Groundwater Discharge: Updates on Its Measurement Techniques, Geophysical Drivers, Magnitudes, and Effects. Frontiers in Environmental Science, 2019, 7, .	1.5	158

#	ARTICLE	IF	CITATIONS
73	Optimal integration of intraneural somatosensory feedback with visual information: a single-case study. <i>Scientific Reports</i> , 2019, 9, 7916.	1.6	38
74	Context-specific modulation of intrinsic coupling modes shapes multisensory processing. <i>Science Advances</i> , 2019, 5, eaar7633.	4.7	11
75	It's the little things: On the complexity of planar electrode heating in MRI. <i>NeuroImage</i> , 2019, 195, 272-284.	2.1	8
76	Long-Term Functionality of Transversal Intraneural Electrodes is Improved by Dexamethasone Treatment. <i>IEEE Transactions on Neural Systems and Rehabilitation Engineering</i> , 2019, 27, 457-464.	2.7	15
77	Intraneural sensory feedback restores grip force control and motor coordination while using a prosthetic hand. <i>Journal of Neural Engineering</i> , 2019, 16, 026034.	1.8	66
78	A closed-loop hand prosthesis with simultaneous intraneural tactile and position feedback. <i>Science Robotics</i> , 2019, 4, .	9.9	198
79	Integration of Micro-Patterned Carbon Fiber Mats into Polyimide for the Development of Flexible Implantable Neural Devices. , 2019, 2019, 3931-3934.		2
80	Electrochemical Characterization and Surface Analysis of Activated Glassy Carbon Neural Electrodes. , 2019, 2019, 3923-3926.		2
81	Estimation of the epileptogenic-zone with HFO sub-groups exhibiting various levels of epileptogenicity*. , 2019, 2019, 2543-2546.		2
82	Electrochemical Stability of Thin-Film Platinum as Suitable Material for Neural Stimulation Electrodes. , 2019, 2019, 3762-3765.		2
83	Characterization of multi-channel intraneural stimulation in transradial amputees. <i>Scientific Reports</i> , 2019, 9, 19258.	1.6	51
84	Six-Month Assessment of a Hand Prosthesis with Intraneural Tactile Feedback. <i>Annals of Neurology</i> , 2019, 85, 137-154.	2.8	140
85	Development of an Intraneural Peripheral Stimulation Paradigm for the Restoration of Fine Hand Control in Non-human Primates. <i>Biosystems and Biorobotics</i> , 2019, , 112-116.	0.2	0
86	Reliability of spring interconnects for high channel-count polyimide electrode arrays. <i>Journal of Micromechanics and Microengineering</i> , 2018, 28, 055007.	1.5	3
87	Should patients with brain implants undergo MRI?. <i>Journal of Neural Engineering</i> , 2018, 15, 041002.	1.8	78
88	On the use of Parylene C polymer as substrate for peripheral nerve electrodes. <i>Scientific Reports</i> , 2018, 8, 5965.	1.6	57
89	Integrated optoelectronic microprobes. <i>Current Opinion in Neurobiology</i> , 2018, 50, 72-82.	2.0	18
90	Paradigms for restoration of somatosensory feedback via stimulation of the peripheral nervous system. <i>Clinical Neurophysiology</i> , 2018, 129, 851-862.	0.7	60

#	ARTICLE	IF	CITATIONS
91	A single channel sleep-spindle detector based on multivariate classification of EEG epochs: MUSSDET. Journal of Neuroscience Methods, 2018, 297, 31-43.	1.3	16
92	Three-beams spring interconnects for long-term high density flexible electrode arrays. , 2018, , .		4
93	Phantom somatosensory evoked potentials following selective intraneural electrical stimulation in two amputees. Clinical Neurophysiology, 2018, 129, 1117-1120.	0.7	35
94	Simulation of effects of the electrode structure and material in the density measuring system of the peripheral nerve based on micro-electrical impedance tomography. Biomedizinische Technik, 2018, 63, 151-161.	0.9	4
95	Incorporation of Silicon Carbide and Diamond-Like Carbon as Adhesion Promoters Improves In Vitro and In Vivo Stability of Thin-Film Glassy Carbon Electrocorticography Arrays. Advanced Biology, 2018, 2, 1700081.	3.0	24
96	Deep Learning for micro-Electrocorticographic (μ ECoG) Data*. , 2018, , .		1
97	Implantable Glass Waveguides and Coating Materials for Chronic Optical Medical Applications. , 2018, 2018, 4595-4598.		0
98	Low temperature approach for high density electrical feedthroughs for neural implants using maskless fabrication techniques. , 2018, 2018, 2933-2936.		7
99	PDMS Gasket Underfill for Long-Term Insulation of High-Density Interconnections in Active Implantable Medical Devices. , 2018, 2018, 2941-2944.		1
100	Comparison of linear frequency and amplitude modulation for intraneural sensory feedback in bidirectional hand prostheses. Scientific Reports, 2018, 8, 16666.	1.6	85
101	Achieving Ultra-Conformability With Polyimide-Based ECoG Arrays. , 2018, 2018, 4464-4467.		8
102	Integrity Assessment of a Hybrid DBS Probe that Enables Neurotransmitter Detection Simultaneously to Electrical Stimulation and Recording. Micromachines, 2018, 9, 510.	1.4	12
103	Neurophysiological Evaluation of a Customizable $\frac{1}{4}$ ECoG-based Wireless Brain Implant*. , 2018, 2018, 2953-2956.		0
104	Micro-folded 3D neural electrodes fully integrated in polyimide. , 2018, 2018, 4587-4590.		1
105	Synchrony surfacing: Epicortical recording of correlated action potentials. European Journal of Neuroscience, 2018, 48, 3583-3596.	1.2	16
106	Glassy Carbon Electrocorticography Electrodes on Ultra-Thin and Finger-Like Polyimide Substrate: Performance Evaluation Based on Different Electrode Diameters. Materials, 2018, 11, 2486.	1.3	23
107	In Situ Measurement of Stimulus Induced pH Changes Using ThinFilm Embedded IrOx pH Electrodes. , 2018, 2018, 5049-5052.		3
108	Graphitic Carbon Electrodes on Flexible Substrate for Neural Applications Entirely Fabricated Using Infrared Nanosecond Laser Technology. Scientific Reports, 2018, 8, 14749.	1.6	24

#	ARTICLE	IF	CITATIONS
109	Biomimetic Intra-neural Sensory Feedback Enhances Sensation Naturalness, Tactile Sensitivity, and Manual Dexterity in a Bidirectional Prosthesis. <i>Neuron</i> , 2018, 100, 37-45.e7.	3.8	265
110	A comparison between water circulation and terrestrially-driven dissolved silica fluxes to the Mediterranean Sea traced using radium isotopes. <i>Geochimica Et Cosmochimica Acta</i> , 2018, 238, 496-515.	1.6	35
111	How to record high-frequency oscillations in epilepsy: A practical guideline. <i>Epilepsia</i> , 2017, 58, 1305-1315.	2.6	127
112	Actively controlled release of Dexamethasone from neural microelectrodes in a chronic in vivo study. <i>Biomaterials</i> , 2017, 129, 176-187.	5.7	154
113	Influence of Anatomical Detail and Tissue Conductivity Variations in Simulations of Multi-Contact Nerve Cuff Recordings. <i>IEEE Transactions on Neural Systems and Rehabilitation Engineering</i> , 2017, 25, 1653-1662.	2.7	15
114	Long-Term Stable Adhesion for Conducting Polymers in Biomedical Applications: IrOx and Nanostructured Platinum Solve the Chronic Challenge. <i>ACS Applied Materials & Interfaces</i> , 2017, 9, 189-197.	4.0	143
115	Improved long-term stability of thin-film glassy carbon electrodes through the use of silicon carbide and amorphous carbon. , 2017, , .		3
116	Closed-loop interaction with the cerebral cortex using a novel micro-ECoG-based implant: the impact of beta vs. gamma stimulation frequencies on cortico-cortical spectral responses. <i>Brain-Computer Interfaces</i> , 2017, 4, 214-224.	0.9	8
117	Mapping the fine structure of cortical activity with different micro-ECoG electrode array geometries. <i>Journal of Neural Engineering</i> , 2017, 14, 056004.	1.8	28
118	Combining airborne thermal infrared images and radium isotopes to study submarine groundwater discharge along the French Mediterranean coastline. <i>Journal of Hydrology: Regional Studies</i> , 2017, 13, 72-90.	1.0	34
119	Dynamic reconfiguration of cortical functional connectivity across brain states. <i>Scientific Reports</i> , 2017, 7, 8797.	1.6	30
120	Closed-loop interaction with the cerebral cortex: a review of wireless implant technology. <i>Brain-Computer Interfaces</i> , 2017, 4, 146-154.	0.9	44
121	Return of the cadaver. <i>Medicine (United States)</i> , 2017, 96, e7528.	0.4	28
122	Application of the Acoustic Propagation Model to a deep-sea water cross-shelf curtain. <i>Methods in Ecology and Evolution</i> , 2017, 8, 1305-1308.	2.2	3
123	Rapid prototyping of flexible intrafascicular electrode arrays by picosecond laser structuring. <i>Journal of Neural Engineering</i> , 2017, 14, 066016.	1.8	21
124	Investigations on effects of the hole size to fix electrodes and interconnection lines in polydimethylsiloxane. <i>Journal of Micromechanics and Microengineering</i> , 2017, 27, 115008.	1.5	0
125	On the Use of Intra-neural Transversal Electrodes to Develop Bidirectional Bionic Limbs. <i>Biosystems and Biorobotics</i> , 2017, , 737-741.	0.2	0
126	Advanced 56 Channels Stimulation System to Drive Intrafascicular Electrodes. <i>Biosystems and Biorobotics</i> , 2017, , 743-747.	0.2	6

#	ARTICLE	IF	CITATIONS
127	Let There Be Light—Optoprobes for Neural Implants. Proceedings of the IEEE, 2017, 105, 101-138.	16.4	51
128	Design of contact zone topography for implantable high-channel electrical connectors. , 2017, 2017, 238-241.		1
129	Precise localization of silicone-based intercranial planar electrodes in magnetic resonance imaging. , 2017, 2017, 513-516.		0
130	Nanostructured platinum as an electrochemically and mechanically stable electrode coating. , 2017, 2017, 1058-1061.		4
131	Design of experiment evaluation of sputtered thin film platinum surface metallization on alumina substrate for implantable conductive structures. , 2017, 2017, 1066-1069.		6
132	Building wireless implantable neural interfaces within weeks for neuroscientists. , 2017, 2017, 1078-1081.		4
133	A 64-channels neural interface for biopotentials recording and PNS stimulation. , 2017, 2017, 1938-1941.		1
134	Session 27: Bioelectronics and electroceuticals. Biomedizinische Technik, 2017, 62, .	0.9	0
135	Depuration, augmentation and balancing of training data for supervised learning based detectors of EEG patterns. , 2017, , .		1
136	Concept and Development of an Electronic Framework Intended for Electrode and Surrounding Environment Characterization In Vivo. Sensors, 2017, 17, 59.	2.1	3
137	Mechanical deformation and chemical degradation of thin-film platinum under aging and electrical stimulation. , 2017, , .		5
138	Dual-sided process with graded interfaces for adhering underfill and globtop materials to microelectrode arrays. , 2017, , .		2
139	On Biocompatibility and Stability of Transversal Intrafascicular Multichannel Electrodes—TIME. Biosystems and Biorobotics, 2017, , 731-735.	0.2	5
140	Laser-induced carbon pyrolysis of electrodes for neural interface systems. European Journal of Translational Myology, 2016, 26, 6062.	0.8	8
141	Laser patterned PDMS gasket as voids-free underfill material for implantable biomedical microsystems. , 2016, , .		3
142	Epoxy casting used as nonhermetic encapsulation technique for implantable electronic devices. , 2016, 2016, 1938-1941.		5
143	Investigations on different epoxies for electrical insulation of microflex structures. , 2016, 2016, 1963-1966.		3
144	Investigation on the hermeticity of an implantable package with 32 feedthroughs for neural prosthetic applications. , 2016, 2016, 1967-1970.		4

#	ARTICLE	IF	CITATIONS
145	Effect of Cardiac-Cycle-Synchronized Selective Vagal Stimulation on Heart Rate and Blood Pressure in Rats. <i>Advances in Therapy</i> , 2016, 33, 1246-1261.	1.3	18
146	Development of a desiccant based dielectric for monitoring humidity conditions in miniaturized hermetic implantable packages. <i>Current Directions in Biomedical Engineering</i> , 2016, 2, 537-541.	0.2	1
147	Brachyuran crab community structure and associated sediment reworking activities in pioneer and young mangroves of French Guiana, South America. <i>Estuarine, Coastal and Shelf Science</i> , 2016, 182, 60-71.	0.9	25
148	Intracortical polyimide electrodes with a bioresorbable coating. <i>Biomedical Microdevices</i> , 2016, 18, 81.	1.4	13
149	The influence of environmental parameters on the performance and detection range of acoustic receivers. <i>Methods in Ecology and Evolution</i> , 2016, 7, 825-835.	2.2	106
150	Influence of Clonidine on Antihypertensive Selective Afferent Vagal Nerve Stimulation in Rats. <i>Neuromodulation</i> , 2016, 19, 597-606.	0.4	3
151	A double-sided fabrication process for intrafascicular parylene C based electrode arrays. , 2016, 2016, 2798-2801.		3
152	Differentiation of spindle associated hippocampal HFOs based on a correlation analysis. , 2016, 2016, 5501-5504.		5
153	In vivo characterization of a versatile 8-channel digital biopotential recording system with sub- $\frac{1}{4}$ V<inf>RMS</inf> input noise. , 2016, 2016, 6311-6314.		1
154	Design considerations for miniaturized optical neural probes. , 2016, , .		0
155	Estimation of the Electrode-Fiber Bioelectrical Coupling From Extracellularly Recorded Single Fiber Action Potentials. <i>IEEE Transactions on Neural Systems and Rehabilitation Engineering</i> , 2016, 24, 951-960.	2.7	8
156	Haemodynamic Responses to Selective Vagal Nerve Stimulation under Enalapril Medication in Rats. <i>PLoS ONE</i> , 2016, 11, e0147045.	1.1	15
157	Evaluation of adhesion promoters for Parylene C on gold metallization. <i>Current Directions in Biomedical Engineering</i> , 2015, 1, 493-497.	0.2	11
158	Fused silica microlenses for hermetic packages as part of implantable optrodes. , 2015, 2015, 7143-6.		5
159	Non-hermetic encapsulation for implantable electronic devices based on epoxy. , 2015, 2015, 809-12.		13
160	Fabrication and implantation of hydrogel coated, flexible polyimide electrodes. , 2015, , .		5
161	Mechanical deformation of thin film platinum under electrical stimulation. , 2015, 2015, 1045-8.		5
162	Development of a single-sided Parylene C based intrafascicular multichannel electrode for peripheral nerves. , 2015, , .		3

#	ARTICLE	IF	CITATIONS
163	Inductive Micro-tunnel for an Efficient Power Transfer. <i>Procedia Engineering</i> , 2015, 120, 511-515.	1.2	0
164	Track K. Imaging. <i>Biomedizinische Technik</i> , 2015, 60, s193-226.	0.9	1
165	Iridium Oxide (IrOx) serves as adhesion promoter for conducting polymers on neural microelectrodes. , 2015, , .		3
166	Subchronic Stimulation Performance of Transverse Intrafascicular Multichannel Electrodes in the Median Nerve of the <i>CATtingen Minipig</i> . <i>Artificial Organs</i> , 2015, 39, E36-48.	1.0	12
167	Development of a bending test procedure for the characterization of flexible ECoG electrode arrays. <i>Current Directions in Biomedical Engineering</i> , 2015, 1, 510-514.	0.2	2
168	iNODE in-vivo testing for selective vagus nerve recording and stimulation. , 2015, , .		0
169	The influence of stimulation parameters on the relative phase clustering index. , 2015, , .		0
170	Development of a multichannel implantable connector. , 2015, 2015, 805-8.		3
171	Decreasing stimulation charge by delaying the discharge phase - comparison of efficacy for various stimulation waveforms. , 2015, , .		0
172	Novel concept for a wireless and batteryless brain implant array. , 2015, , .		0
173	Delaying discharge after the stimulus significantly decreases muscle activation thresholds with small impact on the selectivity: an in vivo study using TIME. <i>Medical and Biological Engineering and Computing</i> , 2015, 53, 371-379.	1.6	18
174	Submarine groundwater discharge from tropical islands: a review. <i>Grundwasser</i> , 2015, 20, 53-67.	1.4	81
175	RFID Technology for Continuous Monitoring of Physiological Signals in Small Animals. <i>IEEE Transactions on Biomedical Engineering</i> , 2015, 62, 618-626.	2.5	14
176	Nanostructured platinum grass enables superior impedance reduction for neural microelectrodes. <i>Biomaterials</i> , 2015, 67, 346-353.	5.7	130
177	Technically assisted rehabilitation " approaches for the upper extremity. <i>Biomedizinische Technik</i> , 2015, 60, 177-8.	0.9	0
178	Toward the Development of a Neuro-Controlled Bidirectional Hand Prosthesis. <i>Lecture Notes in Computer Science</i> , 2015, , 105-110.	1.0	0
179	Hybrid multimodal Deep Brain probe (DBS array) for advanced brain research. , 2015, , .		0
180	In-vivo characterization of a 0.8 – 3 µV<inf>RMS</inf> input-noise versatile CMOS pre-amplifier. , 2015, , .		3

#	ARTICLE	IF	CITATIONS
181	Evaluation of thin-film temperature sensors for integration in neural probes. , 2015, , .		1
182	Intrinsic coupling modes reveal the functional architecture of cortico-tectal networks. Science Advances, 2015, 1, e1500229.	4.7	15
183	Biocompatibility evaluation of parylene C and polyimide as substrates for peripheral nerve interfaces. , 2015, , .		20
184	Integration of temperature sensors in polyimide-based thin-film electrode arrays. Current Directions in Biomedical Engineering, 2015, 1, 529-533.	0.2	5
185	Anti-inflammatory polymer electrodes for glial scar treatment: bringing the conceptual idea to future results. Frontiers in Neuroengineering, 2014, 7, 9.	4.8	23
186	In vivo monitoring of glial scar proliferation on chronically implanted neural electrodes by fiber optical coherence tomography. Frontiers in Neuroengineering, 2014, 7, 34.	4.8	42
187	Stratigraphic controls on fluid and solute fluxes across the sedimentâ€™water interface of an estuary. Limnology and Oceanography, 2014, 59, 997-1010.	1.6	40
188	A polymer-metal two step sealing concept for hermetic neural implant packages. , 2014, 2014, 3981-4.		5
189	Investigations on stability of implanted nervous thin-film electrodes. , 2014, , .		3
190	Fabrication of flat electrodes utilizing picosecond laser manufacturing technology: Preliminary study for fabrication of a novel transverse intrafascicular multichannel electrode. , 2014, , .		3
191	Suitability of SU-8, EpoClad and EpoCore for flexible waveguides on implantable neural probes. , 2014, 2014, 438-41.		12
192	Morphological and electrochemical properties of an explanted PtIr electrode array after 15 months in vivo. , 2014, 2014, 418-21.		4
193	Mapping of sheep sensory cortex with a novel microelectrocorticography grid. Journal of Comparative Neurology, 2014, 522, 3590-3608.	0.9	33
194	Cuff electrodes for very small diameter nerves — Prototyping and first recordings in vivo. , 2014, 2014, 6846-9.		23
195	Bioelectric interfaces for the peripheral nervous system. , 2014, 2014, 5272-5.		1
196	In situ monitoring of brain tissue reaction of chronically implanted electrodes with an optical coherence tomography fiber system. , 2014, , .		1
197	Neural probes â€™ microsystems to interface with the brain. Biomedizinische Technik, 2014, 59, 269-71.	0.9	2
198	Blood pressure control with selective vagal nerve stimulation and minimal side effects. Journal of Neural Engineering, 2014, 11, 036011.	1.8	142

#	ARTICLE	IF	CITATIONS
199	Restoring Natural Sensory Feedback in Real-Time Bidirectional Hand Prostheses. <i>Science Translational Medicine</i> , 2014, 6, 222ra19.	5.8	805
200	Stimulation Selectivity of the "Thin-Film Longitudinal Intrafascicular Electrode" (tfLIFE) and the "Transverse Intrafascicular Multi-Channel Electrode" (TIME) in the Large Nerve Animal Model. <i>IEEE Transactions on Neural Systems and Rehabilitation Engineering</i> , 2014, 22, 400-410.	2.7	65
201	Genetically engineered bacteriophage delivers a tumor necrosis factor alpha antagonist coating on neural electrodes. <i>Biomedical Materials (Bristol)</i> , 2014, 9, 015009.	1.7	5
202	Hermetic Electrical Feedthroughs Based on the Diffusion of Platinum into Silicon. <i>International Symposium on Microelectronics</i> , 2014, 2014, 000729-000734.	0.3	2
203	The effects of annealing on mechanical, chemical, and physical properties and structural stability of Parylene C. <i>Biomedical Microdevices</i> , 2013, 15, 727-735.	1.4	104
204	Reliability investigations and improvements of interconnection technologies for the wireless brain-machine interface — ‘BrainCon’. , 2013, , .		3
205	The influence of hot-steam sterilization on hydrated sputtered iridium oxide films. , 2013, , .		3
206	Modular assembly of flexible thin-film electrode arrays enabled by a laser-structured ceramic adapter. , 2013, , .		4
207	Have coral calcification rates slowed in the last twenty years?. <i>Marine Geology</i> , 2013, 346, 392-399.	0.9	10
208	A polymer-based neural microimplant for optogenetic applications: design and first in vivo study. <i>Lab on A Chip</i> , 2013, 13, 579.	3.1	94
209	Comment on "Towards ecologically relevant targets for river pollutant loads to the Great Barrier Reef" by F.J. Kroon. <i>Marine Pollution Bulletin</i> , 2013, 66, 259-262.	2.3	2
210	Silicone rubber and thin-film polyimide for hybrid neural interfaces — A MEMS-based adhesion promotion technique. , 2013, , .		18
211	Impact of Sterilization Procedures on the Stability of Parylene Based Flexible Multilayer Structures. <i>Biomedizinische Technik</i> , 2013, 58 Suppl 1, .	0.9	4
212	Microassembly and micropackaging of implantable systems. , 2013, , 108-149.		23
213	BaroLoop: Using a multichannel cuff electrode and selective stimulation to reduce blood pressure. , 2013, 2013, 755-8.		13
214	Laser-fabrication of neural electrode arrays with sputtered iridium oxide film. , 2013, , .		2
215	Prescreening seizure-like events in a rat model of epilepsy A: A 2D video processing method. , 2013, , .		0
216	Prescreening seizure-like events in a rat model of epilepsy B: A 3D online video processing method. , 2013, , .		0

#	ARTICLE	IF	CITATIONS
217	The Influence of Flux on the Reliability of Solder-Sealed Hermetic Packages for Active Implantable Medical Devices. Biomedizinische Technik, 2013, 58 Suppl 1, .	0.9	0
218	In-Vitro Evaluation of a Drainage Catheter with Integrated Bioimpedance Electrodes to Determine Ventricular Size. Biomedizinische Technik, 2013, 58 Suppl 1, .	0.9	0
219	Material-tissue interfaces in implantable systems. , 2013, , 39-67.		3
220	Selektive Ableitung und Stimulation für ein blutdrucksenkendes Implantat unter Verwendung von Vielkanal-Cuff-Elektroden. TM Technisches Messen, 2013, 80, 163-172.	0.3	0
221	Laser-structured ceramic adapters for reliable assembly of flexible thin-film electrodes. Biomedizinische Technik, 2013, 58 Suppl 1, .	0.9	7
222	Towards the Development of Implantable Connectors with High Contact Number. Biomedizinische Technik, 2013, 58 Suppl 1, .	0.9	1
223	Comparison of Stimulation Selectivity in Monopolar and Bipolar Configuration Using the Transversal Intrafascicular Multichannel Electrode (TIME) - Preliminary Results. Biosystems and Biorobotics, 2013, , 79-83.	0.2	1
224	Computational Tissue Volume Reconstruction of a Peripheral Nerve Using High-Resolution Light-Microscopy and Reconstruct. PLoS ONE, 2013, 8, e66191.	1.1	6
225	Long-term Adhesion Studies of Polyimide to Inorganic and Metallic Layers. Materials Research Society Symposia Proceedings, 2012, 1466, 1.	0.1	16
226	A transverse intrafascicular multichannel electrode (TIME) to treat phantom limb pain — Towards human clinical trials. , 2012, , .		30
227	Hermetic glass soldered micro-packages for a vision prosthesis. , 2012, 2012, 2784-7.		7
228	Detection of baroreceptor activity in rat vagal nerve recording using a multi-channel cuff-electrode and real-time coherent averaging. , 2012, 2012, 3416-9.		12
229	Improved polyimide thin-film electrodes for neural implants. , 2012, 2012, 5134-7.		37
230	Parylene-coated metal tracks for neural electrode arrays - Fabrication approaches and improvements utilizing different laser systems. , 2012, 2012, 5130-3.		5
231	Natural muscular recruitment during reaching tasks to control hand prostheses. , 2012, , .		1
232	Technically assisted rehabilitation. Biomedizinische Technik, 2012, 57, 423-5.	0.9	0
233	Development of a neurotechnological system for relieving phantom limb pain using transverse intrafascicular electrodes (TIME). Biomedizinische Technik, 2012, 57, 457-65.	0.9	8
234	Electrodes. , 2012, , 8-43.		4

#	ARTICLE	IF	CITATIONS
235	Long term in vivo stability and frequency response of polyimide based flexible array probes. Biomedizinische Technik, 2012, 57, .	0.9	2
236	Hermetic electronic packaging of an implantable brain-machine-interface with transcutaneous optical data communication. , 2012, 2012, 3886-9.		30
237	Kinetics of the Water/Air Phase Transition of Radon and Its Implication on Detection of Radon-in-Water Concentrations: Practical Assessment of Different On-Site Radon Extraction Methods. Environmental Science & Technology, 2012, 46, 8945-8951.	4.6	27
238	A 232-channel retinal vision prosthesis with a miniaturized hermetic package. , 2012, 2012, 2796-9.		26
239	Thin films and microelectrode arrays for neuroprosthetics. MRS Bulletin, 2012, 37, 590-598.	1.7	112
240	Attentional Stimulus Selection through Selective Synchronization between Monkey Visual Areas. Neuron, 2012, 75, 875-888.	3.8	665
241	Miniaturized neural interfaces and implants. , 2012, , .		6
242	Towards Electrocorticographic Electrodes for Chronic Use in BCI Applications. Biological and Medical Physics Series, 2012, , 85-103.	0.3	2
243	Intelligent Telemetric Implants. Biomedizinische Technik, 2012, 57, .	0.9	2
244	The influence of annealing on the electrical stability of Parylene C structures. Biomedizinische Technik, 2012, 57, .	0.9	1
245	Optimization of the electrical properties of SiC-improved polyimide based thin-film electrode arrays for neuroprosthetics. Biomedizinische Technik, 2012, 57, .	0.9	0
246	Molecular Sieves as Getter Material for Active Implantable Medical Devices. Biomedizinische Technik, 2012, 57, .	0.9	0
247	A Study of Conditioned Flexible Electrodes In Vivo and In Vitro. Biomedizinische Technik, 2012, 57, .	0.9	0
248	A hybrid miniaturized hermetic vision prosthesis with 232 stimulating channels. Biomedizinische Technik, 2012, 57, .	0.9	0
249	Selective Stimulation of the Vagal Nerve Reduces Blood Pressure without Side Effects. Biomedizinische Technik, 2012, 57, .	0.9	3
250	Possibilities offered by implantable miniaturized cuff-electrodes for insect neurophysiology. Neurocomputing, 2012, 84, 3-12.	3.5	5
251	Isotopic, geophysical and biogeochemical investigation of submarine groundwater discharge: IAEA-UNESCO intercomparison exercise at Mauritius Island. Journal of Environmental Radioactivity, 2012, 104, 24-45.	0.9	62
252	Evaluation of polyimide as substrate material for electrodes to interface the peripheral nervous system. , 2011, , .		10

#	ARTICLE	IF	CITATIONS
253	Laser-fabrication of peripheral nerve cuff electrodes with integrated microfluidic channels. , 2011, , .		5
254	Measuring epileptogenicity in kainic acid injected rats. , 2011, , .		4
255	Comparative analysis of transverse intrafascicular multichannel, longitudinal intrafascicular and multipolar cuff electrodes for the selective stimulation of nerve fascicles. Journal of Neural Engineering, 2011, 8, 036023.	1.8	183
256	Diffusion-Limited Deposition of Parylene C. Journal of Microelectromechanical Systems, 2011, 20, 239-250.	1.7	17
257	A novel platinum nanowire-coated neural electrode and its electrochemical and biological characterization. , 2011, , .		3
258	On the Stability of Poly��thylenedioxythiophene as Coating Material for Active Neural Implants. Artificial Organs, 2011, 35, 245-248.	1.0	44
259	Evaluation of ��CoG electrode arrays in the minipig: Experimental procedure and neurosurgical approach. Journal of Neuroscience Methods, 2011, 202, 77-86.	1.3	17
260	Biocompatibility of Chronically Implanted Transverse Intrafascicular Multichannel Electrode (TIME) in the Rat Sciatic Nerve. IEEE Transactions on Biomedical Engineering, 2011, 58, 2324-2332.	2.5	87
261	Use of an Experimentally Derived Leadfield in the Peripheral Nerve Pathway Discrimination Problem. IEEE Transactions on Neural Systems and Rehabilitation Engineering, 2011, 19, 147-156.	2.7	32
262	First long term in vivo study on subdurally implanted Micro-ECoG electrodes, manufactured with a novel laser technology. Biomedical Microdevices, 2011, 13, 59-68.	1.4	96
263	Polymers for neural implants. Journal of Polymer Science, Part B: Polymer Physics, 2011, 49, 18-33.	2.4	406
264	High-porous platinum electrodes for functional electrical stimulation. , 2011, 2011, 5404-7.		11
265	A framework for the discrimination of neural pathways using multi-contact nerve cuff electrodes. , 2011, 2011, 4645-8.		1
266	A blister-test apparatus for studies on the adhesion of materials used for neural electrodes. , 2011, 2011, 2953-6.		2
267	Polymer-based shaft microelectrodes with optical and fluidic capabilities as a tool for optogenetics. , 2011, 2011, 2969-72.		16
268	Mechanical characterization of neural electrodes based on PDMS-parylene C-PDMS sandwiched system. , 2011, 2011, 640-3.		14
269	Technically assisted rehabilitation. Biomedizinische Technik, 2011, 56, 3-4.	0.9	0
270	Chronic intracortical implantation of saccharose-coated flexible shaft electrodes into the cortex of rats. , 2011, 2011, 644-7.		11

#	ARTICLE	IF	CITATIONS
271	Ensuring minimal humidity levels in hermetic implant housings. , 2011, 2011, 2296-9.		15
272	Developments towards a Psychophysical Testing Platform - A Computerized Tool to Control, Deliver and Evaluate Electrical Stimulation to Relieve Phantom Limb Pain. IFMBE Proceedings, 2011, , 137-140.	0.2	2
273	Manufacturing, assembling and packaging of miniaturized neural implants. Microsystem Technologies, 2010, 16, 723-734.	1.2	68
274	Characterization of parylene C as an encapsulation material for implanted neural prostheses. Journal of Biomedical Materials Research - Part B Applied Biomaterials, 2010, 93B, 266-274.	1.6	149
275	In vitro evaluation of the long-term stability of polyimide as a material for neural implants. Biomaterials, 2010, 31, 3449-3458.	5.7	193
276	A transverse intrafascicular multichannel electrode (TIME) to interface with the peripheral nerve. Biosensors and Bioelectronics, 2010, 26, 62-69.	5.3	396
277	EMERGING ISSUES SEMINAR: EXPLORING THE FORMATION OF A WORKING GROUP TO EXAMINE THE SUBTERRANEAN ESTUARY. Limnology and Oceanography Bulletin, 2010, 19, 69-70.	0.2	0
278	Preliminary investigations on laminin coatings for flexible polyimide/platinum thin films for PNS applications. , 2010, 2010, 1527-30.		3
279	Development of an implantable transverse intrafascicular multichannel electrode (TIME) system for relieving phantom limb pain. , 2010, 2010, 6214-7.		10
280	Discrete cortical responses from multi-site supra-choroidal electrical stimulation in the feline retina. , 2010, 2010, 5879-82.		4
281	A device for vacuum drying, inert gas backfilling and solder sealing of hermetic implant packages. , 2010, 2010, 1577-80.		9
282	A transparent electrode array for simultaneous cortical potential recording and intrinsic signal optical imaging. , 2010, 2010, 1796-9.		1
283	Quantifying the suspended sediment discharge to the ocean from the Markham River, Papua New Guinea. Continental Shelf Research, 2010, 30, 1030-1041.	0.9	8
284	An Active Approach for Charge Balancing in Functional Electrical Stimulation. IEEE Transactions on Biomedical Circuits and Systems, 2010, 4, 162-170.	2.7	143
285	Fabrication and test of a hermetic miniature implant package with 360 electrical feedthroughs. , 2010, 2010, 1585-8.		27
286	Integration of Microfluidic Capabilities into Micromachined Neural Implants. International Journal of Micro-nano Scale Transport, 2010, 1, 139-158.	0.2	4
287	CMOS-Based High-Density Silicon Microprobe Array for Electronic Depth Control in Neural Recording. , 2009, , .		21
288	A MEMS-based flexible multichannel ECoG-electrode array. Journal of Neural Engineering, 2009, 6, 036003.	1.8	354

#	ARTICLE	IF	CITATIONS
289	Stretchable tracks for laser-machined neural electrode arrays. , 2009, 2009, 1612-5.		18
290	Development of a simple low noise amplifier for recording of sensory mass signals from peripheral nerves / Entwicklung eines einfachen rauscharmen Verstärkers zur Ableitung von sensorischen Summensignalen am peripheren Nerven. Biomedizinische Technik, 2009, 54, 1-7.	0.9	3
291	Manufacturing, assembling and packaging of miniaturized implants for neural prostheses and brain-machine interfaces. Proceedings of SPIE, 2009, , .	0.8	2
292	Development of a micromachined epiretinal vision prosthesis. Journal of Neural Engineering, 2009, 6, 065005.	1.8	45
293	Mapping reef features from multibeam sonar data using multiscale morphometric analysis. Marine Geology, 2009, 264, 209-217.	0.9	29
294	Brain-computer interfaces: an overview of the hardware to record neural signals from the cortex. Progress in Brain Research, 2009, 175, 297-315.	0.9	60
295	Recent advances in charge balancing for functional electrical stimulation. , 2009, 2009, 5518-21.		16
296	An active approach for charge balancing in functional electrical stimulation. , 2009, , .		1
297	Fatigue Testing of Polyimide-Based Micro Implants. IFMBE Proceedings, 2009, , 1594-1597.	0.2	2
298	Physiologic Approach for Control of Hand Prostheses. IFMBE Proceedings, 2009, , 1830-1834.	0.2	2
299	Micromanufactured electrodes for cortical field potential recording: in vivo study. IFMBE Proceedings, 2009, , 2375-2378.	0.2	2
300	A Novel Interconnection Technology for Laser-Structured Platinum Silicone Electrode Arrays. IFMBE Proceedings, 2009, , 2392-2395.	0.2	2
301	MEMS-Technology for Large-Scale, Multichannel ECoG-Electrode Array Manufacturing. IFMBE Proceedings, 2009, , 2413-2416.	0.2	5
302	Integration of Microfluidic Channels into Laser-Fabricated Neural Electrode Arrays. IFMBE Proceedings, 2009, , 2431-2434.	0.2	4
303	Deposition Parameters Determining Insulation Resistance and Crystallinity of Parylene C in Neural Implant Encapsulation. IFMBE Proceedings, 2009, , 2439-2442.	0.2	13
304	A Telemetry Platform for Implantable Devices Providing Inductive Energy Supply and a Bi-Directional Data Link. IFMBE Proceedings, 2009, , 2447-2450.	0.2	1
305	Diffusion Limited Tapered Coating with Parylene C. IFMBE Proceedings, 2009, , 96-99.	0.2	1
306	Electrical Characterization of Platinum, Stainless Steel and Platinum/Iridium as Electrode Materials for a New Neural Interface. IFMBE Proceedings, 2009, , 100-103.	0.2	4

#	ARTICLE	IF	CITATIONS
307	A Novel Assembly Method for Silicon-Based Neural Devices. IFMBE Proceedings, 2009, , 107-110.	0.2	26
308	Electric Field Distribution for the Characterization of Planar and Recessed Electrodes. IFMBE Proceedings, 2009, , 2443-2446.	0.2	0
309	Development of a Corrugated Polyimide-Based Electrode for Intrafascicular Use in Peripheral Nerves. IFMBE Proceedings, 2009, , 32-35.	0.2	0
310	A voltage-controlled current source with regulated electrode bias-voltage for safe neural stimulation. Journal of Neuroscience Methods, 2008, 171, 248-252.	1.3	43
311	Isotope tracing of submarine groundwater discharge offshore Ubatuba, Brazil: results of the IAEA's "UNESCO SGD project. Journal of Environmental Radioactivity, 2008, 99, 1596-1610.	0.9	70
312	Temporal variability of water quality of submarine groundwater discharge in Ubatuba, Brazil. Estuarine, Coastal and Shelf Science, 2008, 76, 484-492.	0.9	27
313	Spatial variability of submarine groundwater discharge, Ubatuba, Brazil. Estuarine, Coastal and Shelf Science, 2008, 76, 493-500.	0.9	35
314	Estimation of submarine groundwater discharge from bulk ground electrical conductivity measurements. Journal of Geophysical Research, 2008, 113, .	3.3	32
315	Matrix-addressable, active electrode arrays for neural stimulation using organic semiconductors's cytotoxicity and pilot experiments in vivo. Journal of Neural Engineering, 2008, 5, 68-74.	1.8	13
316	Scaling limitations of laser-fabricated nerve electrode arrays. , 2008, 2008, 4208-11.		10
317	Hybrid microprobes for chronic implantation in the cerebral cortex. , 2008, 2008, 2016-9.		11
318	Interconnection technologies for laser-patterned electrode arrays. , 2008, 2008, 3212-5.		14
319	Multichannel thin-film electrode for intramuscular electromyographic recordings. Journal of Applied Physiology, 2008, 104, 821-827.	1.2	69
320	Comparative study on the insertion behavior of cerebral microprobes. , 2007, 2007, 4711-4.		32
321	A Wireless System for Monitoring Polymer Encapsulations. Annual International Conference of the IEEE Engineering in Medicine and Biology Society, 2007, 2007, 6601-4.	0.5	2
322	Measurement of Defects in Spin Coated Polyimide Films. Annual International Conference of the IEEE Engineering in Medicine and Biology Society, 2007, 2007, 183-5.	0.5	5
323	Microprobe Array with Low Impedance Electrodes and Highly Flexible Polyimide Cables for Acute Neural Recording. Annual International Conference of the IEEE Engineering in Medicine and Biology Society, 2007, 2007, 175-8.	0.5	42
324	A Naïve and Fast Human Computer Interface Controllable for the Inexperienced - a Performance Study. Annual International Conference of the IEEE Engineering in Medicine and Biology Society, 2007, 2007, 2508-11.	0.5	3

#	ARTICLE	IF	CITATIONS
325	Neuro-Technical Interfaces Based on Biocompatible Polymeric Substrates. Materials Research Society Symposia Proceedings, 2007, 1009, 1.	0.1	0
326	Patterning of Silicone Rubber for Micro-Electrode Array Fabrication. , 2007, , .		12
327	Development of Modular Multifunctional Probe Arrays for Cerebral Applications. , 2007, , .		21
328	An Optically Powered Single-Channel Stimulation Implant as Test System for Chronic Biocompatibility and Biostability of Miniaturized Retinal Vision Prostheses. IEEE Transactions on Biomedical Engineering, 2007, 54, 983-992.	2.5	48
329	Development of Saline Ground Water through Transpiration of Sea Water. Ground Water, 2007, 45, 703-710.	0.7	67
330	Neural prostheses in clinical practice: biomedical microsystems in neurological rehabilitation. , 2007, 97, 411-418.		13
331	Restoration of neurological functions by neuroprosthetic technologies: future prospects and trends towards micro-, nano-, and biohybrid systems. , 2007, 97, 435-442.		12
332	Adaptronic Systems in Biology and Medicine. , 2007, , 469-505.		0
333	An implantable neuroprosthesis for standing and walking in paraplegia: 5-year patient follow-up. Journal of Neural Engineering, 2006, 3, 268-275.	1.8	99
334	Biomedical Microdevices for Neural Implants. , 2006, , 71-137.		15
335	Flexible organic field effect transistors for biomedical microimplants using polyimide and parylene C as substrate and insulator layers. Journal of Micromechanics and Microengineering, 2006, 16, 1555-1561.	1.5	40
336	Neuro-technical interfaces to the central nervous system. Poiesis & Praxis, 2006, 4, 95-109.	0.3	5
337	Quantifying submarine groundwater discharge in the coastal zone via multiple methods. Science of the Total Environment, 2006, 367, 498-543.	3.9	791
338	Regelungs- und Steuerungskonzepte für Neuroprothesen am Beispiel der oberen Extremitäten (Closed-) Tj ETQq0 0 0 rgBT /Overlock Automatisierungstechnik, 2006, 54, 523-536.	0.4	1
339	Design, in vitro and in vivo assessment of a multi-channel sieve electrode with integrated multiplexer. Journal of Neural Engineering, 2006, 3, 114-124.	1.8	43
340	Original electronic design to perform epimysial and neural stimulation in paraplegia. Journal of Neural Engineering, 2006, 3, 276-286.	1.8	21
341	BIOMEDICAL MICRODEVICES FOR NEURAL IMPLANTS. , 2006, , 71-137.		2
342	Encapsulation of organic field effect transistors for flexible biomedical microimplants. Sensors and Actuators A: Physical, 2005, 120, 101-109.	2.0	69

#	ARTICLE	IF	CITATIONS
343	Long term assessment of axonal regeneration through polyimide regenerative electrodes to interface the peripheral nerve. <i>Biomaterials</i> , 2005, 26, 2021-2031.	5.7	159
344	A critical review of interfaces with the peripheral nervous system for the control of neuroprostheses and hybrid bionic systems. <i>Journal of the Peripheral Nervous System</i> , 2005, 10, 229-258.	1.4	723
345	Submarine groundwater discharge into the near-shore zone of the Great Barrier Reef, Australia. <i>Marine Pollution Bulletin</i> , 2005, 51, 51-59.	2.3	106
346	Implantable biomedical microsystems for neural prostheses. <i>IEEE Engineering in Medicine and Biology Magazine</i> , 2005, 24, 58-65.	1.1	130
347	In vivo intravascular electric impedance spectroscopy using a new catheter with integrated microelectrodes. <i>Basic Research in Cardiology</i> , 2005, 100, 28-34.	2.5	19
348	Cortical Activation Via an Implanted Wireless Retinal Prosthesis. , 2005, 46, 1780.		93
349	Diameter-dependent excitation of peripheral nerve fibers by multipolar electrodes during electrical stimulation. <i>Expert Review of Medical Devices</i> , 2005, 2, 149-152.	1.4	15
350	Äoerber die Zell-Material-Schnittstelle von Neuroprothesen*. <i>Materialpruefung/Materials Testing</i> , 2005, 47, 101-105.	0.8	0
351	ELECTRODE MATERIALS FOR RECORDING AND STIMULATION. <i>Series on Bioengineering and Biomedical Engineering</i> , 2004, , 475-516.	0.1	23
352	Development of an inductively coupled epiretinal vision prosthesis. , 2004, 2004, 4178-81.		20
353	Neural Prostheses in Clinical Applications â€“ Trends from Precision Mechanics towards Biomedical Microsystems in Neurological Rehabilitation / Neuroprothesen in der klinischen Anwendung â€“ Trends von der Feinwerktechnik zu biomedizinischen Mikrosystemen in der neurologischen Rehabilitation. <i>Biomedizinische Technik</i> , 2004, 49, 72-77.	0.9	18
354	Neural Prostheses and Functional Electrical Stimulation / Neuroprothetik und Funktionelle Elektrostimulation. <i>Biomedizinische Technik</i> , 2004, 49, 70-71.	0.9	1
355	Optical energy transfer for intraocular microsystems studied in rabbits. <i>Graefe's Archive for Clinical and Experimental Ophthalmology</i> , 2004, 242, 661-667.	1.0	17
356	Urinary bladder volumetry by means of a single retrosymphysically implantable ultrasound unit. <i>Neurourology and Urodynamics</i> , 2004, 23, 680-684.	0.8	11
357	Considerations on Surface and Structural Biocompatibility as Prerequisite for Long-Term Stability of Neural Prostheses. <i>Journal of Nanoscience and Nanotechnology</i> , 2004, 4, 496-503.	0.9	27
358	Chronically implanted epidural electrodes in GÃtttinger minipigs allow function tests of epiretinal implants. <i>Graefe's Archive for Clinical and Experimental Ophthalmology</i> , 2003, 241, 1013-1019.	1.0	31
359	Noninvasive measurement of torque development in the rat foot: measurement setup and results from stimulation of the sciatic nerve with polyimide-based cuff electrodes. <i>IEEE Transactions on Neural Systems and Rehabilitation Engineering</i> , 2003, 11, 427-437.	2.7	13
360	Flexible, Microarray Interconnection Technique Applied to Biomedical Microdevices. <i>Emerging Technology in Advanced Packaging Series</i> , 2003, , 149-176.	0.1	0

#	ARTICLE	IF	CITATIONS
361	ANSÄTZE ZU EINER BIOKOMPATIBLEN AUFBAU- UND VERBINDUNGSTECHNIK FÜR BIOMEDIZINISCHE MIKROSYSTEME. Biomedizinische Technik, 2003, 48, 378-379.	0.9	2
362	First chronic results from a flexible sieve electrode to interface nerves without the need for guidance channels. , 2002, , .		0
363	SELECTIVE STIMULATION OF PIG RADIAL NERVE: COMPARISON OF 12-POLAR AND 18-POLAR CLIFF ELECTRODES. Biomedizinische Technik, 2002, 47, 696-699.	0.9	6
364	CONSIDERATIONS ON NOISE OF ELECTRODES IN COMBINATION WITH AMPLIFIERS FOR BIOELECTRICAL SIGNAL RECORDING. Biomedizinische Technik, 2002, 47, 514-516.	0.9	4
365	A biohybrid microprobe for implanting into the peripheral nervous system. , 2002, , .		2
366	Morphologic and functional evaluation of peripheral nerve fibers regenerated through polyimide sieve electrodes over long-term implantation. Journal of Biomedical Materials Research Part B, 2002, 60, 517-528.	3.0	52
367	Micromachining of flexible neural implants with low-ohmic wire traces using electroplating. Sensors and Actuators A: Physical, 2002, 96, 105-110.	2.0	17
368	Flexible BIOMEMS with electrode arrangements on front and back side as key component in neural prostheses and biohybrid systems. Sensors and Actuators B: Chemical, 2002, 83, 8-14.	4.0	57
369	A biohybrid system to interface peripheral nerves after traumatic lesions: design of a high channel sieve electrode. Biosensors and Bioelectronics, 2002, 17, 685-696.	5.3	63
370	Dry Season Salinity Changes in Arid Estuaries Fringed by Mangroves and Saltflats. Estuarine, Coastal and Shelf Science, 2002, 54, 1039-1049.	0.9	68
371	Perforated Microelectrode Arrays Implanted in the Regenerating Adult Central Nervous System. Experimental Neurology, 2001, 171, 1-10.	2.0	13
372	Reducing stiffness and electrical losses of high channel hybrid nerve cuff electrodes. , 2001, , .		5
373	Immunohistochemical characterization of axonal sprouting and reactive tissue changes after long-term implantation of a polyimide sieve electrode to the transected adult rat sciatic nerve. Biomaterials, 2001, 22, 2333-2343.	5.7	62
374	Flexible biomedical microdevices with double-sided electrode arrangements for neural applications. Sensors and Actuators A: Physical, 2001, 90, 203-211.	2.0	75
375	ENTWURF EINER TRAGBAREN STEUERUNG FÜR IMPLANTATE BASIEREND AUF MIKROKONTROLLERN ZUR FUNKTIONELLEN ELEKTROSTIMULATION. Biomedizinische Technik, 2001, 46, 486-487.	0.9	0
376	Weiterentwicklung eines modularen Multikanal-Nervenstimulators zur Erzeugung beliebiger Reizpulsformen für den experimentellen und klinischen Einsatz. Biomedizinische Technik, 2001, 46, 484-485.	0.9	0
377	EINE INTELLIGENTE ELEKTRODE ZUR STIMULATION PERIPHERER NERVEN. Biomedizinische Technik, 2001, 46, 436-437.	0.9	0
378	MINIATURISIERTE SIEB-ELEKTRODEN ALS SCHNITTSTELLE ZU NERVENSTÄMPFEN NACH AMPUTATION UND PERIPHERER LÄHMUNG. Biomedizinische Technik, 2001, 46, 434-435.	0.9	0

#	ARTICLE	IF	CITATIONS
379	IMPEDANZSENKUNG FLEXIBLER MIKROELEKTRODEN DURCH GALVANISCHE ABSCHIEDUNG VON α -PT BLACK UND IRIDIUMOXID. Biomedizinische Technik, 2001, 46, 500-501.	0.9	0
380	OPTIMIERUNG INDUKTIVER β -BERTRAGUNDSSYSTEME ZUR ANSTEUERUNG VON IMPLANTATEN. Biomedizinische Technik, 2001, 46, 432-433.	0.9	0
381	High density interconnects and flexible hybrid assemblies for active biomedical implants. IEEE Transactions on Advanced Packaging, 2001, 24, 366-374.	1.7	127
382	Trapping of mangrove propagules due to density-driven secondary circulation in the Normanby River estuary, NE Australia. Marine Ecology - Progress Series, 2001, 211, 131-142.	0.9	36
383	Flexible BIOMEMS with Electrode Arrangements on Front and Back Side as Key Component in Neural Prostheses and Biohybrid Systems. , 2001, , 358-361.		0
384	Selective fascicular stimulation of the rat sciatic nerve with multipolar polyimide cuff electrodes. Restorative Neurology and Neuroscience, 2001, 18, 9-21.	0.4	25
385	Water Circulation in Mangroves, and Its Implications for Biodiversity. , 2000, , 53-76.		1
386	Polyimide cuff electrodes for peripheral nerve stimulation. Journal of Neuroscience Methods, 2000, 98, 105-118.	1.3	194
387	Passive irrigation and functional morphology of crustacean burrows in a tropical mangrove swamp. Hydrobiologia, 2000, 421, 69-76.	1.0	112
388	A small sensor for detecting animal burrows and monitoring burrow water conductivity. Wetlands Ecology and Management, 2000, 8, 1-7.	0.7	20
389	Micromachined, Polyimide-Based Devices for Flexible Neural Interfaces. Biomedical Microdevices, 2000, 2, 283-294.	1.4	297
390	NEUE ELEKTRODENTECHNOLOGIEN FÜR DIE NEUROPROTHETIK. Biomedizinische Technik, 2000, 45, 273-274.	0.9	0
391	ELEKTRODEN ZUR SELEKTIVEN ELEKTROSTIMULATION GROSSER ARMNERVEN FÜR EINE NEUROPROTHESE ZUR WIEDERHERSTELLUNG DER GREIFFUNKTION BEI QUERSCHNITTLESIONEN. Biomedizinische Technik, 2000, 45, 285-286.	0.9	0
392	"Microflex" - A New Assembling Technique for Interconnects. Journal of Intelligent Material Systems and Structures, 2000, 11, 417-425.	1.4	50
393	ENTWICKLUNG EINES RASTERPOTENTIAL-MESSPLATZES ZUR UNTERSUCHUNG DER ELEKTRISCHEN FELDVERTEILUNG AN NEUROPROTHESEN UND BIOHYBRIDEN SYSTEMEN. Biomedizinische Technik, 2000, 45, 406-407.	0.9	0
394	Multichannel neural cuff electrodes with integrated multiplexer circuit. , 2000, , .		10
395	Biomedical microdevices for neural interfaces. , 2000, , .		13
396	"Microflex" - A New Assembling Technique for Interconnects. Journal of Intelligent Material Systems and Structures, 2000, 11, 417-425.	1.4	39

#	ARTICLE	IF	CITATIONS
397	Flexible, polyimide-based neural interfaces. , 1999, , .		10
398	Position sensing of cells in diagnostic test systems by impedance measurement. , 1999, , .		1
399	Indicators of mangrove zonality: the Normanby river, N.E. Australia. Mangroves and Salt Marshes, 1999, 3, 177-184.	0.6	15
400	Fast and precise positioning of single cells on planar electrode substrates. IEEE Engineering in Medicine and Biology Magazine, 1999, 18, 48-52.	1.1	26
401	Density-driven Secondary Circulation in a Tropical Mangrove Estuary. Estuarine, Coastal and Shelf Science, 1998, 47, 621-632.	0.9	15
402	Shielding of flexible microelectrode interconnects for suppression of artifacts in neural prostheses. , 1998, , .		0
403	<title>Versatile microflex-based interconnection technique</title>. , 1998, 3328, 174.		5
404	Micromachined devices for interfacing neurons. , 1998, 3324, 174.		4
405	Microtechnical Interfaces to Neurons. Topics in Current Chemistry, 1998, , 131-162.	4.0	23
406	Stimulation and recording from regenerated peripheral nerves through polyimide sieve electrodes. Journal of the Peripheral Nervous System, 1998, 3, 91-101.	1.4	44
407	Selektive Aktivierung der Blase mittels quasi-trapezoidaler Pulse bei der sakralen Vorderwurzelstimulation beim Hund. Biomedizinische Technik, 1997, 42, 492-493.	0.9	2
408	Development of flexible stimulation devices for a retina implant system. , 1997, , .		18
409	A flexible, light-weight multichannel sieve electrode with integrated cables for interfacing regenerating peripheral nerves. Sensors and Actuators A: Physical, 1997, 60, 240-243.	2.0	118
410	Characterization and optimization of microelectrode arrays for in vivo nerve signal recording and stimulation1Paper presented at WPB '96, Bangkok, May 1996.1. Biosensors and Bioelectronics, 1997, 12, 883-892.	5.3	74
411	Flexible, light-weighted electrodes to contact the peripheral nervous system. , 1996, , .		3
412	Interfacing regenerating peripheral nerves with a micromachined polyimide sieve electrode. , 1996, , .		11
413	A modular multichannel stimulator for arbitrary shaped current pulses for experimental and clinical use in FES. , 0, , .		7
414	A novel cell-positioning technique for extracellular recording and impedance measurement on single cells using planar electrode substrates. , 0, , .		1

#	ARTICLE	IF	CITATIONS
415	Microflex: a new technique for hybrid integration for microsystems. , 0, , .		6
416	Reducing insertion sites of penetrating multipolar shaft electrodes by double side electrode arrangement. , 0, , .		1
417	Recording of auditory evoked potentials in rat using a 60 channel polyimide electrode array: preliminary results. , 0, , .		2
418	Effects of Electrode Miniaturization in Micromachined Neural Prostheses. , 0, , .		2
419	How much neuronal information is needed to control robots or prostheses?. , 0, , .		0
420	Biomedical Microimplants for Sensory and Motor Neuroprostheses. , 0, , .		5
421	An experimental study on passive charge balancing. Advances in Radio Science, 0, 7, 197-200.	0.7	24