

Mohammad Abdolahad

List of Publications by Year in descending order

Source: <https://exaly.com/author-pdf/2917714/publications.pdf>

Version: 2024-02-01

52
papers

831
citations

623734
14
h-index

526287
27
g-index

53
all docs

53
docs citations

53
times ranked

1392
citing authors

#	ARTICLE	IF	CITATIONS
1	Real-time diagnosis of reactive oxygen species (ROS) in fresh sputum by electrochemical tracing; correlation between COVID-19 and viral-induced ROS in lung/respiratory epithelium during this pandemic. <i>Biosensors and Bioelectronics</i> , 2020, 165, 112435.	10.1	116
2	Spongy graphene electrode in electrochemical detection of leukemia at single-cell levels. <i>Carbon</i> , 2014, 79, 654-663.	10.3	105
3	A vertically aligned carbon nanotube-based impedance sensing biosensor for rapid and high sensitive detection of cancer cells. <i>Lab on A Chip</i> , 2012, 12, 1183.	6.0	82
4	Monitoring the spreading stage of lung cells by silicon nanowire electrical cell impedance sensor for cancer detection purposes. <i>Biosensors and Bioelectronics</i> , 2015, 68, 577-585.	10.1	42
5	Silicon nanowire based biosensing platform for electrochemical sensing of Mebendazole drug activity on breast cancer cells. <i>Biosensors and Bioelectronics</i> , 2016, 85, 363-370.	10.1	40
6	Nanoelectromechanical Chip (NELMEC) Combination of Nanoelectronics and Microfluidics to Diagnose Epithelial and Mesenchymal Circulating Tumor Cells from Leukocytes. <i>Small</i> , 2016, 12, 883-891.	10.0	39
7	Microneedle-Based Generation of Microbubbles in Cancer Tumors to Improve Ultrasound-Assisted Drug Delivery. <i>Advanced Healthcare Materials</i> , 2019, 8, e1900613.	7.6	39
8	Silicon nanoglass based impedance biosensor for label free detection of rare metastatic cells among primary cancerous colon cells, suitable for more accurate cancer staging. <i>Biosensors and Bioelectronics</i> , 2014, 59, 151-159.	10.1	36
9	Folic Acid Functionalized Vertically Aligned Carbon Nanotube (FA-VACNT) Electrodes for Cancer Sensing Applications. <i>Journal of Materials Science and Technology</i> , 2016, 32, 617-625.	10.7	27
10	Bioelectrical pathology of the breast; real-time diagnosis of malignancy by clinically calibrated impedance spectroscopy of freshly dissected tissue. <i>Biosensors and Bioelectronics</i> , 2020, 165, 112421.	10.1	22
11	Electrochemical approach for monitoring the effect of anti tubulin drugs on breast cancer cells based on silicon nanoglass electrodes. <i>Analytica Chimica Acta</i> , 2016, 938, 72-81.	5.4	16
12	Metas-Chip precisely identifies presence of micrometastasis in live biopsy samples by label free approach. <i>Nature Communications</i> , 2017, 8, 2175.	12.8	16
13	Monitoring the effect of sonoporation on the cells using electrochemical approach. <i>Ultrasonics Sonochemistry</i> , 2018, 41, 619-625.	8.2	16
14	Distinguishment of populated metastatic cancer cells from primary ones based on their invasion to endothelial barrier by biosensor arrays fabricated on nanoroughened poly(methyl methacrylate). <i>Biosensors and Bioelectronics</i> , 2018, 118, 51-57.	10.1	14
15	A single-cell correlative nanoelectromechanosensing approach to detect cancerous transformation: monitoring the function of F-actin microfilaments in the modulation of the ion channel activity. <i>Nanoscale</i> , 2015, 7, 1879-1887.	5.6	13
16	Microfluidic device for label-free quantitation and distinction of bladder cancer cells from the blood cells using micro machined silicon based electrical approach; suitable in urinalysis assays. <i>Journal of Pharmaceutical and Biomedical Analysis</i> , 2017, 134, 36-42.	2.8	13
17	Bioelectronics of The Cellular Cytoskeleton: Monitoring Cytoskeletal Conductance Variation for Sensing Drug Resistance. <i>ACS Sensors</i> , 2019, 4, 353-362.	7.8	13
18	Carbon nanotube based dielectric spectroscopy of tumor secretion; electrochemical lipidomics for cancer diagnosis. <i>Biosensors and Bioelectronics</i> , 2019, 142, 111566.	10.1	11

#	ARTICLE	IF	CITATIONS
19	Electrochemical generation of microbubbles by carbon nanotube interdigital electrodes to increase the permeability and material uptakes of cancer cells. <i>Drug Delivery</i> , 2019, 26, 928-934.	5.7	11
20	A label-free graphene-based impedimetric biosensor for real-time tracing of the cytokine storm in blood serum; suitable for screening COVID-19 patients. <i>RSC Advances</i> , 2021, 11, 34503-34515.	3.6	11
21	Ultrasound assisted electrochemical distinction of normal and cancerous cells. <i>Sensors and Actuators B: Chemical</i> , 2018, 255, 1-7.	7.8	10
22	Electrically guided interventional radiology, in-vivo electrochemical tracing of suspicious lesions to breast cancer prior to core needle biopsy. <i>Biosensors and Bioelectronics</i> , 2020, 161, 112209.	10.1	10
23	Applying VHB acrylic elastomer as a cell culture and stretchable substrate. <i>International Journal of Polymeric Materials and Polymeric Biomaterials</i> , 2018, 67, 1096-1104.	3.4	9
24	Low frequency stimulation induces polarization-based capturing of normal, cancerous and white blood cells: a new separation method for circulating tumor cell enrichment or phenotypic cell sorting. <i>Analyst</i> , The, 2020, 145, 7636-7645.	3.5	9
25	Intraoperative pathologically-calibrated diagnosis of lymph nodes involved by breast cancer cells based on electrical impedance spectroscopy; a prospective diagnostic human model study. <i>International Journal of Surgery</i> , 2021, 96, 106166.	2.7	8
26	Microfluidic platform with integrated electrical actuator to enrich and locating atypical/cancer cells from liquid cytology samples. <i>Sensors and Actuators B: Chemical</i> , 2019, 297, 126733.	7.8	7
27	Electrochemical tracing of hypoxia glycolysis by carbon nanotube sensors, a new hallmark for intraoperative detection of suspicious margins to breast neoplasia. <i>Bioengineering and Translational Medicine</i> , 2022, 7, e10236.	7.1	7
28	Capture-free deactivation of CTCs in the bloodstream; a metastasis suppression method by electrostatic stimulation of the peripheral blood. <i>Biosensors and Bioelectronics</i> , 2021, 183, 113194.	10.1	7
29	Bioelectrical impedimetric sensor for single cell analysis based on nanoroughened quartz substrate; suitable for cancer therapeutic purposes. <i>Journal of Pharmaceutical and Biomedical Analysis</i> , 2017, 142, 315-323.	2.8	6
30	An electrochemical biosensor to distinguish between normal and cancer cells based on monitoring their acidosis using gold-coated silicon Nano-roughened electrode. <i>Analytical Biochemistry</i> , 2018, 561-562, 1-10.	2.4	6
31	The design and fabrication of nanoengineered platinum needles with laser welded carbon nanotubes (CNTs) for the electrochemical biosensing of cancer lymph nodes. <i>Biomaterials Science</i> , 2021, 9, 6214-6226.	5.4	6
32	Positive electrostatic therapy of metastatic tumors: selective induction of apoptosis in cancer cells by pure charges. <i>Cancer Medicine</i> , 2021, 10, 7475-7491.	2.8	6
33	Integration of Ni₂Si/Si Nanograin Heterojunction on n-MOSFET to Realize High-Sensitivity Phototransistors. <i>IEEE Transactions on Electron Devices</i> , 2014, 61, 3239-3244.	3.0	5
34	An electrical bio-chip to transfer and detect electromagnetic stimulation on the cells based on vertically aligned carbon nanotubes. <i>Materials Science and Engineering C</i> , 2017, 70, 681-688.	7.3	5
35	Stretch Induces Invasive Phenotypes in Breast Cells Due to Activation of Aerobicâ€Glycolysisâ€Related Pathways. <i>Advanced Biology</i> , 2019, 3, e1800294.	3.0	5
36	Cyclic voltammetric biosensing of cellular ionic secretion based on silicon nanowires to detect the effect of paclitaxel on breast normal and cancer cells. <i>Microelectronic Engineering</i> , 2021, 239-240, 111512.	2.4	5

#	ARTICLE	IF	CITATIONS
37	Label-free mechanoelectrical investigation of single cancer cells by dielectrophoretic-induced stretch assay. <i>Sensors and Actuators B: Chemical</i> , 2021, 346, 130409.	7.8	5
38	Healing Field: Using Alternating Electric Fields to Prevent Cytokine Storm by Suppressing Clonal Expansion of the Activated Lymphocytes in the Blood Sample of the COVID-19 Patients. <i>Frontiers in Bioengineering and Biotechnology</i> , 2022, 10, .	4.1	5
39	Tracing the pH dependent activation of autophagy in cancer cells by silicon nanowire-based impedance biosensor. <i>Journal of Pharmaceutical and Biomedical Analysis</i> , 2018, 154, 158-165.	2.8	4
40	Acoustic wave based biosensor to study electroacoustic based detection of progressive (SW-48) colon cancer cells from primary (HT-29) cells. <i>Sensors and Actuators A: Physical</i> , 2015, 233, 169-175.	4.1	3
41	Nanoporous platinum needle for cancer tumor destruction by EChT and impedance-based intra-therapeutic monitoring. <i>Nanoscale</i> , 2020, 12, 22129-22139.	5.6	3
42	Real-time diagnosis of sentinel lymph nodes involved to breast cancer based on pH sensing through lipid synthesis of those cells. <i>Bioscience Reports</i> , 2020, 40, .	2.4	3
43	Electrochemical measuring of reactive oxygen species levels in the blood to detect ratio of high-density neutrophils, suitable to alarm presence of cancer in suspicious cases. <i>Journal of Pharmaceutical and Biomedical Analysis</i> , 2022, 209, 114488.	2.8	3
44	Human study on cancer diagnostic probe (CDP) for real-time excising of breast positive cavity side margins based on tracing hypoxia glycolysis; checking diagnostic accuracy in non-neoadjuvant cases. <i>Cancer Medicine</i> , 2022, 11, 1630-1645.	2.8	3
45	Intradiological pathology-calibrated electrical impedance spectroscopy in the evaluation of excision-required breast lesions. <i>Medical Physics</i> , 2022, 49, 2746-2760.	3.0	2
46	Effect of Post IORT Wound Fluid Secretion (PIWFS) on the Behavior of Breast Cancer Cells: Stimulator or Inhibitor; Report of an Experimental Study on Breast Cancer. <i>Archives of Iranian Medicine</i> , 2022, 25, 78-84.	0.6	2
47	The conformal silicon deposition on carbon nanotubes as enabled by hydrogenated carbon coatings for synthesis of carbon/silicon core/shell heterostructure photodiodes. <i>Carbon</i> , 2015, 87, 299-308.	10.3	1
48	Cancer Diagnosis: Nanoelectromechanical Chip (NELMEC) Combination of Nanoelectronics and Microfluidics to Diagnose Epithelial and Mesenchymal Circulating Tumor Cells from Leukocytes (Small 7/2016). <i>Small</i> , 2016, 12, 882-882.	10.0	1
49	Stretch-Induced Invasion: Stretch Induces Invasive Phenotypes in Breast Cells Due to Activation of Aerobic-Glycolysis-Related Pathways (Adv. Biosys. 7/2019). <i>Advanced Biology</i> , 2019, 3, 1970075.	3.0	1
50	An In Vitro Electric Field Exposure Device with Real-Time Cell Impedance Sensing. <i>Iranian Journal of Science and Technology, Transaction A: Science</i> , 2020, 44, 575-585.	1.5	1
51	Accuracy of cancer diagnostic probe (CDP) for intra-surgical checking of cavity side margins in neoadjuvant breast cancer cases; A human model study. <i>International Journal of Medical Robotics and Computer Assisted Surgery</i> , 2021, , e2335.	2.3	1
52	Ultrasound-Assisted Drug Delivery: Microneedle-Based Generation of Microbubbles in Cancer Tumors to Improve Ultrasound-Assisted Drug Delivery (Adv. Healthcare Mater. 17/2019). <i>Advanced Healthcare Materials</i> , 2019, 8, 1970070.	7.6	0