

Mohammad H Zarifi

List of Publications by Year in descending order

Source: <https://exaly.com/author-pdf/260253/publications.pdf>

Version: 2024-02-01

71
papers

2,581
citations

156536

32
h-index

232693

48
g-index

71
all docs

71
docs citations

71
times ranked

1501
citing authors

#	ARTICLE	IF	CITATIONS
1	High-Resolution, Sensitivity-Enhanced Active Resonator Sensor Using Substrate-Embedded Channel for Characterizing Low-Concentration Liquid Mixtures. IEEE Transactions on Microwave Theory and Techniques, 2022, 70, 576-586.	2.9	50
2	Magnetically coupled planar microwave resonators for real-time saltwater ice detection. Sensors and Actuators A: Physical, 2022, 333, 113245.	2.0	15
3	Flexible, robust, and high-performance gas sensors based on lignocellulosic nanofibrils. Carbohydrate Polymers, 2022, 278, 118920.	5.1	23
4	MXene membrane in planar microwave resonant structures for 5G applications. Applied Materials Today, 2022, 26, 101294.	2.3	15
5	High-Frequency TiO ₂ Nanotube-Adapted Microwave Coplanar Waveguide Resonator for High-Sensitivity Ultraviolet Detection. ACS Applied Materials & Interfaces, 2022, 14, 6203-6211.	4.0	13
6	A Nonintrusive Flow Rate Sensor Based on Microwave Split-Ring Resonators and Thermal Modulation. IEEE Transactions on Microwave Theory and Techniques, 2022, 70, 1954-1963.	2.9	33
7	Low-Profile Planar Antenna Sensor Based on Ti ₃ C ₂ T _x MXene Membrane for VOC and Humidity Monitoring. Advanced Materials Interfaces, 2022, 9, .	1.9	30
8	TiO ₂ Nanotube Integrated Microwave Resonator UV Sensor. ECS Meeting Abstracts, 2022, MA2022-01, 2167-2167.	0.0	0
9	Differential Microwave Resonator Sensor for Real-Time Monitoring of Volatile Organic Compounds. IEEE Sensors Journal, 2021, 21, 6105-6114.	2.4	38
10	DROP: A CMOS Differential Ring-Oscillator Sensing Platform for Nano-Liter Droplet Detection. IEEE Transactions on Industrial Electronics, 2021, 68, 11523-11531.	5.2	5
11	Passive Microwave Biosensor for Real-Time Monitoring of Subsurface Bacterial Growth. IEEE Transactions on Biomedical Circuits and Systems, 2021, 15, 122-132.	2.7	33
12	Microwave resonator array with liquid metal selection for narrow band material sensing. Scientific Reports, 2021, 11, 8598.	1.6	21
13	Oleophobic textiles with embedded liquid and vapor hazard detection using differential planar microwave resonators. Journal of Hazardous Materials, 2021, 409, 124945.	6.5	16
14	Rapid and real-time monitoring of bacterial growth against antibiotics in solid growth medium using a contactless planar microwave resonator sensor. Scientific Reports, 2021, 11, 14775.	1.6	29
15	Smart Superhydrophobic Textiles Utilizing a Long-Range Antenna Sensor for Hazardous Aqueous Droplet Detection plus Prevention. ACS Applied Materials & Interfaces, 2021, 13, 34877-34888.	4.0	21
16	Patch antenna sensor for wireless ice and frost detection. Scientific Reports, 2021, 11, 13707.	1.6	38
17	TiO ₂ nanotube-integrated microwave planar resonator sensor for ultraviolet transmission-based liquid characterization. Sensors and Actuators B: Chemical, 2021, 341, 130014.	4.0	22
18	Graphene oxide/polyaniline-based microwave split-ring resonator: A versatile platform towards ammonia sensing. Journal of Hazardous Materials, 2021, 418, 126283.	6.5	31

#	ARTICLE	IF	CITATIONS
19	Patterned PEDOT:PSS-enabled organic planar microwave resonator sensors. <i>Applied Materials Today</i> , 2021, 24, 101106.	2.3	14
20	Investigating the Potential of a PEDOT:PSS Organic Microwave Resonator for Gas Sensing Applications. , 2021, , .		5
21	Exploring the Potential of Cellulose Nanofibrils for Humidity Sensing Using an Organic Microwave Resonator. , 2021, , .		3
22	Passive Split Ring Resonator Tag Configuration for RFID-Based Wireless Permittivity Sensing. <i>IEEE Sensors Journal</i> , 2020, 20, 1904-1911.	2.4	59
23	Real-time and hazard-free water quality monitoring based on microwave planar resonator sensor. <i>Sensors and Actuators A: Physical</i> , 2020, 303, 111663.	2.0	47
24	A Label-Free, Non-Intrusive, and Rapid Monitoring of Bacterial Growth on Solid Medium Using Microwave Biosensor. <i>IEEE Transactions on Biomedical Circuits and Systems</i> , 2020, 14, 2-11.	2.7	61
25	Modified Microwave Sensor with a Patterned Ground Heater for Detection and Prevention of Ice Accumulation. <i>ACS Applied Materials & Interfaces</i> , 2020, 12, 55483-55492.	4.0	44
26	Kirigami-Enabled Microwave Resonator Arrays for Wireless, Flexible, Passive Strain Sensing. <i>ACS Applied Materials & Interfaces</i> , 2020, 12, 44256-44264.	4.0	45
27	Gold Coplanar Waveguide Resonator Integrated With a Microfluidic Channel for Aqueous Dielectric Detection. <i>IEEE Sensors Journal</i> , 2020, 20, 9825-9833.	2.4	52
28	Highly Sensitive and Contactless Ammonia Detection Based on Nanocomposites of Phosphate-Functionalized Reduced Graphene Oxide/Polyaniline Immobilized on Microstrip Resonators. <i>ACS Applied Materials & Interfaces</i> , 2020, 12, 9746-9754.	4.0	53
29	Differential Microwave Resonator Sensor Reveals Glucose-Dependent Growth Profile of <i>E. coli</i> on Solid Agar. <i>IEEE Microwave and Wireless Components Letters</i> , 2020, 30, 531-534.	2.0	31
30	Wideband Tunable Modified Split Ring Resonator Structure Using Liquid Metal and 3-D Printing. <i>IEEE Microwave and Wireless Components Letters</i> , 2020, 30, 469-472.	2.0	35
31	Robust and sensitive frost and ice detection via planar microwave resonator sensor. <i>Sensors and Actuators B: Chemical</i> , 2019, 301, 126881.	4.0	46
32	Differential Narrow Bandpass Microstrip Filter Design for Material and Liquid Purity Interrogation. <i>IEEE Sensors Journal</i> , 2019, 19, 10545-10553.	2.4	15
33	Real-time monitoring of <i>Escherichia coli</i> concentration with planar microwave resonator sensor. <i>Microwave and Optical Technology Letters</i> , 2019, 61, 2534-2539.	0.9	29
34	Passive Matched Mushroom Structure for a High Sensitivity Low Profile Antenna-Based Material Detection System. <i>IEEE Sensors Journal</i> , 2019, 19, 6154-6162.	2.4	31
35	Monitoring the residual capacity of activated carbon in an emission abatement system using a non-contact, high resolution microwave resonator sensor. <i>Sensors and Actuators B: Chemical</i> , 2019, 282, 218-224.	4.0	19
36	3-D Printing Microfluidic Channels With Embedded Planar Microwave Resonators for RFID and Liquid Detection. <i>IEEE Microwave and Wireless Components Letters</i> , 2019, 29, 65-67.	2.0	69

#	ARTICLE	IF	CITATIONS
37	Ultraviolet sensing using a TiO ₂ nanotube integrated high resolution planar microwave resonator device. <i>Nanoscale</i> , 2018, 10, 4882-4889.	2.8	34
38	Noncontact and Nonintrusive Microwave-Microfluidic Flow Sensor for Energy and Biomedical Engineering. <i>Scientific Reports</i> , 2018, 8, 139.	1.6	125
39	A Microwave Ring Resonator Sensor for Early Detection of Breaches in Pipeline Coatings. <i>IEEE Transactions on Industrial Electronics</i> , 2018, 65, 1626-1635.	5.2	94
40	Sensitive, Real-time and Non-Intrusive Detection of Concentration and Growth of Pathogenic Bacteria using Microfluidic-Microwave Ring Resonator Biosensor. <i>Scientific Reports</i> , 2018, 8, 15807.	1.6	119
41	Integrating 3D Printed Microfluidic Channels With Planar Resonator Sensors for Low Cost and Sensitive Liquid Detection. , 2018, , .		13
42	Sensitivity and Selectivity Enhancement in Coupling Ring Resonator Sensors Using Splitting Resonant Frequencies. , 2018, , .		10
43	Distinguishing between Deep Trapping Transients of Electrons and Holes in TiO ₂ Nanotube Arrays Using Planar Microwave Resonator Sensor. <i>ACS Applied Materials & Interfaces</i> , 2018, 10, 29857-29865.	4.0	17
44	Sensitivity enhancement in planar microwave active-resonator using metal organic framework for CO ₂ detection. <i>Sensors and Actuators B: Chemical</i> , 2018, 255, 1561-1568.	4.0	61
45	High-Resolution RFID Liquid Sensing Using a Chipless Tag. <i>IEEE Microwave and Wireless Components Letters</i> , 2017, 27, 311-313.	2.0	39
46	Wireless passive RFID sensor for pipeline integrity monitoring. <i>Sensors and Actuators A: Physical</i> , 2017, 261, 24-29.	2.0	60
47	Flexible Microdisplacement Sensor for Wearable/ Implantable Biomedical Applications. <i>IEEE Sensors Journal</i> , 2017, 17, 3873-3883.	2.4	18
48	A Novel Technique for Determining the Adsorption Capacity and Breakthrough Time of Adsorbents Using a Noncontact High-Resolution Microwave Resonator Sensor. <i>Environmental Science & Technology</i> , 2017, 51, 427-435.	4.6	16
49	Monitoring Solid Particle Deposition in Lossy Medium Using Planar Resonator Sensor. <i>IEEE Sensors Journal</i> , 2017, 17, 7981-7989.	2.4	50
50	Miniaturized Quarter-Mode Substrate Integrated Cavity Resonators for Humidity Sensing. <i>IEEE Microwave and Wireless Components Letters</i> , 2017, 27, 612-614.	2.0	44
51	Contactless Asphaltene Detection Using an Active Planar Microwave Resonator Sensor. <i>Energy & Fuels</i> , 2017, 31, 8784-8791.	2.5	26
52	A non-contact microwave sensor for monitoring the interaction of zeolite 13X with CO ₂ and CH ₄ in gaseous streams. <i>Sensors and Actuators B: Chemical</i> , 2017, 238, 1240-1247.	4.0	55
53	Robust Ultra-High Resolution Microwave Planar Sensor Using Fuzzy Neural Network Approach. <i>IEEE Sensors Journal</i> , 2017, 17, 323-332.	2.4	46
54	Flexible coupled microwave ring resonators for contactless microbead assisted volatile organic compound detection. , 2017, , .		21

#	ARTICLE	IF	CITATIONS
55	Microwave resonator sensor integrated with nanostructured semiconductor membranes for photodetection and carrier lifetime measurement. , 2016, , .		1
56	Wide dynamic range microwave planar coupled ring resonator for sensing applications. Applied Physics Letters, 2016, 108, .	1.5	50
57	Sensitivity enhancement of split ring resonator based liquid sensors. , 2016, , .		34
58	Particle size characterization using a high resolution planar resonator sensor in a lossy medium. Sensors and Actuators B: Chemical, 2016, 234, 332-337.	4.0	30
59	Effect of phosphonate monolayer adsorbate on the microwave photoresponse of TiO ₂ nanotube membranes mounted on a planar double ring resonator. Nanotechnology, 2016, 27, 375201.	1.3	37
60	Substrate choice impact on microwave sensor. , 2016, , .		3
61	Wireless Communication in Feedback-Assisted Active Sensors. IEEE Sensors Journal, 2016, 16, 8151-8157.	2.4	37
62	Bulk disc resonators radial and wineglass mode resonance characterization for mass sensing applications. Microsystem Technologies, 2016, 22, 1013-1020.	1.2	3
63	Liquid sensing in aquatic environment using high quality planar microwave resonator. Sensors and Actuators B: Chemical, 2016, 225, 517-521.	4.0	57
64	Microwave ring resonator-based non-contact interface sensor for oil sands applications. Sensors and Actuators B: Chemical, 2016, 224, 632-639.	4.0	80
65	Non-contact liquid sensing using high resolution microwave microstrip resonator. , 2015, , .		22
66	High resolution microwave microstrip resonator for sensing applications. Sensors and Actuators A: Physical, 2015, 233, 224-230.	2.0	75
67	Liquid Sensing Using Active Feedback Assisted Planar Microwave Resonator. IEEE Microwave and Wireless Components Letters, 2015, 25, 621-623.	2.0	71
68	Microbead-assisted high resolution microwave planar ring resonator for organic-vapor sensing. Applied Physics Letters, 2015, 106, .	1.5	52
69	Detection of Volatile Organic Compounds Using Microwave Sensors. IEEE Sensors Journal, 2015, 15, 248-254.	2.4	66
70	Design and fabrication of a square shape bulk mode MEMS resonators. Microsystem Technologies, 2015, 21, 2455-2462.	1.2	3
71	A novel technique for rapid vapor detection using swelling polymer covered microstrip ring resonator. , 2014, , .		21