

Nguyen Hoa

List of Publications by Year in descending order

Source: <https://exaly.com/author-pdf/4895254/publications.pdf>

Version: 2024-02-01

92
papers

3,902
citations

87888

38
h-index

138484

58
g-index

92
all docs

92
docs citations

92
times ranked

3857
citing authors

#	ARTICLE	IF	CITATIONS
1	Design of SnO ₂ /ZnO hierarchical nanostructures for enhanced ethanol gas-sensing performance. <i>Sensors and Actuators B: Chemical</i> , 2012, 174, 594-601.	7.8	174
2	Synthesis of Mesoporous NiO Nanosheets for the Detection of Toxic NO ₂ Gas. <i>Chemistry - A European Journal</i> , 2011, 17, 12896-12901.	3.3	158
3	Synthesis of porous CuO nanowires and its application to hydrogen detection. <i>Sensors and Actuators B: Chemical</i> , 2010, 146, 266-272.	7.8	142
4	Effective decoration of Pd nanoparticles on the surface of SnO ₂ nanowires for enhancement of CO gas-sensing performance. <i>Journal of Hazardous Materials</i> , 2014, 265, 124-132.	12.4	125
5	Chlorine Gas Sensing Performance of On-Chip Grown ZnO, WO ₃ , and SnO ₂ Nanowire Sensors. <i>ACS Applied Materials & Interfaces</i> , 2016, 8, 4828-4837.	8.0	116
6	On-chip fabrication of SnO ₂ -nanowire gas sensor: The effect of growth time on sensor performance. <i>Sensors and Actuators B: Chemical</i> , 2010, 146, 361-367.	7.8	102
7	One-step fabrication of SnO ₂ porous nanofiber gas sensors for sub-ppm H ₂ S detection. <i>Sensors and Actuators A: Physical</i> , 2020, 303, 111722.	4.1	98
8	Synthesis of p-type semiconducting cupric oxide thin films and their application to hydrogen detection. <i>Sensors and Actuators B: Chemical</i> , 2010, 146, 239-244.	7.8	96
9	Outstanding gas-sensing performance of graphene/SnO ₂ nanowire Schottky junctions. <i>Applied Physics Letters</i> , 2014, 105, .	3.3	93
10	Facile on-chip electrospinning of ZnFe ₂ O ₄ nanofiber sensors with excellent sensing performance to H ₂ S down ppb level. <i>Journal of Hazardous Materials</i> , 2018, 360, 6-16.	12.4	87
11	Facile synthesis of ultrafine rGO/WO ₃ nanowire nanocomposites for highly sensitive toxic NH ₃ gas sensors. <i>Materials Research Bulletin</i> , 2020, 125, 110810.	5.2	80
12	Excellent detection of H ₂ S gas at ppb concentrations using ZnFe ₂ O ₄ nanofibers loaded with reduced graphene oxide. <i>Sensors and Actuators B: Chemical</i> , 2019, 282, 876-884.	7.8	75
13	On-chip growth of wafer-scale planar-type ZnO nanorod sensors for effective detection of CO gas. <i>Sensors and Actuators B: Chemical</i> , 2013, 181, 529-536.	7.8	74
14	Meso-/Nanoporous Semiconducting Metal Oxides for Gas Sensor Applications. <i>Journal of Nanomaterials</i> , 2015, 2015, 1-14.	2.7	71
15	Diameter controlled synthesis of tungsten oxide nanorod bundles for highly sensitive NO ₂ gas sensors. <i>Sensors and Actuators B: Chemical</i> , 2013, 183, 372-380.	7.8	70
16	Enhancement of gas-sensing characteristics of hydrothermally synthesized WO ₃ nanorods by surface decoration with Pd nanoparticles. <i>Sensors and Actuators B: Chemical</i> , 2016, 223, 453-460.	7.8	70
17	Controllable growth of ZnO nanowires grown on discrete islands of Au catalyst for realization of planar-type micro gas sensors. <i>Sensors and Actuators B: Chemical</i> , 2014, 193, 888-894.	7.8	69
18	Bilayer SnO ₂ /WO ₃ nanofilms for enhanced NH ₃ gas sensing performance. <i>Materials Science and Engineering B: Solid-State Materials for Advanced Technology</i> , 2017, 224, 163-170.	3.5	67

#	ARTICLE	IF	CITATIONS
19	Controlled synthesis of ultrathin MoS ₂ nanoflowers for highly enhanced NO ₂ sensing at room temperature. RSC Advances, 2020, 10, 12759-12771.	3.6	67
20	In-situ decoration of Pd nanocrystals on crystalline mesoporous NiO nanosheets for effective hydrogen gas sensors. International Journal of Hydrogen Energy, 2013, 38, 12090-12100.	7.1	61
21	A comparative study on the electrochemical properties of nanoporous nickel oxide nanowires and nanosheets prepared by a hydrothermal method. RSC Advances, 2018, 8, 19449-19455.	3.6	57
22	C ₂ H ₅ OH and NO ₂ sensing properties of ZnO nanostructures: correlation between crystal size, defect level and sensing performance. RSC Advances, 2018, 8, 5629-5639.	3.6	55
23	High-performance acetone gas sensor based on Pt@Zn ₂ SnO ₄ hollow octahedra for diabetic diagnosis. Journal of Alloys and Compounds, 2021, 886, 161284.	5.5	54
24	Novel Self-Heated Gas Sensors Using on-Chip Networked Nanowires with Ultralow Power Consumption. ACS Applied Materials & Interfaces, 2017, 9, 6153-6162.	8.0	53
25	Superior enhancement of NO ₂ gas response using n-p-n transition of carbon nanotubes/SnO ₂ nanowires heterojunctions. Sensors and Actuators B: Chemical, 2017, 238, 1120-1127.	7.8	53
26	Enhanced NH ₃ and H ₂ gas sensing with H ₂ S gas interference using multilayer SnO ₂ /Pt/WO ₃ nanofilms. Journal of Hazardous Materials, 2021, 412, 125181.	12.4	52
27	Comparative NO ₂ gas-sensing performance of the self-heated individual, multiple and networked SnO ₂ nanowire sensors fabricated by a simple process. Sensors and Actuators B: Chemical, 2014, 201, 7-12.	7.8	51
28	Effective monitoring and classification of hydrogen and ammonia gases with a bilayer Pt/SnO ₂ thin film sensor. International Journal of Hydrogen Energy, 2020, 45, 2418-2428.	7.1	51
29	Gas nanosensor design packages based on tungsten oxide: mesocages, hollow spheres, and nanowires. Nanotechnology, 2011, 22, 485503.	2.6	50
30	On-chip hydrothermal growth of ZnO nanorods at low temperature for highly selective NO ₂ gas sensor. Materials Letters, 2016, 169, 231-235.	2.6	50
31	VOC gas sensor based on hollow cubic assembled nanocrystal Zn ₂ SnO ₄ for breath analysis. Sensors and Actuators A: Physical, 2020, 302, 111834.	4.1	50
32	Gas sensing materials roadmap. Journal of Physics Condensed Matter, 2021, 33, 303001.	1.8	49
33	Giant enhancement of H ₂ S gas response by decorating n-type SnO ₂ nanowires with p-type NiO nanoparticles. Applied Physics Letters, 2012, 101, .	3.3	48
34	Nanoporous and crystal evolution in nickel oxide nanosheets for enhanced gas-sensing performance. Sensors and Actuators B: Chemical, 2018, 273, 784-793.	7.8	47
35	Urea mediated synthesis of Ni(OH) ₂ nanowires and their conversion into NiO nanostructure for hydrogen gas-sensing application. International Journal of Hydrogen Energy, 2018, 43, 9446-9453.	7.1	46
36	Facile synthesis of p-type semiconducting cupric oxide nanowires and their gas-sensing properties. Physica E: Low-Dimensional Systems and Nanostructures, 2009, 42, 146-149.	2.7	45

#	ARTICLE	IF	CITATIONS
37	Gas sensor based on nanoporous hematite nanoparticles: Effect of synthesis pathways on morphology and gas sensing properties. <i>Current Applied Physics</i> , 2012, 12, 1355-1360.	2.4	42
38	Room temperature highly toxic NO ₂ gas sensors based on rootstock/scion nanowires of SnO ₂ /ZnO, ZnO/SnO ₂ , SnO ₂ /SnO ₂ and, ZnO/ZnO. <i>Sensors and Actuators B: Chemical</i> , 2021, 348, 130652.	7.8	40
39	Synthesis of single-crystal SnO ₂ nanowires for NO _x gas sensors application. <i>Ceramics International</i> , 2012, 38, 6557-6563.	4.8	37
40	Self-heated Ag-decorated SnO ₂ nanowires with low power consumption used as a predictive virtual multisensor for H ₂ S-selective sensing. <i>Analytica Chimica Acta</i> , 2019, 1069, 108-116.	5.4	37
41	Scalable Fabrication of High-Performance NO ₂ Gas Sensors Based on Tungsten Oxide Nanowires by On-Chip Growth and RuO ₂ -Functionalization. <i>ACS Applied Materials & Interfaces</i> , 2014, 6, 12022-12030.	8.0	36
42	Effective design and fabrication of low-power-consumption self-heated SnO ₂ nanowire sensors for reducing gases. <i>Sensors and Actuators B: Chemical</i> , 2019, 295, 144-152.	7.8	35
43	Multi gas sensors using one nanomaterial, temperature gradient, and machine learning algorithms for discrimination of gases and their concentration. <i>Analytica Chimica Acta</i> , 2020, 1124, 85-93.	5.4	35
44	Scalable fabrication of SnO ₂ thin films sensitized with CuO islands for enhanced H ₂ S gas sensing performance. <i>Applied Surface Science</i> , 2015, 324, 280-285.	6.1	34
45	Ethanol-Sensing Characteristics of Nanostructured ZnO: Nanorods, Nanowires, and Porous Nanoparticles. <i>Journal of Electronic Materials</i> , 2017, 46, 3406-3411.	2.2	34
46	On-chip growth of patterned ZnO nanorod sensors with PdO decoration for enhancement of hydrogen-sensing performance. <i>International Journal of Hydrogen Energy</i> , 2017, 42, 16294-16304.	7.1	34
47	General and scalable route to synthesize nanowire-structured semiconducting metal oxides for gas-sensor applications. <i>Journal of Alloys and Compounds</i> , 2013, 549, 260-268.	5.5	32
48	Comparative effects of synthesis parameters on the NO ₂ gas-sensing performance of on-chip grown ZnO and Zn ₂ SnO ₄ nanowire sensors. <i>Journal of Alloys and Compounds</i> , 2018, 765, 1237-1242.	5.5	32
49	Ultrasensitive NO ₂ gas sensing performance of two dimensional ZnO nanomaterials: Nanosheets and nanoplates. <i>Ceramics International</i> , 2021, 47, 28811-28820.	4.8	31
50	Au doped ZnO/SnO ₂ composite nanofibers for enhanced H ₂ S gas sensing performance. <i>Sensors and Actuators A: Physical</i> , 2021, 317, 112454.	4.1	30
51	Highly selective H ₂ S gas sensor based on WO ₃ -coated SnO ₂ nanowires. <i>Materials Today Communications</i> , 2021, 26, 102094.	1.9	29
52	MoS ₂ nanosheets-decorated SnO ₂ nanofibers for enhanced SO ₂ gas sensing performance and classification of CO, NH ₃ and H ₂ gases. <i>Analytica Chimica Acta</i> , 2021, 1167, 338576.	5.4	29
53	Enhanced NO ₂ gas-sensing performance at room temperature using exfoliated MoS ₂ nanosheets. <i>Sensors and Actuators A: Physical</i> , 2021, 332, 113137.	4.1	28
54	Micro-wheels composed of self-assembled tungsten oxide nanorods for highly sensitive detection of low level toxic chlorine gas. <i>RSC Advances</i> , 2015, 5, 25204-25207.	3.6	27

#	ARTICLE	IF	CITATIONS
55	Ultrasensitive NO ₂ gas sensors using tungsten oxide nanowires with multiple junctions self-assembled on discrete catalyst islands via on-chip fabrication. <i>Sensors and Actuators B: Chemical</i> , 2016, 227, 198-203.	7.8	27
56	SO ₂ and H ₂ S Sensing Properties of Hydrothermally Synthesized CuO Nanoplates. <i>Journal of Electronic Materials</i> , 2018, 47, 7170-7178.	2.2	27
57	Effective hydrogen gas nanosensor based on bead-like nanowires of platinum-decorated tin oxide. <i>Sensors and Actuators B: Chemical</i> , 2012, 173, 211-217.	7.8	26
58	Ultrasensitive NO ₂ gas sensors using hybrid heterojunctions of multi-walled carbon nanotubes and on-chip grown SnO ₂ nanowires. <i>Applied Physics Letters</i> , 2018, 112, .	3.3	26
59	An effective H ₂ S sensor based on SnO ₂ nanowires decorated with NiO nanoparticles by electron beam evaporation. <i>RSC Advances</i> , 2019, 9, 13887-13895.	3.6	26
60	Enhanced H ₂ S gas-sensing performance of γ -Fe ₂ O ₃ nanofibers by optimizing process conditions and loading with reduced graphene oxide. <i>Journal of Alloys and Compounds</i> , 2020, 826, 154169.	5.5	26
61	A novel design and fabrication of self-heated In ₂ O ₃ nanowire gas sensor on glass for ethanol detection. <i>Sensors and Actuators A: Physical</i> , 2022, 345, 113769.	4.1	24
62	Ultralow power consumption gas sensor based on a self-heated nanojunction of SnO ₂ nanowires. <i>RSC Advances</i> , 2018, 8, 36323-36330.	3.6	23
63	A comparative study on the VOCs gas sensing properties of Zn ₂ SnO ₄ nanoparticles, hollow cubes, and hollow octahedra towards exhaled breath analysis. <i>Sensors and Actuators B: Chemical</i> , 2021, 343, 130147.	7.8	23
64	Density-controllable growth of SnO ₂ nanowire junction-bridging across electrode for low-temperature NO ₂ gas detection. <i>Journal of Materials Science</i> , 2013, 48, 7253-7259.	3.7	21
65	Single-crystal zinc oxide nanorods with nanovoids as highly sensitive NO ₂ nanosensors. <i>Materials Letters</i> , 2013, 94, 41-43.	2.6	21
66	Nanoporous hematite nanoparticles: Synthesis and applications for benzylation of benzene and aromatic compounds. <i>Journal of Alloys and Compounds</i> , 2014, 582, 83-87.	5.5	21
67	A facile synthesis of ruthenium/reduced graphene oxide nanocomposite for effective electrochemical applications. <i>Solar Energy</i> , 2019, 191, 420-426.	6.1	21
68	Electronic noses based on metal oxide nanowires: A review. <i>Nanotechnology Reviews</i> , 2022, 11, 897-925.	5.8	21
69	Comparison of NO ₂ Gas-Sensing Properties of Three Different ZnO Nanostructures Synthesized by On-Chip Low-Temperature Hydrothermal Growth. <i>Journal of Electronic Materials</i> , 2018, 47, 785-793.	2.2	18
70	New Design of ZnO Nanorod- and Nanowire-Based NO ₂ Room-Temperature Sensors Prepared by Hydrothermal Method. <i>Journal of Nanomaterials</i> , 2019, 2019, 1-9.	2.7	17
71	Dip-coating decoration of Ag ₂ O nanoparticles on SnO ₂ nanowires for high-performance H ₂ S gas sensors. <i>RSC Advances</i> , 2020, 10, 17713-17723.	3.6	17
72	Nanoporous ZnO nanostructure synthesis by a facile method for superior sensitivity ethanol sensor applications. <i>RSC Advances</i> , 2016, 6, 64215-64218.	3.6	16

#	ARTICLE	IF	CITATIONS
73	Controlled Growth of Vertically Oriented Trilayer MoS ₂ Nanoflakes for Room-Temperature NO ₂ Gas Sensor Applications. <i>Physica Status Solidi (A) Applications and Materials Science</i> , 2020, 217, 2000004.	1.8	16
74	Prototype edge-grown nanowire sensor array for the real-time monitoring and classification of multiple gases. <i>Journal of Science: Advanced Materials and Devices</i> , 2020, 5, 409-416.	3.1	15
75	Urea mediated synthesis and acetone-sensing properties of ultrathin porous ZnO nanoplates. <i>Materials Today Communications</i> , 2020, 25, 101445.	1.9	15
76	ZnO coral-like nanoplates decorated with Pd nanoparticles for enhanced VOC gas sensing. <i>Journal of Science: Advanced Materials and Devices</i> , 2021, 6, 453-461.	3.1	15
77	Hollow ZnO nanorices prepared by a simple hydrothermal method for NO ₂ and SO ₂ gas sensors. <i>RSC Advances</i> , 2021, 11, 33613-33625.	3.6	15
78	Facile Hydrothermal Synthesis of Two-Dimensional Porous ZnO Nanosheets for Highly Sensitive Ethanol Sensor. <i>Journal of Nanomaterials</i> , 2019, 2019, 1-7.	2.7	13
79	Nitrogen-Doped Graphene Synthesized from a Single Liquid Precursor for a Field Effect Transistor. <i>Journal of Electronic Materials</i> , 2016, 45, 839-845.	2.2	12
80	CuO Nanofibers Prepared by Electrospinning for Gas Sensing Application: Effect of Copper Salt Concentration. <i>Journal of Nanoscience and Nanotechnology</i> , 2016, 16, 7910-7918.	0.9	11
81	Design and fabrication of effective gradient temperature sensor array based on bilayer SnO ₂ /Pt for gas classification. <i>Sensors and Actuators B: Chemical</i> , 2022, 351, 130979.	7.8	11
82	3D micro-combs self-assembled from 2D N-doped In ₂ S ₃ for room-temperature reversible NO ₂ gas sensing. <i>Applied Materials Today</i> , 2022, 26, 101355.	4.3	11
83	Facile synthesis of single-crystal nanoporous Ni _{1-x} NiS nanosheets from Ni(OH) ₂ counterpart. <i>Materials Letters</i> , 2015, 161, 282-285.	2.6	10
84	Stable Electrochemical Measurements of Platinum Screen-Printed Electrodes Modified with Vertical ZnO Nanorods for Bacterial Detection. <i>Journal of Nanomaterials</i> , 2019, 2019, 1-9.	2.7	10
85	Transition metal oxides as Pt-free counter electrodes for liquid-junction photovoltaic devices. <i>Vietnam Journal of Chemistry</i> , 2019, 57, 784-791.	0.8	9
86	Realization of a portable H ₂ S sensing instrument based on SnO ₂ nanowires. <i>Journal of Science: Advanced Materials and Devices</i> , 2020, 5, 40-47.	3.1	9
87	Single crystal cupric oxide nanowires: Length- and density-controlled growth and gas-sensing characteristics. <i>Physica E: Low-Dimensional Systems and Nanostructures</i> , 2014, 58, 16-23.	2.7	8
88	Facile Synthesis of Pd-CuO Nanoplates with Enhanced SO ₂ and H ₂ Gas-Sensing Characteristics. <i>Journal of Electronic Materials</i> , 2021, 50, 2767-2778.	2.2	8
89	Fabrication of p-Type Co ₃ O ₄ Nanofiber Sensors for Ultra-Low H ₂ S Gas Detection at Low Temperature. <i>Journal of Nanoscience and Nanotechnology</i> , 2021, 21, 2626-2632.	0.9	2
90	Controlled growth of indium oxide nanowires for gas sensing application. <i>Recent Patents on Nanotechnology</i> , 2021, 15, .	1.3	1

#	ARTICLE	IF	CITATIONS
91	Effective Removal of Arsenic in Drinking Water Using Facile Synthesized Fe ₂ O ₃ Coated N-Doped TiO ₂ Nanoparticles. Journal of Water Chemistry and Technology, 2020, 42, 485-490.	0.6	1
92	Preparation and Gas Sensing Properties of rGO/CuO Nanocomposites. ECS Journal of Solid State Science and Technology, 2022, 11, 035009.	1.8	1