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Junior Researcher

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Junior Researcher

Education

Institution	Yerevan State University
Faculty	Radiophysics/Microelectronics
Date	2020 - 2022
Degree name	Masters

Institution	Yerevan State University
Faculty	Radiophysics/Microelectronics
Date	2016 - 2020
Degree name	Bachelor

Language skills

Հայերեն Русский English

Work experience

Institution	Center of Semiconductor Devices and Nanotechnologies of Yerevan State University
Period of time	2022 till now
Rank/degree	Junior Researcher

Publications

Article

Ultra-high selective hydrogen peroxide vapor sensor based on the Fe2O3/MWCNTs nanocomposite

Artak Sayunts, Rima Papovyan, Gevorg Shahkhatuni, Zarine Simonyan, Davit Kananov, Gabriel Gevorgyan, Dušan Kopecký, Mikayel Aleksanyan

International Journal of Smart and Nano Materials 2026 2637516

https://www.tandfonline.com/doi/full/10.1080/19475411.2026.2637516

Article

Enhanced Humidity Sensing Performance of Fe 2 O 3 :ZnO/MWCNTs Nanocomposite: Fabrication and Characterization

Artak Sayunts, Gevorg Shahkhatuni, Rima Papovyan, Zarine Simonyan, Davit Kananov, Gohar Shahnazaryan, Gabriel Gevorgyan, Andranik Grigoryan, Dušan Kopecký, Mikayel Aleksanyan

ACS Omega 2026 31627–31638

https://doi.org/10.1021/acsomega.6c02389

Article

SnO2/MWCNTs Nanostructured Material for High-Performance Acetone and Ethanol Gas Sensors

Mikayel Aleksanyan, Artak Sayunts, Gevorg Shahkhatuni, Zarine Simonyan, Davit Kananov, Emma Khachaturyan, Rima Papovyan, Alena Michalcová, Dušan Kopecký

ACS Omega 2025 7283-7294

Article

Fabrication and Characterization of MWCNTs Decorated ZnO Nanograins Based Sensor for Enhanced Performance Toward CO2 Gas

Mikayel Aleksanyan, Artak Sayunts, Gevorg Shahkhatuni, Zarine Simonyan, Davit Kananov, Rima Papovyan, Dušan Kopecký

Advanced Materials Interfaces 2025 2500185

Article

Influence of the Growth Parameters on RF-Sputtered CNTs and Their Temperature-Selective Application in Gas Sensors

Mikayel Aleksanyan, Artak Sayunts, Gevorg Shahkhatuni, Zarine Simonyan, Davit Kananov, Rima Papovyan, Dušan Kopecký

ACS Omega 2025 34733–34746

Article

Highly Sensitive Ammonia Gas Sensor Based on MWCNTs Saturated Fe2O3 Nanograins

Mikayel Aleksanyan, Artak Sayunts, Gevorg Shahkhatuni, Zarine Simonyan, Davit Kananov, Andranik Grigoryan, Rima Papovyan, Dušan Kopecký

Langmuir 2025 26614–26627

Conference

Fabrication and Characterization of CO2 Sensor Using ZnO Nanograins

M. Aleksanyan, G. Shahkhatuni, Z. Simonyan, G. Shahnazaryan, R. Papovyan, D. Kananov, A. Grigoryan, G. Gevorgyan, G. Stepanyan, A. Sayunts

2025 307-308

https://www.smsi-conference.com/

Article

MWCNTs/Fe2O3:ZnO Nanocomposite Material for Chemoresistive Sensing of Hydrogen Peroxide Vapors

Mikayel Aleksanyan, Artak Sayunts, Gevorg Shahkhatuni, Zarine Simonyan, Davit Kananov, Hayk Kasparyan, Dušan Kopecky

ACS Applied Electronic Materials 2024 940-949

Article

Fabrication of the Fe2O3:ZnO Based Nanostructured Sensor for LPG Detection
Mikayel Aleksanyan,, Artak Sayunts, Gevorg Shahkhatuni, Gohar Shahnazaryan, Zarine Simonyan,

Davit Kananov

e-Journal of Surface Science and Nanotechnology 2024 149-156

Article

Acetone Vapors Detection Using a MWCNTs/SnO2 Nanocomposite Material
Mikayel Aleksanyan, Artak Sayunts, Gevorg Shahkhatuni, Zarine Simonyan, Davit Kananov,

Emma Khachaturyan, Dušan Kopecký

ACS Applied Electronic Materials 2024 4090–4098

Article

Flexible Gas Sensor Based on the RF-Grown Fe2O3:ZnO/CNTs Material for Propylene Glycol Vapor Detection
Mikayel Aleksanyan, Artak Sayunts, Gevorg Shahkhatuni, Zarine Simonyan, Davit Kananov,

Alena Michalcová, Lukáš Koláčný, Dušan Kopecký

ACS Applied Electronic Materials 2024 6893–6904

Article

Investigation of the MWCNT/SnO2 Sensor for the Detection of Acetone Vapors
M. S. Aleksanyan, G. H. Shahkhatuni, E. A. Khachaturyan, G. E. Shahnazaryan, A. G. Sayunts,

H. R. Hovhannisyan, D. A. Kananov

Journal of Contemporary Physics (Armenian Academy of Sciences) 2023 67-72

Article

Optoelectronic Transimpedance Converter Based on MOS Photovaricap for High Resistive Gas Sensors
Semerjyan B.O., D.A. Kananov, M.S. Alexanyan

Armenian Journal of Physics 2023 119 -125
