Gayane Hovhannes Petrosyan

Research Institute of Biology
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Junior Researcher

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Education

Institution	Yerevan State University
Faculty	Biology
Date	2014 - 2016
Degree name	Masters

Institution	Yerevan State University
Faculty	Biology
Date	2010 - 2014
Degree name	Bachelor

Language skills

Русский English

Work experience

Institution	Erevan State University
Period of time	2022 till now
Rank/degree	Junior resercher

Institution	Erevan State University
Period of time	2016 - 2022
Rank/degree	Senior Assistant at Laboratory of Biochemistry

Publications

Article
Evaluating the Efficacy of Polyphenol-Enriched Plant Extracts and Pathway Modulators in the Bone Marrow to Suppress Breast Cancer Progression
Hayarpi Javrushyan, Gayane Petrosyan, Marika Mróz, Barbara Kusznierewicz, Yem Alharithi,

Mikayel Ginovyan, Alina Maloyan, Nikolay Avtandilyan

The FASEB Journal 2026 e71651 - e71651

https://doi.org/10.1096/fj.202501773rrr

Conference

Modulating Bone Marrow Microenvironment in Breast Cancer: Impact of Combined Chemotherapy and Herbal Extracts

Edita Nadiryan, Gayane Petrosyan, Nikolay Avtandilyan, Hayarpi Javrushyan

2025 145-145

https://www.ysu.am/en/conference/869

Conference

Hypericum alpestre Extract and L-NAME Suppress PI3K/Akt Pathway and Enhance Apoptosis in Lung and Breast Cancer Cells

Svetlana Hovhannisyan, Gayane Petrosyan, Hayarpi Javrushyan, Mikayel Ginovyan, Nikolay Avtandilyan

2025 146-146

https://journals.ysu.am/index.php/jisees/issue/view/SI_1_2025

Article

THEREGULATION OF DEAMINATION OF ADENINE COMPOUNDS IN BREASTANDLIVERIN DMBA-INDUCED BREASTCANCERRATS TREATED BYHYPERICUM ALPESTRE

G. H. PETROSYAN, S. V. MARUTYAN, N. V. AVTANDILYAN

Proceedings of the YSU B Chemical and Biological Sciences 2024 17-26

Article

MODULATION OF THE L-ARGININE METABOLIC PATHWAY IN HeLa CANCER CELLS THROUGH COMBINED TREATMENT WITH PATHWAY INHIBITORS AND HERBAL EXTRACTS

Gayane Petrosyan

ԵՊՀ գիտական տեղեկագիր. Քիմիա և կենսաբանություն: 2024 171-180

Article

Anti-cancer effect of Rumex obtusifolius in combination with arginase/nitric oxide synthase inhibitors via downregulation of oxidative stress, inflammation, and polyamine synthesis

Mikayel Ginovyan, Hayarpi Javrushyan, Gayane Petrosyan, Barbara Kusznierewicz,

Izabela Koss-Mikołajczyk, Zuzanna Koziara, Monika Kuczyńska, Patrycja Jakubek, Anna Karapetyan,

Naira Sahakyan, Alina Maloyan, Agnieszka Bartoszek, Nikolay Avtandilyan

The International Journal of Biochemistry & Cell Biology 2023 106396

Article

THE CYTOTOXIC PROPERTIES OF ALCHEMILLA SMIRNOVII EXTRACT ON THE HELA CANCER CELLS VIA DOWNREGULATION OF ARGINASE ACTIVITY

S.M. Hovhannisyan, E.E. Nadiryan, M.V. Qocharyan, G.H. Petrosyan, G.P. Sevoyan, Z.I. Karabekyan,

H.G. Javrushyan, M.M Ginovyan, N.V. Avtandilyan

ԵՊՀ գիտական տեղեկագիր. Քիմիա և կենսաբանություն: 2023 238-247

Article

REGULATORY EFFECTS OF RUMEX OBTUSIFOLIUS AND HYPERICUM ALPESTRE EXTRACTS ON THE QUANTITY OF IL-2 IN IN VITRO AND IN VIVO CANCER MODELS

E.E. Nadiryan, S.M. Hovhannisyan, M. V. Qocharyan, G.H. Petrosyan, H.G. Javrushyan, M.M. Ginovyan,

N.V. Avtandilyan

ԵՊՀ գիտական տեղեկագիր. Քիմիա և կենսաբանություն: 2023 248-257

Conference

Anti-inflammatory and immunostimulatory effect of Hypericum alpestre combined with arginase and NOS inhibitors in the rat breast cancer model

H.Javrushyan, E.Nadiryan, G.Petrosyan, M.Ginovyan, A.Maloyan, N.Avtandilyan

2023 95 - 95

https://febs.onlinelibrary.wiley.com/doi/epdf/10.1002/2211-5463.13646

Article

ALTERATION OF TOTAL AND MITOCHONDRIAL ATPASE ACTIVITY IN THE BREAST AND LIVER IN BREAST CANCER-INDUCED RATS

Seda V. Marutyan, Gayane A. Petrosyan, Anna R. Muradyan, Lilit A. Marutyan, Syuzan A. Marutyan,

Nikolay V. Avtandilyan

Proceedings of the YSU B Chemical and Biological Sciences 2022 151-160

Conference

Changes in some metabolic processes of yeasts Candida guilliermondii NP-4 under influence of microwaves with a frequency of 51.8GHz

Marutyan S.V., Petrosyan G.A., Karapetyan H.M., Marutyan S.A., Khachatryan L.D., Kalantaryan V.P.,

Muradyan A.

2022 1

https://2022congress.febs-iubmb-pabmb.org/

Conference

Deamination of adenine compounds in different organs of rats with DMBA-induced cancer

G.Petrosyan, N.Avtandilyan, S.Marutyan

2022 1

https://2022congress.febs-iubmb-pabmb.org/

Article

ВЛИЯНИЕ РЕНТГЕНОВСКОГО И МИКРОВОЛНОВОГО ИЗЛУЧЕНИЙ НА ДЕЗАМИНИРОВАНИЕ ПУРИНОВЫХ НУКЛЕОТИДОВ В ДРОЖЖЕВЫХ КЛЕТКАХ CANDIDA GUILLIERMONDII НП-4

S. Marutyan, G. Petrosyan, S. Marutyan, L. Navasardyan, A. Trchounian

IZVESTIYA VYSSHIKH UCHEBNYKH ZAVEDENIY KHIMIYA KHIMICHESKAYA TEKHNOLOGIYA 2019 48-52

Conference

Oxidative stress in the 7,12-dimethylbenz[a] anthracene rat model of breast cancer: suppression by a NO-synthase inhibitor NG- nitro-L-arginine methyl ester

N.Avtandilyan, G.Petrosyan, A.Trchounian

2019 341-341

https://2019.febscongress.org/

Conference

Влияние рентгеновского облучения и микроволн на АТФ-азную активность митохондрий дрожжей C.guilliermondii НП-4

Л.А.Навасардян, С.В. Марутян, С.А. Марутян, Г.А.Петросян

2019 97-99

Article

The Involvement of Arginase and Nitric Oxide Synthase in Breast Cancer Development: Arginase and NO Synthase as Therapeutic Targets in Cancer

Nikolay Avtandilyan, Hayarpi Javrushyan, Gayane Petrosyan, Armen Trchounian

BioMed Research International 2018 8696923,9

https://www.hindawi.com/journals/bmri/2018/8696923/

Article

ՄԻԼԻՄԵՏՐԱԿԱՆ ԵՎ ԴԵՑԻՄԵՏՐԱԿԱՆ ԱԼԻՔՆԵՐԻ ԱԶԴԵՑՈՒԹՅՈՒՆԸ C. GUILLIERMONDII ՀՊ-4 ԽՄՈՐԱՍՆԿԵՐՈՒՄ ԱԴԵՆԻՆԱՅԻՆ ԵՎ ԳՈՒԱՆԻՆԱՅԻՆ ՄԻԱՑՈՒԹՅՈՒՆՆԵՐԻ ԴԵՀԱՄԻՆԱՑՄԱՆ ՎՐԱ

Գևորգյան Սուսաննա, Պետրոսյան Գայանե

ԵՊՀ ՈՒԳԸ գիտական հոդվածների ժողովածու 2018 150-158

Conference

Arginase is an enzyme with real tricks in antitumor treatment of 7,12-dimethylbenz(a) anthracene induced breast cancer in rats

G.Petrosyan, N. Avtandilyan, H. Javrushyan, A. Trchounian

2018 385-386

https://2018.febscongress.org/welcome-message

Conference

Влияние микроволнового излучения на рост и ферментативную активность дрожжей Candida guilliermondii НП-4

Марутян С.В., Петросян Г.А., Марутян С.А., Навасардян Л.А., Трчунян А.А.

2018 57

http://cong-2018.biophys.ru/index.php/archive-cong/cong-2018

Article

Միլիմետրական և դեցիմետրական տիրույթների ճառագայթահարման ազդեցությունը պուրինային նուկլեոտիդների դեզամինացման վրա C.guilliermondii ՀՊ-4 խմորասնկային բջիջներում

Մարության Ս.Վ., Պետրոսյան Գ.Հ., Մարության Ս.Ա., Նավասարդյան Լ.Հ.

Биологический журнал Армении 2017 6-9

https://www.google.am/search?q=%D5%B0%D5%A1%D5%B5%D5%A1%D5%BD%D5%BF%D5%A1%D5%B6...

Article

COMPARATIVE INVESTIGATION OF WATER-SOLUBLE PROTEINS OF X-RADIATED YEASTS CANDIDA GUILLIERMONDII NP-4 BY ELECTROPHORESIS

Gayane Petrosyan, Syuzan Marutyan, Lilit Arshakyan, Seda Marutyan

ԵՊՀ ՈՒԳԸ գիտական հոդվածների ժողովածու 2017 157-163
