

# Syuzan Ashot Marutyan

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## Research Institute of Biology

Basic and Pathological Biochemistry Laboratory  
Junior Researcher

## Education

Institution	YSU
Faculty	Biology
Date	2017 - 2019
Degree name	Masters

Institution	YSU
Faculty	Biology
Date	2013 - 2017
Degree name	Bachelor

## Language skills

Русский English

## Work experience

Institution	YSU STEM school
Period of time	2023 till now
Rank/degree	teacher

Institution	“Royal jelly as a new for radioprotective and antioxidant biochemical drug” 21T-1F300
Period of time	2021 till now
Rank/degree	labourant

Institution	YSU Institute of Biology
Period of time	2019 till now
Rank/degree	Senior Laboratory Assistant

Institution	Nº55 school named after A. Chekhov
Period of time	2017 - 2018
Rank/degree	teacher



## Scientific interests

- molecular biology, radiotion biochemistry

## Publications

### Article

#### **Changes in ATPase activity, antioxidant enzymes and proline biosynthesis in yeast *Candida guilliermondii* NP-4 under X-irradiation**

Hasmik Karapetyan, Syuzan Marutyan, Anna Muradyan, Hamlet Badalyan, Seda Marutyan,

Karen Trchounian

Journal of Bioenergetics and Biomembranes 2024 1-8

### Article

#### **Royal Jelly-Mediated Silver Nanoparticles Show Promising Anticancer Effect on HeLa and A549 Cells Through Modulation of the VEGFa/PI3K/Akt/MMP-2 Pathway**

Meri Kocharyan, Syuzan Marutyan, Edita Nadiryan, Mikayel Ginovyan, Hayarpi Javrushyan,

Seda Marutyan, Nikolay Avtandilyan

Applied Organometallic Chemistry 2024 1-11

### Article

#### **The antimicrobial effects of silver nanoparticles obtained through the royal jelly on the yeasts *Candida guilliermondii* NP-4**

Seda Marutyan, Hasmik Karapetyan, Lusine Khachatryan, Anna Muradyan, Syuzan Marutyan,

Anna Poladyan, KarenTrchounian

Scientific Reports 2024 19163

### 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

### Article

#### **Changes in growth kinetic parameters, morphology and mitotic activity of yeasts *Candida guilliermondii* exposed to the low-intensity waves of 51.8-GHz frequency**

Seda Marutyan, Syuzan Marutyan, Liparit Navasardyan, Karlen Hovnanyan, Armen Trchounian

Archives of Microbiology 2021 3707-3714

### Article

#### **Ultrastructural investigation of acidocalcisomes and ATPase activity in yeasts *Candida guilliermondii* NP-4 as “complementary” stress-targets**

Marutyan S., Marutyan S., Navasardyan L., Trchounian A., Hovnanyan K., Hovnanyan M.

Letters in Applied Microbiology 2020 413-419

### 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

Известия высших учебных заведений. Серия: химия и химическая технология (Izvestiya Vysshikh Uchebnykh Zavedenii, Seriya Khimiya i Khimicheskaya Tekhnologiya)

2019 48-52

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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.

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Conference

### **Влияние рентгеновского облучения и микроволн на морфологию дрожжевых клеток**

#### **C.guilliermondii НП-4**

С.В. МАРУТЯН, С.А. МАРУТЯН, Л.А. НАВАСАРДЯН, К.О. ОВНАНЯН

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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

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Conference

### **Influence of Royal Jelly on the Growth of Yeasts Candida guilliermondii Exposed to**

#### **Electromagnetic Radiation**

S. Marutyan, S.A.Marutyan, S. Gevorgyan, L. Navasardyan, A. Trchounian

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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.

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Conference

### **The effect of Royal Jelly (RJ) on the biomass amount and colony forming ability of yeasts**

#### **C.guilliermondii NP-4**

Navasardyan L.H., Marutyan S.V., Marutyan S.A.

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Conference

### **Influence of silver nanoparticles obtained by the presence of royal jelly on survival of yeasts**

#### **Candida guilliermondii NP-4 and on the activity of antioxidant enzymes**

S. Marutyan, H. Karapetyan, S. Marutyan, L. Khachatryan

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Conference

### **Influence of X-irradiation on the activity of ATPase and enzymes of antioxidant system in yeasts Candida guilliermondii NP-4**

S. Marutyan, A. Muradyan, H. Karapetyan, V. Khalantaryan, S. Marutyan, L. Khachatryan

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Conference

### **ROYAL JELLY AS A MEANS OF REGULATING PROCESSES DISTURBED BY EXPOSED MILLIMETER WAVES**

*Conference*

**Influence of UV-irradiation on lipid peroxidation processes and the activity of plasmatic and mitochondrial ATPases of yeasts *Candida guilliermondii* NP-4**  
S. Marutyan, H. Karapetyan, S. Marutyan, A. Muradyan, T. Manutsyan

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*Conference*

**The effect of royal jelly on biomass accumulation and antioxidant enzyme activity of the yeast *C. guilliermondii* NP-4**  
Marutyan S., Muradyan A., Karapetyan H., Marutyan S.

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*Conference*

**The Effect of 51.8 GHz Microwaves on Nucleotide Deamination and ATPase Activity in *C. guilliermondii* NP-4 Yeast in the Presence of Royal Jelly**  
Marutyan S.A., Muradyan A., Hayrapetyan M., Marutyan S.V.

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