

# Satenik Ghukas Petrosyan

## Institute of Pharmacy

Ֆարմաբիոտեխնոլոգիայի և ֆարմակազնոգիայի ամբիոն  
Associate professor

☎ 34-11  
(060) 71-04-11

✉ satenikpetrosyan@ysu.am

R<sup>6</sup>   

## Education

<b>Institution</b>	Yerevan State University
<b>Faculty</b>	Chemistry (department of pharmaceutical chemistry)
<b>Date</b>	1998 - 2003
<b>Degree name</b>	Qualified specialist

## Scientific Rank/degree

<b>Institution</b>	Scientific and Production Centre “Armbiotechnology” NAS RA
<b>Date</b>	2011
<b>Degree name</b>	Candidate
<b>Specialty</b>	Chemical sciences
<b>Scientific Supervisor</b>	Ashot Saghyan
<b>Research Topic</b>	High selective and fast asymmetric synthesis of non-proteinogenic $\alpha$ -amino acids

## Language skills

Հայերեն Русский English

## Work experience

<b>Institution</b>	YSU Institute of Pharmacy Chair of Pharmaceutical Chemistry and Pharmacognosy
<b>Period of time</b>	2021 till now
<b>Rank/degree</b>	Associate professor

<b>Institution</b>	YSU Institute of Pharmacy
<b>Period of time</b>	2020 till now
<b>Rank/degree</b>	Resercher

<b>Institution</b>	SPC «Armbiotechnology» NAS RA
<b>Period of time</b>	2015 - 2018
<b>Rank/degree</b>	Senior Resercher

<b>Institution</b>	Scientific Research Institute of Biotechnology
--------------------	--

**Period of time** 2013 - 2015  
**Rank/degree** Resercher

---

**Institution** YSU Institute of Pharmacy  
**Period of time** 2011 - 2021  
**Rank/degree** Assistant professor

---

**Institution** YSU Institute of Pharmacy  
**Period of time** 2009 - 2011  
**Rank/degree** Lecturer

---

**Institution** Scientific Research Institute of Biotechnology  
**Period of time** 2008 - 2013  
**Rank/degree** Jonior Resercher

---

**Institution** YSU Faculty of Chemistry Department of Pharmaceutical Chemistry  
**Period of time** 2007 - 2009  
**Rank/degree** Laboratory Assistant

---

**Institution** Scientific Research Institute of Biotechnology  
**Period of time** 2005 - 2008  
**Rank/degree** Senior laboratory Assistant

---

**Institution** Scientific Research Institute of Biotechnology  
**Period of time** 2002 - 2005  
**Rank/degree** Laboratory Assistant

---

## **Scientific interests**

---

- Asymmetric synthesis of non protein amino acids
- 

## **Membership**

---

**Institution** Chairman of methodological council of Institute of Pharmacy  
**Period of time** 2017 till now

---

**Institution** Member of the Scientific Council of the Institute of Pharmacy  
**Period of time** 2017 till now

---

## **Publications**

---

Article

**Binding of G-quadruplex DNA and serum albumins by synthetic non-proteinogenic amino acids: Implications for c-Myc-related anticancer activity and drug delivery**

Hayarpi Simonyan, Satenik Petrosyan, Lusine Sahakyan, Gagik Melikyan, Ashot Sagyan,

Rosanna Palumbo, Caterina Vicidomini, Pasqualina Liana Scognamiglio, Giovanni N. Roviello

Molecular Therapy Nucleic Acids 2025 102478

---

Article

**COMPARATIVE ANALYSIS OF METHODS FOR THE DETECTION AND QUANTITATIVE DETERMINATION OF ETHYL ALCOHOL IN THE BODY**

Satenik Gh. Petrosyan, Lusine Yu. Sahakyan, Nelly A. Kirakosyan

Proceedings of the YSU B: Chemical and Biological Sciences 2024 1-8

---

Article

**BSA Binding and Aggregate Formation of a Synthetic Amino Acid with Potential for Promoting Fibroblast Proliferation: An In Silico, CD Spectroscopic, DLS, and Cellular Study**

Hayarpi Simonyan, Rosanna Palumbo, Satenik Petrosyan, Anna Mkrtchyan, Armen Galstyan,

Ashot Saghyan, Pasqualina Liana Scognamiglio, Caterina Vicidomini, Marta Fik-Jaskólka,

Giovanni N. Roviello

Biomolecules 2024 579

---

Article

**Asymmetric Synthesis of Derivatives of Alanine via Michael Addition Reaction and their Biological Study**

Mkrtchyan Anna, Tovmasyan Anna, Paloyan Ani, Sargsyan Armen, Simonyan Hayarpi, Sahakyan Lusine,

Petrosyan Satenik, Hayriyan Liana, Sargsyan Tatevik

Synlett 2022 2013-2018

---

Article

**ISOLATION, IDENTIFICATION AND QUANTITATIVE DETERMINATION OF NIFEDIPINE FROM BIOLOGICAL MATERIAL**

S.Gh. Petrosyan, L.Yu. Sahakyan, V.G. Kirakosyan, E.V. Minasyan, S. E. Sardaryan

Proceedings of the YSU B: Chemical and Biological Sciences 2021 204-211

---

Article

**Исследование асимметрического нуклеофильного бис-присоединения дегидроаланиновых комплексов Ni(II)**

Петросян С. Г., Симонян А. М., Мкртчян А. Ф., Саакян Л. Ю., Цатурян А. О., Сагян А. С.

Հայաստանի քիմիական հանդես 2020 213-222

---

Manual

**Ջրային գոլորշիներով թորման եղանակով անջատվող նյութերի քիմիոնևաբանական բնութագրեր**

Պետրոսյան Սաթենիկ Ղուկասի

2019 60

---

Article

**Асимметрический синтез новых гетероциклически замещенных аналогов α-аминомасляной кислоты, содержащих замещенные триазольные группы в боковом радикале**

А.С.Сагиян, Л.Ю.Саакян, А.М.Симонян, С.Г.Петросян, А.Ф.Мкртчян, М.А.Самвелян, Т.В.Кочикян,  
П.Лангер  
Химический Журнал Армении 2017 71-81  
<http://www.flib.sci.am/eng/Qimia/Frame.html>

---

*Article*

**Синтез положительно заряженных комплексов CoIII и их исследование в качестве хиральных катализаторов в реакциях асимметрического генерирования С-С связи.**

Мкртчян А. Ф., Геолчанян А. В., Симонян А. М., Петросян С. Г., Сагиян А. С., Малеев В. И.,  
Белоконь Ю. Н., Хрусталев В. Н

Химический Журнал Армении 2015 108-121  
<http://www.flib.sci.am/eng/Qimia/Frame.html>

---

*Article*

**АСИММЕТРИЧЕСКИЙ СИНТЕЗ НОВЫХ ЭНАНТИОМЕРНО ОБОГАЩЕННЫХ НЕНАСЫЩЕННЫХ  $\alpha$ -АМИНОКИСЛОТ**

А. Ф. МКРТЧЯН, Э. З. МАРДИЯН, А. Ж. КАРАПЕТЯН, А. С. ПОГОСЯН, С. Г. ПЕТРОСЯН, А. М. СИМОНЯН,  
А. О. ЦАТУРЯН, А. С. САГИАН

Химический Журнал Армении 2015 403-412  
<http://www.flib.sci.am/eng/Qimia/Frame.html>

---

*Article*

**Thiophenyl-substituted triazolyl-thione L-alanine: asymmetric synthesis, aggregation and biological properties**

Ashot S. Saghyan, Hayarpi M. Simonyan, Petrosyan G. Satenik, Arpine V. Geolchanyan,  
Giovanni N. Riovello, Domenica Musumeci, Valentina Roviello

Amino Acids 2014 2325-2332  
<http://link.springer.com/journal/726>

---

*Conference*

**Asymmetric synthesis of new enantiomerically enriched  $\alpha$ -amino acids**

A.S. Saghyan, A.F. Mkrтчyan, S.G. Petrosyan, J.A. Yedoyan, A.M. Simonyan, A.V. Geolchanyan,  
P. Langer, A.M. Petrosyan

---

*Conference*

**Metallocomplex precursors for the synthesis of 18f-fluorinated aromatic amino acids labelled in alpha fluoromethyl moiety**

A. V. Geolchanyan, A. S. Saghyan, A. F. Mkrтчyan, S. G. Petrosyan, H. M. Simonyan, V. I. Maleev,  
Yu. N. Belokon, R. Schibli, R. N. Krasikova

---

*Conference*

**Asymmetric synthesis of new enantiomerically enriched  $\alpha$ -amino acids**

A.S. Saghyan, S.Gh. Petrosyan, A.V. Geolchanyan, A.F. Mkrтчyan, Z.Z. Mardiyan

---

*Conference*

**Asymmetric synthesis of potential biologically active new heterocyclic analogs of (S)- $\alpha$ -alanine containing 3,4-substituted 5-thioxo-1,2,4- triazoles in the side-chain radical**

H.M. Simonyan, L.Yu. Sahakyan, S.Gh. Petrosyan, A.F. Mkrтчyan, N.N. Baghyan,, J.N. Saribekyan,  
A.S. Saghyan

---

Conference

**Asymmetric synthesis of new heterocyclic analogs of alpha-aminopropionic acid and alpha-aminobutyric acid via Michael nucleophilic addition reactions**

Hayarpi Simonyan, Lusine Sahakyan, Anna Mkrtchyan, Satenik Petrosyan, Ashot Saghyan

---

Conference

**Asymmetric synthesis of enantiomerically enriched analog of  $\alpha$ -aminobutyric acid containing heterocycle in the side chain radical .**

L.Yu.Sahakyan, A.S. Saghyan, H.M. Simonyan, S.Gh.Petrosyan, A.F.Mkrtchyan

---

Conference

**Asymmetric synthesis and biological activity of novel heterocycle substituted analogues of  $\alpha$ -aminobutyric acid**

Sahakyan L.Yu., Simonyan H. M, Petrosyan S. Gh., Mkrtchyan A. F., Simonyan M. A., Saghyan A. S.,

Sekoyan E. S.

---

Conference

**Asymmetric synthesis of potential biologically active new analogs of (S)-alanine containing nitrogenous bases in the side-chain radical**

H.M.Simonyan, L.Yu. Sahakjan, A.F.Mkrtchyan, S.Gh.Petrosyan, N.N.Baghyan, A.O.Voskanyan,

J.N.Saribekyan, A.S.Saghyan

---

Conference

**Асимметрический синтез новых производных (S)- $\alpha$ -аланина, содержащих 3-замещенные 4-изобутил-5-тиоксо-1,2,4-триазолы в боковом радикале**

А.М.Симонян, Н.Н.Багян, А.О.Восканян, Ж.Н.Сарибекян, Л.Ю.Саакян, А.Ф.Мкртчян, С.Г.Петросян,

А.С.Сагиян

---

Conference

**Asymmetric synthesis of enantiomerically enriched analogs of N-allylglycine**

L.A.Hayriyan, A.F.Mkrtchyan, Z.Z.Mardiyanyan, A.J.Karapetyan, H.V. Adonc, H.M. Simonyan, S.Gh. Petrosyan,

L.Yu.Sahakyan, A.S. Saghyan

---

Conference

**Synthesis of optically pure (S)-2-amino-5-(3-fluorophenyl)-2-(prop-2-yn-1-yl)pent-4-ynoic acid by using Sonogashira reaction**

Z.Z. Mardiyanyan, L.A. Hayriyan, A.F.Mkrtchyan, A.X.Tsaturyan, A.J. Karapetyan, H.V. Adonc, H.M. Simonyan,

S.Gh.Petrosyan, L.Yu.Sahakyan, A.S. Saghyan

---

Conference

**Asymmetric synthesis of optically active derivatives of  $\alpha$ -aminobutyric acid containing triazole groups in the side chain radical**

L.Sahakyan, H.Simonyan, S. Petrosyan, A. Mkrtchyan, A. Saghyan, E. Sekoyan

---

Conference

**SYNTHESIS OF A NOVEL HETEROCYCLIC AMINO ACID AND ITS USE FOR THE SYNTHESIS OF SUGAR-AMINO ACID CONJUGATES**

Hayarpi Simonyan, Giovanni Roviello, Anna Mkrtchyan, Lusine Sahakyan, Satenik Petrosyan,

