Aghavni Albert Kutuzyan

Laboratory of Optoelectronics and Photonics
Գերարագ օպտիկայի և ֆոտոնիկայի լաբորատորիա
head of laboratory

Research Institute of Physics
Laboratory of Optoelectronics and Photonics
Գերարագ օպտիկայի և ֆոտոնիկայի լաբորատորիա
head of laboratory

Institute of Physics
Chair of Optics and Photonics
Associate professor

23-32
(060) 71-03-32
akutuzyan@ysu.am

Education

Institution	Yerevan State University
Faculty	Department of Physics
Date	2000 - 2005
Degree name	PhD student

Institution	Yerevan State University
Faculty	Department of Physics
Date	1998 - 2000
Degree name	Masters

Institution	Yerevan State University
Faculty	Probate-investigator
Date	1996 - 1998
Degree name	Qualified specialist

Institution	Yerevan State University
Faculty	Department of Physics
Date	1991 - 1996
Degree name	Bachelor

Scientific Rank/degree

Institution	Yerevan State University
Date	2005
Degree name	Candidate
Scientific Supervisor	Լևոն Մուրադյան

Research Topic	Գերկարճ լազերային իմպուլսների սպեկտրալ սեղմման որոշ առանձնահատկությունների վերլուծությունը

Language skills

Հայերեն English Русский

Work experience

Institution	Yerevan State University
Period of time	2018 till now
Rank/degree	Scientific Director Laboratory of Ultrafast Optics and Photonics

Institution	Yerevan State University
Period of time	2016 till now
Rank/degree	Associate Professor

Publications

Conference

Evaluating the Impact of Linear Correction on Spectral Phase Reconstruction
M. Papyan, L. Mikaelyan, M. Sukiasyan, A. Kutuzyan

2025 62-63

https://ipr.sci.am/LP25/

Conference

Formation of a Functionally Unique Type of Similariton in Optical Fibers
Michael Papyan, Lilit Mikaelyan, Minas Sukiasyan, Aghavni Kutuzyan

2025 60-60

https://www.we-heraeus-stiftung.de/veranstaltungen/optics-and-its-applications-...

Conference

Assessing the Influence of Linear Compensation on Reconstruction of the Spectral Phase Profile
Lilit Mikaelyan, Michael Papyan, Minas Sukiasyan, Aghavni Kutuzyan

2025 94-94

https://www.we-heraeus-stiftung.de/veranstaltungen/optics-and-its-applications-...

Conference

Effect of Weak Nonlinearity on Dispersion-Induced Pulse Broadening in Optical Fibers
Aghavni Kutuzyan, Minas Sukiasyan, Vardan Avetisyan, Karen Apresyan, Meri Kalashyan

2025 92-92

https://www.we-heraeus-stiftung.de/veranstaltungen/optics-and-its-applications-...

Article

Self-referencing similariton-based spectral interferometry for ultrashort pulse complete characterization
Aram Zeytunyan, Garegin Yesayan, Levon Mouradian, Aghavni Kutuzyan

Optics Communications 2024 130059

Article

Generation of a New Type of Similaritons in Optical Fibers [Генерация нового типа симиляритонов в оптических волокнах]
A. Kutuzyan, V. Avetisyan, M. Sukiasyan

Proceedings of NAS RA Physics 2024 36–40

Article

Influence of Noise Distortions of the Spectral Phase on the Profile of an Ultrashort Pulse [Влияние шумовых искажений спектральной фазы на профиль ультракороткого импульса]
V. Avetisyan, M. Sukiasyan, A. Avetisyan, A. Kirakosyan, A. Kutuzyan

Proceedings of NAS RA Physics 2024 149-153

Article

ՍՊԵԿՏՐԱԼ ՓՈՒԼԻ ՇԵՂՈՒՄՆԵՐԻ ԵՎ ԱՂԱՎԱՂՈՒՄՆԵՐԻ ԱԶԴԵՑՈՒԹՅՈՒՆԸ ԳԵՐԿԱՐՃ ԻՄՊՈՒԼՍԻ ՏԵՍՔԻ ՎՐԱ
Ավետիսյան Աննա, Ավետիսյան Վարդան, Կուտուզյան Աղավնի

Գավառի պետական համալսարանի գիտական հոդվածների ժողովածու 2024 87-97

Article

Self-Formation of Temporal Dark Solitons in a Single-Mode Optical Fiber [Самоформирование временных темных солитонов в одномодовом оптическом волокне]
A. Kutuzyan, M. Sukiasyan, Ar. Kirakosyan, V. Avetisyan

Proceedings of NAS RA Physics 2024 238-243

Article

Spectral Self-Compression of Chirp-Free Pulses in Anomalously Dispersive Optical Fibers
Minas Sukiasyan, Vardan Avetisyan, Aghavni Kutuzyan

Photonics 2023 1207

Conference

The influence of spectral phase noise in the laser pulse reconstruction
Anna Avetisyan, Minas Sukiasyan, Arthur Kirakosyan, Aghavni Kutuzyan

2023 94 - 94

https://photonicsai.com/wp-content/uploads/2023/08/Book-of-Abstracts_OPTICS11.p...

Conference

Noise sensitivity in the spectral phase measurement technique based on dispersive Fourier transform
M. Sukiasyan, A. Avetisyan, A. Kutuzyan

2023 74-75

https://ipr.sci.am/pl/conferences/archive.html

Conference

THE INFLUENCE OF SPECTRAL PHASE VARIATIONS AND DISTORTIONS ON THE ULTRASHORT

PULSE PROFILE
AVETISYAN ANNA, KUTUZYAN AGHAVNI, AVETISYAN VARDAN

2023 1

https://gsu.am/hy/conferences/

Article

Formation of a new type of self-similar pulses in optical fibers with anomalous dispersion
Aghavni Kutuzyan, Vardan Avetisyan, Meri Kalashyan, Minas Sukiasyan

Optics InfoBase Conference Papers (Frontiers in Optics) 2022 185766

Patent

Լազերային գերկարճ իմպուլսների սպեկտրալ փուլի որոշման եղանակ
Աղավնի Կուտուզյան, Մինաս Սուքիասյան, Վարդան Ավետիսյան, Մերի Քալաշյան

2021

Conference

Determination of the Spectral Phase of Femtosecond Pulses based on Frequency-to-Time mapping
Minas Sukiasyan, Aghavni Kutuzyan

2020 2

https://www.frontiersinoptics.com/home/schedule/?day=Wednesday#Wednesday

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Article

Measurement of the ultrashort pulse spectral phase based on dispersive Fourier transformation
MINAS SUKIASYAN, NAREK KARAPETYAN, HRACH TONEYAN, AGHAVNI KUTUZYAN, LEVON MOURADIAN

Applied Optics 2019 2817-2822

Article

Similaritonic Method on Ultrashort Pulse Duration Measurement by Oscilloscope
M.M. Sukiasyan, N. P. Karapetyan, H.A. Toneyan, A.A. Kutuzyan, L.Kh. Mouradian

Armenian Journal of Physics 2019 107-112

Article

Soliton-effect Spectral Self-compression for Different Initial Pulses
Armine Grigoryan, Aghavni Kutuzyan, Garegin Yesayan

Progress in Physics 2018 35-37

Article

ЧИСЛЕННОЕ ИССЛЕДОВАНИЕ ПРОЦЕССА ФОРМИРОВАНИЯ СПЕКТРОНА: ФАЗОВЫЕ ОСОБЕННОСТИ
Н. КАРАПЕТЯН, Г. ТОНЕЯН, А. КУТУЗЯН, М. СУКИАСЯН, В. АВЕТИСЯН, Д. ГУЛКАНЯН, К. АПРЕСЯН,

Л. МУРАДЯН

Proceedings of NAS RA Physics 2018 173-180

Conference

Spectron and Dispersive Fourier Transformation: Phase Aspect
N. Karapetyan, M. Sukiasyan, H. Toneyan, A. Kutuzyan, L. Kh. Mouradian

2018 2

https://www.osapublishing.org/aop/abstract.cfm?uri=LS-2018-JTu3A.45

Conference

Spectral phase measurement based on spectron shaping
N. Karapetyan, M. Sukiasyan, H. Toneyan, A. Kutuzyan, L. Mouradian

2018 18

http://ionsyerevan.osahost.org/

Article

Spectral Characteristics of Nonlinear-Dispersive Similariton Generated in Single-Mode Fiber without Gain
H. Toneyan, K. Manoukyan, M. Sukiasyan, A. Kutuzyan, L. Mouradian

Armenian Journal of Physics 2017 192-198

Conference

Numerical analysis of spectron phase peculiarities
Narek Karapetyan et al, Levon Mouradian, Hrach Toneyanan, Aghavni Kutuzyan

2017 1 p

http://www.inflpr.ro/en/node/1387

Conference

Experimental Demonstration of Self-Spectral Compression of Supercontinuum's Fraction by 4.1x
V. Avetisyan, M. Sukiasyan, H. Toneyan, A. Kutuzyan, A. Yeremyan, L. Mouradian

2017 2-3

http://ipr.sci.am/lp/

Conference

Numerical Study of Femtosecond Signal Spectral Self Compression
Minas Sukiasyan, Aghavni Kutuzyan, Levon Kh. Mouradian, Hrach Toneyan,, Vardan Avetisyan

2017 p.11

http://candle.am/uba17/

Conference

Phase Regularities of Spectron: Numerical Analysis
Narek Karapetyan, Aghavni Kutuzyan, Levon Kh. Mouradian, Hrach Toneyan

2017 pp.10-11

http://candle.am/uba17/

Conference

Similariton Based Technique for Determination of Femtosecond Pulse Duration
Karapet Manukyan,, Aghavni Kutuzyan, Levon Kh. Mouradian

2017 p.10

http://candle.am/uba17/

Conference

NUMERICAL STUDY OF FEMTOSECOND SIGNAL SPECTRAL SELF-COMPRESSION
Minas Sukiasyan, Hrach Toneyan, Vardan Avetisyan, Aghavni Kutuzyan, Levon Kh. Mouradian

2017 11-11

http://candle.am/uba17/

Conference

SIMILARITON BASED TECHNIQUE FOR DETERMINATION OF FEMTOSECOND PULSE DURATION
Karapet Manukyan, Hrach Toneyan, Minas Sukiasyan, Aghavni Kutuzyan, Levon Kh. Mouradian

2017 10-10

http://candle.am/uba17/

Article

Spectral domain soliton-effect self-compression
A.P. Grigoryan, G.L.Yesayan, A.A.Kutuzyan, L.Kh.Mouradian

Journal of Physics Conference Series 2016 12015

http://iopscience.iop.org/journal/1742-6596

Conference

Solitonic Self-Spectral Compression of Noisy Supercontinuum Radiation
Hrach Toneyan, Minas Sukiasyan, Levon Mouradian, Aghavni Kutuzyan, Vardan Avetisyan,

Arsham Eremyan

2016 JW4A44

http://www.osa.org/en-us/meetings/global_calendar/events/2015/frontiers_in_opti...

Conference

Spectron’s phase peculiarities: numerical study
N.Karapetyan, H.Toneyan, A.Kutuzyan, L.Mouradian

2016 40

http://www.rau.am/optics2016/geninfo.php

Conference

Solitonic Spectral Self-Compression of Regular and Randomly Modulated Pulses
M.Sukiasyan, H.Toneyan, A.Kutuzyan, V.Tsakanov, L. Mouradian

2016 1

http://ipr.sci.am/fop2016/

Conference

4.1x Solitonic Self-Spectral Compression of Supercontinuum’s Fraction
Minas Sukiasyan, Vardan Avetisyan, Hrach Toneyan, Aghavni Kutuzyan, Arsham Yeremyan,

Levon Kh. Mouradian

2016 72-72

http://www.lasphys.com/workshops/lasphys16/program-poster-session

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Conference

Solitonic Self-Spectral Compression of Supercontinuum Fraction
Vardan Avetisyan, Minas Sukiasyan, Levon Kh. Mouradian, Arsham Yeremyan, Aghavni Kutuzyan,

Hrach Toneyan

2016 57-58

http://www.rau.am/optics2016/

Conference

Solitonic Self-Spectral Compression of Noisy Supercontinuum Radiation
Hrach Toneyan, Minas Sukiasyan, Vardan Avetisyan, Aghavni Kutuzyan, Arsham Yeremyan,

Levon Kh. Mouradian

2016 2 Եջ

https://www.osapublishing.org/conference.cfm?meetingid=56&yr=2016

Conference

Spectral Peculiarities of Nonlinear-Dispersive Similariton

Aghavni Kutuzyan, Levon Mouradian, Karapet Manukyan

2015 49-51