# Резюме: Акимов Михаил Геннадьевич


## Адрес

Федеральное государственное бюджетное учреждение науки Институт биоорганической химии им. академиков М.М. Шемякина и Ю.А. Овчинникова Российской академии наук, Москва, Россия

## Контакты

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## Образование

| | | | |
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| 2005–2008 | Россия, Москва | Институт биоорганической химии им. акад. М.М. Шемякина и Ю.А. Овчинникова РАН | канд. хим. наук |
| 2007–2007 | Россия, Пущино | Школа по конфокальной и электронной микроскопии, организованная фирмой Leica | сертификат о прохождении практики |
| 2000–2005 | Россия, Москва | Московский государственный университет им. М.В. Ломоносова, биологический факультет, кафедра биоорганической химии | диплом с отличием (специалист) |

## Работа в ИБХ

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| 2016–наст.вр. | Старший научный сотрудник |

## Членство в советах и комиссиях ИБХ

Профсоюзный коммитет

## Научные интересы

геронтология, теория эволюции, теоретическая биология, нейрохимия, биология липидов, онкология

## Степени и звания

Кандидат наук (Химические науки, 03.00.04 — Биохимия)

## Гранты и проекты

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| 2023–2024 | Взаимодействие противоположно направленных сигналов эндогенных биоактивных липидов лизофосфатидилинозита, анандамида и 2-арахидоноилглицерина в процессах регуляции пролиферации и смерти клеток рака молочной железы |

## Публикации


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2. Zhdanov V, Kaplin D, **Akimov M**, Antonov A, Gasanov M, Malchenko V (2025). Ensemble Machine Learning Models for Rice and Wheat Yield Prediction: A Comparative Study Across Districts in India's Kharif and Rabi Seasons. *J INDIAN SOC REMOT* 53 (11), 3901–3915, 10.1007/s12524-025-02186-z
3. Oshchepkov M, Kovalenko L, Kalistratova A, Sherstyanykh G, Gorbacheva E, Antonov A, Khadour N, **Akimov M** (2025). Anti-Proliferative Activity of Ethylenediurea Derivatives with Alkyl and Oxygen-Containing

Groups as Substituents. *Biomedicines* 13 (2), 316, 10.3390/biomedicines13020316
4. **Akimov MG**, Gretskaya NM, Gorbacheva EI, Khadour N, Sherstyanykh GD, Bezuglov VV (2025). Two-Step Cell Death Induction by the New 2-Arachidonoyl Glycerol Analog and Its Modulation by Lysophosphatidylinositol in Human Breast Cancer Cells. *Int J Mol Sci* 26 (2), 820, 10.3390/ijms26020820
5. **Akimov MG**, Gretskaya NM, Gorbacheva EI, Khadour N, Chernavskaya VS, Sherstyanykh GD, Kovaleko TF, Fomina-Ageeva EV, Bezuglov VV (2024). The Interaction of the Endocannabinoid Anandamide and Paracannabinoid Lysophosphatidylinositol during Cell Death Induction in Human Breast Cancer Cells. *Int J Mol Sci* 25 (4), 2271, 10.3390/ijms25042271
6. **Akimov MG**, Dudina PV, Vyunova TV, Kalueff AV, Gretskaya NM, Bezuglov VV (2024). Role of key endocannabinoids and their receptors in breast cancer. *Reviews on Clinical Pharmacology and Drug Therapy* 22 (1), 41–51, 10.17816/RCF623144
7. Gretskaya N, **Akimov M**, Andreev D, Zalygin A, Belitskaya E, Zinchenko G, Fomina-Ageeva E, Mikhalyov I, Vodovozova E, Bezuglov V (2023). Multicomponent Lipid Nanoparticles for RNA Transfection. *Pharmaceutics* 15 (4), , 10.3390/pharmaceutics15041289
8. **Akimov MG**, Gretskaya NM, Dudina PV, Sherstyanykh GD, Zinchenko GN, Serova OV, Degtyaryova KO, Deyev IE, Bezuglov VV (2023). The Mechanisms of GPR55 Receptor Functional Selectivity during Apoptosis and Proliferation Regulation in Cancer Cells. *Int J Mol Sci* 24 (6), , 10.3390/ijms24065524
9. Kovshova T, Mantrov S, Boiko S, Malinovskaya J, Merkulova M, Osipova N, Moiseeva N, **Akimov M**, Dudina P, Senchikhin I, Ermolenko Y, Gelperina S (2023). Co-delivery of Paclitaxel and Etoposide Prodrug by Human Serum Albumin and PLGA nanoparticles: synergistic cytotoxicity in brain tumor cells. *J Microencapsul* 40 (4), 1–48, 10.1080/02652048.2023.2188943
10. Kochetkov KA, Gorunova ON, Bystrova NA, Dudina PV, **Akimov MG** (2022). Synthesis and physiological activity of new imidazolidin-2-one bis-heterocyclic derivatives. *Russ Chem Bull* 71 (11), 2395–2403, 10.1007/s11172-022-3667-z
11. Oshchepkov M, Kovalenko L, Kalistratova A, Ivanova M, Sherstyanykh G, Dudina P, Antonov A, Cherkasova A, **Akimov M** (2022). Anti-Proliferative and Cytoprotective Activity of Aryl Carbamate and Aryl Urea Derivatives with Alkyl Groups and Chlorine as Substituents. *Molecules* 27 (11), , 10.3390/molecules27113616
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13. **Akimov MG**, Fomina-Ageeva EV, Dudina PV, Andreeva LA, Myasoyedov NF, Bezuglov VV (2021). ACTH(6–9)PGP Peptide Protects SH-SY5Y Cells from H2O2, tert-Butyl Hydroperoxide, and Cyanide Cytotoxicity via Stimulation of Proliferation and Induction of Prosurvival-Related Genes. *Molecules* 26 (7), , 10.3390/molecules26071878
14. **Akimov MG**, Gamisonia AM, Dudina PV, Gretskaya NM, Gaydaryova AA, Kuznetsov AS, Zinchenko GN, Bezuglov VV (2021). GPR55 Receptor Activation by the N-Acyl Dopamine Family Lipids Induces Apoptosis in Cancer Cells via the Nitric Oxide Synthase (nNOS) Over-Stimulation. *Int J Mol Sci* 22 (2), 1–24, 10.3390/ijms22020622
15. Bandyopadhayaya S, **Akimov MG**, Verma R, Sharma A, Sharma D, Kundu GC, Gretskaya NM, Bezuglov VV, Mandal CC (2021). N-arachidonoyl dopamine inhibits epithelial-mesenchymal transition of breast cancer cells through ERK signaling and decreasing the cellular cholesterol. *J Biochem Mol Toxicol* 35 (4), e22693, 10.1002/jbt.22693
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50. **Akimov MG**, Gretskaia NM, Shevchenko KV, Shevchenko VP, Miasoedov NF, Bobrov MI, Bezuglov VV (2008). New aspects of biosynthesis and metabolism of N-acyldopamines in rat tissues. *Bioorg Khim* 33 (6), 648–652.
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