

Сведения об официальном оппоненте

Зверева Мария Эмильевна, доктор химических наук, специальность 02.00.10 — биоорганическая химия, 03.01.03 — молекулярная биология (химические науки), доцент, заместитель декана по научной работе, Федеральное государственное бюджетное образовательное учреждение высшего образования «Московский государственный университет имени М. В. Ломоносова», Химический факультет.

Список основных публикаций по теме диссертации за последние 5 лет:

1. Mariasina S. S., Efimov S. V., Petrova O. A., Rodina E. V., Malyavko A. N., Zvereva M. I., Klochkov V. V., Dontsova O. A., Polshakov V. I. Chemical shift assignments and the secondary structure of the Est3 telomerase subunit in the yeast *Hansenula polymorpha* // Biomolecular NMR Assignments. – 2018. – V. 12. – 1. – P. 57–62.
2. Rubtsova M., Naraykina Y., Vasilkova D., Meerson M., Zvereva M., Prassolov V., Lazarev V., Manuvera V., Kovalchuk S., Anikanov N., Butenko I., Pobeguts O., Govorun V., Dontsova O. Protein encoded in human telomerase RNA is involved in cell protective pathways // Nucleic Acids Research. – 2018. – V. 46. – 17. – P. 8966–8977.
3. Petrova O. A., Mantsyzov A. B., Rodina E. V., Efimov S. V., Hackenberg C., Hakanpää J., Klochkov V. V., Lebedev A. A., Chugunova A. A., Malyavko A. N., Zatsepin T. S., Mishin A. V., Zvereva M. I., Lamzin V. S., Dontsova O. A., Polshakov V. I. Structure and function of the N-terminal domain of the yeast telomerase reverse transcriptase // Nucleic Acids Research. – 2018. – V. 46. – 3. – P. 1525–1540.
4. Beletsky A. V., Malyavko A. N., Sukhanova M. V., Mardanova E. S., Zvereva M. I., Petrova O. A., Parfenova Y. Y., Rubtsova M. P., Mardanov A. V., Lavrik O. I., Dontsova O. A., Ravin N. V. The genome-wide transcription response to telomerase deficiency in the thermotolerant yeast *Hansenula polymorpha* DL-1 // BMC Genomics. – 2017. – V. 18. – 1.
5. Polshakov V. I., Petrova O. A., Parfenova Y. Y., Efimov S. V., Klochkov V. V., Zvereva M. I., Dontsova O. A. NMR assignments of the N-terminal domain of *Ogataea polymorpha* telomerase reverse transcriptase // Biomolecular NMR Assignments. – 2016. – Vol. 10. – 1. – P. 183–187.
6. Azhibek D., Skvortsov D., Andreeva A., Zatsepin T., Arutyunyan A., Zvereva M., Dontsova O. TERRA mimicking ssRNAs prevail over the DNA substrate for telomerase in vitro due to interactions with the alternative binding site // Journal of Molecular Recognition. – 2016. – V. 29. – № 6. – P. 242–247.

7. Azhibek D., Zvereva M., Zatsepin T., Rubtsova M., Dontsova O. Chimeric bifunctional oligonucleotides as a novel tool to invade telomerase assembly // *Nucleic Acids Research*. – 2014. – V. 42. – № 15. – P. 9531–9542.
8. Shubernetskaya O. S., Skvortsov D. A., Evfratov S. A., Rubtsova M. P., Belova E. V., Strelkova O. S., Cherepaninets V. D., Zhironkina O. A., Olovnikov A. M., Zvereva M. E., Kireev I. I., Dontsova, O. A. High expression levels and nuclear localization of novel danio rerio ncRNA transcribed from a genomic region containing repetitive elements // *Molecular Biology*. – 2014. – V. 48. – № 4. – P. 563–572.
9. Ilyinsky N., Shchyolkina A., Borisova O., Mamaeva O., Zvereva M., Azhibek D., Livshits M., Mitkevich V., Balzarini J., Sinkevich Y., Luzikov Y., Dezhenkova L., Kolotova E., Shtil A., Shchekotikhin A., Kaluzhny D. Novel multi-targeting anthra[2,3-b]thiophene-5,10-diones with guanidine-containing side chains: interaction with telomeric G-quadruplex, inhibition of telomerase and topoisomerase I and cytotoxic properties // *European Journal of Medicinal Chemistry*. – 2014. – V. 85. – P. 605–614.
10. Zhdanova N. S., Draskovic I., Minina J. M., Karamysheva T. V., Novo C. L., Liu W. Y., Porreca R. M., Gibaud A., Zvereva M. E., Skvortsov D. A., Rubtsov N. B., Londono-Vallejo A. Recombinogenic telomeres in diploid *Sorex granarius* (soricidae, eulipotyphla) fibroblast cells // *Molecular and Cellular Biology*. – 2014. – V. 34. – № 15. – P. 2786–2799.
11. Malyavko A. N., Parfenova Y. Y., Zvereva M. I., Dontsova O. A. Telomere length regulation in budding yeasts // *FEBS Letters*. – 2014. – V. 588. – № 15. – P. 2530–2536.
12. Vasilkova D., Azhibek D., Zatsepin T., Naraikina Y., Prassolov V., Prokofjeva M., Zvereva M., Rubtsova M. Dynamics of human telomerase RNA structure revealed by antisense oligonucleotide technique // *Biochimie*. – 2013. – V. 95. – № 12. – P. 2423–2428.
13. Ravin N., Eldarov M., Kadnikov V., Beletsky A., Schneider J., Mardanova E., Smekalova E., Zvereva M., Dontsova O., Mardanov A., Skryabin K. Genome sequence and analysis of methylotrophic yeast *Hansenula polymorpha* DL1 // *BMC Genomics*. – 2013. – V. 14. – P. 837.
14. Smekalova E., Malyavko A., Zvereva M., Mardanov A., Ravin N., Skryabin K., Westhof E., Dontsova, O. Specific features of telomerase RNA from *Hansenula polymorpha* // *RNA*. – 2013. – V. 19. – № 11. – P. 1563–1574.