

## Список публикаций М.П.Кирпичникова за 5 лет

**Всего 123 публикации (Web of Science Core Collection),  
в том числе 70 статей в научных журналах (по PubMed),  
из них 32 – в иностранных журналах:**

- 1: Myshkin MY, Männikkö R, Krumkacheva OA, Kulbatskii DS, Chugunov AO, Berkut AA, Paramonov AS, Shulepko MA, Fedin MV, Hanna MG, Kullmann DM, Bagryanskaya EG, Arseniev AS, Kirpichnikov MP, Lyukmanova EN, Vassilevski AA, Shenkarev ZO. Cell-Free Expression of Sodium Channel Domains for Pharmacology Studies. Noncanonical Spider Toxin Binding Site in the Second Voltage-Sensing Domain of Human Na(v)1.4 Channel. *Front Pharmacol.* 2019 Sep 4;10:953. doi: 10.3389/fphar.2019.00953. eCollection 2019. PubMed PMID: 31555136; PubMed Central PMCID: PMC6737007.
- 2: Bonartsev AP, Bonartseva GA, Reshetov IV, Kirpichnikov MP, Shaitan KV. Application of Polyhydroxyalkanoates in Medicine and the Biological Activity of Natural Poly(3-Hydroxybutyrate). *Acta Naturae.* 2019 Apr-Jun;11(2):4-16. doi: 10.32607/20758251-2019-11-2-4-16. PubMed PMID: 31413875; PubMed Central PMCID: PMC6643351.
- 3: Ptushenko VV, Solovchenko AE, Bychkov AY, Chivkunova OB, Golovin AV, Gorelova OA, Ismagulova TT, Kulik LV, Lobakova ES, Lukyanov AA, Samoilova RI, Scherbakov PN, Selyakh IO, Semenova LR, Vasilieva SG, Baulina OI, Skulachev MV, Kirpichnikov MP. Cationic penetrating antioxidants switch off Mn cluster of photosystem II in situ. *Photosynth Res.* 2019 Nov;142(2):229-240. doi: 10.1007/s11120-019-00657-2. Epub 2019 Jul 13. PubMed PMID: 31302832.
- 4: Myshkin MY, Dubinnyi MA, Kulbatskii DS, Lyukmanova EN, Kirpichnikov MP, Shenkarev ZO. CombLabel: rational design of optimized sequence-specific combinatorial labeling schemes. Application to backbone assignment of membrane proteins with low stability. *J Biomol NMR.* 2019 Nov;73(10-11):531-544. doi: 10.1007/s10858-019-00259-z. Epub 2019 Jul 8. PubMed PMID: 31281943.
- 5: Yagolovich AV, Artykov AA, Dolgikh DA, Kirpichnikov MP, Gasparian ME. A New Efficient Method for Production of Recombinant Antitumor Cytokine TRAIL and Its Receptor-Selective Variant DR5-B. *Biochemistry (Mosc).* 2019 Jun;84(6):627-636. doi: 10.1134/S0006297919060051. PubMed PMID: 31238862.
- 6: Ostrovsky MA, Kirpichnikov MP. Prospects of Optogenetic Prosthesis of the Degenerative Retina of the Eye. *Biochemistry (Mosc).* 2019 May;84(5):479-490. doi: 10.1134/S0006297919050031. Review. PubMed PMID: 31234763.
- 7: Ilina EN, Solopova EV, Aliev TK, Larina MV, Balabashin DS, Varlamov NE, Dolgikh DA, Sveshnikov PG, Kirpichnikov MP. The Generation of the Human mAb RabD4 Specific to the Rabies Virus Glycoprotein and Characterization Thereof. *Dokl Biochem Biophys.* 2019 Mar;485(1):126-128. doi: 10.1134/S1607672919020133. Epub 2019 Jun 14. PubMed PMID: 31201631.
- 8: Gapizov SS, Petrovskaya LE, Shingarova LN, Kryukova EA, Boldyreva EF, Lukashev EP, Yakimov SA, Svirshchevskaya EV, Dolgikh DA, Kirpichnikov MP. Fusion with an albumin-binding domain improves pharmacokinetics of an  $\alpha\beta 3$ -integrin binding fibronectin scaffold protein. *Biotechnol Appl Biochem.* 2019 Jul;66(4):617-625. doi: 10.1002/bab.1762. Epub 2019 Jul 8. PubMed PMID: 31140614.
- 9: Shenkarev ZO, Shulepko MA, Peigneur S, Myshkin MY, Berkut AA, Vassilevski AA, Tytgat J, Lyukmanova EN, Kirpichnikov MP. Recombinant Production and Structure-Function Study of the Tsl Toxin from the Brazilian Scorpion *Tityus serrulatus*. *Dokl Biochem Biophys.* 2019 May;484(1):9-12. doi: 10.1134/S1607672919010034. Epub 2019 Apr 22. PubMed PMID: 31012002.
- 10: Nekrasov AN, Alekseeva LG, Pogosyan RA, Dolgikh DA, Kirpichnikov MP, de Brevern AG, Anashkina AA. A minimum set of stable blocks for rational design of polypeptide chains. *Biochimie.* 2019 May;160:88-92. doi: 10.1016/j.biochi.2019.02.006. Epub 2019 Feb 19. PubMed PMID: 30790618.
- 11: Siletsky SA, Mamedov MD, Lukashev EP, Balashov SP, Dolgikh DA, Rubin AB, Kirpichnikov MP, Petrovskaya LE. Elimination of proton donor strongly affects directionality and efficiency of

- proton transport in ESR, a light-driven proton pump from *Exiguobacterium sibiricum*. *Biochim Biophys Acta Bioenerg.* 2019 Jan;1860(1):1-11. doi: 10.1016/j.bbabi.2018.09.365. Epub 2018 Sep 18. PubMed PMID: 30497582.
- 12: Chang HW, Valieva ME, Safina A, Chereji RV, Wang J, Kulaeva OI, Morozov AV, Kirpichnikov MP, Feofanov AV, Gurova KV, Studitsky VM. Mechanism of FACT removal from transcribed genes by anticancer drugs curaxins. *Sci Adv.* 2018 Nov 7;4(11):eaav2131. doi: 10.1126/sciadv.aav2131. eCollection 2018 Nov. PubMed PMID: 30417101; PubMed Central PMCID: PMC6221510.
- 13: Bychkov ML, Vasilyeva NA, Shulepko MA, Balaban PM, Kirpichnikov MP, Lyukmanova EN. Lynx1 Prevents Long-Term Potentiation Blockade and Reduction of Neuromodulator Expression Caused by A $\beta$ 1-42 and JNK Activation. *Acta Naturae.* 2018 Jul-Sep;10(3):57-61. PubMed PMID: 30397527; PubMed Central PMCID: PMC6209405.
- 14: Shingarova LN, Petrovskaya LE, Zlobinov AV, Gapizov SS, Kryukova EA, Birikh KR, Boldyreva EF, Yakimov SA, Dolgikh DA, Kirpichnikov MP. Construction of Artificial TNF-Binding Proteins Based on the 10th Human Fibronectin Type III Domain Using Bacterial Display. *Biochemistry (Mosc).* 2018 Jun;83(6):708-716. doi: 10.1134/S0006297918060081. PubMed PMID: 30195327.
- 15: Aliev TK, Dement'yeva IG, Toporova VA, Argentova VV, Pozdnyakova LP, Bokov MN, Votchitseva YA, Dolgikh DA, Varfolomeyev SD, Sveshnikov PG, Kirpichnikov MP. The Development and Study of Recombinant Immunoglobulin A to Hemagglutinins of the Influenza Virus. *Acta Naturae.* 2018 Apr-Jun;10(2):30-36. PubMed PMID: 30116613; PubMed Central PMCID: PMC6087826.
- 16: Perfiliev YD, Tambiev AK, Konnychev MA, Skalny AV, Lobakova ES, Kirpichnikov MP. Mössbauer spectroscopic study of transformations of iron species by the cyanobacterium *Arthrospira platensis* (formerly *Spirulina platensis*). *J Trace Elem Med Biol.* 2018 Jul;48:105-110. doi: 10.1016/j.jtemb.2018.02.030. Epub 2018 Mar 2. PubMed PMID: 29773168.
- 17: Shenkarev ZO, Karlova MG, Kulbatskii DS, Kirpichnikov MP, Lyukmanova EN, Sokolova OS. Recombinant Production, Reconstruction in Lipid-Protein Nanodiscs, and Electron Microscopy of Full-Length  $\alpha$ -Subunit of Human Potassium Channel Kv7.1. *Biochemistry (Mosc).* 2018 May;83(5):562-573. doi: 10.1134/S0006297918050097. PubMed PMID: 29738690.
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- 19: Männikkö R, Shenkarev ZO, Thor MG, Berkut AA, Myshkin MY, Paramonov AS, Kulbatskii DS, Kuzmin DA, Sampedro Castañeda M, King L, Wilson ER, Lyukmanova EN, Kirpichnikov MP, Schorge S, Bosmans F, Hanna MG, Kullmann DM, Vassilevski AA. Spider toxin inhibits gating pore currents underlying periodic paralysis. *Proc Natl Acad Sci U S A.* 2018 Apr 24;115(17):4495-4500. doi: 10.1073/pnas.1720185115. Epub 2018 Apr 10. PubMed PMID: 29636418; PubMed Central PMCID: PMC5924911.
- 20: Aliev TK, Dement'eva IG, Toporova VA, Argentova VV, Pozdnyakova LP, Bokov MN, Dolgikh DA, Sveshnikov PG, Kirpichnikov MP. The Development and Immunochemical Properties of the Dimer of Immunoglobulin A Specific to the Influenza Virus A Hemagglutinin. *Dokl Biochem Biophys.* 2018 Jan;478(1):34-36. doi: 10.1134/S160767291801009X. Epub 2018 Mar 14. PubMed PMID: 29536306.
- 21: Ilina EN, Larina MV, Aliev TK, Dolgikh DA, Kirpichnikov MP. Recombinant Monoclonal Antibodies for Rabies Post-exposure Prophylaxis. *Biochemistry (Mosc).* 2018 Jan;83(1):1-12. doi: 10.1134/S0006297918010017. Review. PubMed PMID: 29534663.
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- 25: Goncharenko AV, Kotlyarova MS, Moisenovich AM, Arkhipova AY, Kulikov DA, Konkov AS, Kulikov AV, Mashkov AE, Agapov II, Moisenovich MM, Kirpichnikov MP. Osteogenic differentiation of mouse bone marrow stromal cells on fibroin microcarriers. *Dokl Biochem Biophys*. 2017 Nov;477(1):345-348. doi: 10.1134/S1607672917060011. Epub 2018 Jan 3. PubMed PMID: 29297117.
- 26: Argentova VV, Aliev TK, Zarubaev VV, Klotchenko SA, Shtro AA, Sergeeva MV, Toporova VA, Dolgikh DA, Sveshnikov PG, Vasin VA, Kirpichnikov MP. [In vitro Antiviral Activity of Recombinant Antibodies of IgG and IgA Isotypes to Hemagglutinin of the Influenza A Virus]. *Mol Biol (Mosk)*. 2017 Nov-Dec;51(6):927-937. doi: 10.7868/S0026898417060052. Russian. PubMed PMID: 29271957.
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- 31: Smitienko OA, Nekrasova OV, Kudriavtsev AV, Yakovleva MA, Shelaev IV, Gostev FE, Dolgikh DA, Kolchugina IB, Nadtochenko VA, Kirpichnikov MP, Feldman TB, Ostrovsky MA. Femtosecond and Picosecond Dynamics of Recombinant Bacteriorhodopsin Primary Reactions Compared to the Native Protein in Trimeric and Monomeric Forms. *Biochemistry (Mosc)*. 2017 Apr;82(4):490-500. doi: 10.1134/S0006297917040113. PubMed PMID: 28371607.
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- 33: Paramonov AS, Lyukmanova EN, Myshkin MY, Shulepko MA, Kulbatskii DS, Petrosian NS, Chugunov AO, Dolgikh DA, Kirpichnikov MP, Arseniev AS, Shenkarev ZO. NMR investigation of the isolated second voltage-sensing domain of human Nav1.4 channel. *Biochim Biophys Acta Biomembr*. 2017 Mar;1859(3):493-506. doi: 10.1016/j.bbmem.2017.01.004. Epub 2017 Jan 6. PubMed PMID: 28065835.
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