

Guidelines for Authors of *Biochemistry (Moscow), Supplement Series A: Membrane and Cell Biology*

Biochemistry (Moscow), Supplement Series A: Membrane and Cell Biology publishes papers, reviews, and short communications covering various, primarily physicochemical and molecular, aspects of the functioning of cells and cellular systems. Studies in the field of cellular and molecular membrane science and biophysics and works considering cellular and molecular aspects of physiology, pharmacology, immunology, and medicine have priority. The journal accepts both experimental and theoretical work in these fields.

Experimental works, which explore the relation between the structure and function of membranes, molecular mechanisms of membrane transport, receptor system and intracellular signaling, and cellular functions and pathology associated with the plasma membrane of cells (receptors, ion channels, exocytosis, endocytosis, phagocytosis, intercellular junctions, etc.) and with membranes of intracellular structures (bioenergy, photosynthesis, nuclear-cytoplasmic ratio, apoptosis, Ca²⁺-signaling, etc.) are welcomed.

Preference is given to theoretical works, in which the physical and chemical properties of membrane systems are considered using models of different levels of detail, the structure and dynamics of molecular systems that function in biological membranes and in cell as a whole are simulated, or mathematical models of signaling and regulatory processes that provide the vital activity of cells and cell systems are proposed.

Types of publications. The main type of publications is research papers presenting the results of original experimental and theoretical works. The manuscript should contain new, previously unpublished data. Authors can use their own data that were already presented in the form of a short communication or abstract of a paper. The preliminary report should be cited.

New, priority data that require rapid publication can be published as a short communication. The necessity of rapid publication must be explained by the corresponding author in a letter addressed to the editor-in-chief. If accepted, such a work may be published within 3–4 months.

Biochemistry (Moscow), Supplement Series A: Membrane and Cell Biology publishes reviews and short reviews reflecting existing concepts and key achievements in the field of membrane science, biophysics, cellular biology, molecular and cellular physiology, immunology, and medicine. Submission of manuscripts that have already elsewhere in any form is not allowed. As well, manuscripts considered for publication in *Biochemistry (Moscow), Supplement Series A: Membrane and Cell Biology* may not be submitted anywhere else.

MANUSCRIPT PREPARATION

Format. The text should be typeset in Times New Roman (12 pt) with 1.5-line spacing; margins should be 3 cm on the left and 2.5 cm at the top, right, and bottom. The length of a research article (including abstract, main text, tables, references, and figure captions) should not exceed 8000 words and 8 figures; reviews may be 12 000 words and 8 figures; short reviews, 4000 words and 3 figures; and short communication, 2000 words and 1 figure. A manuscript should be submitted in digital form. It is necessary to send a single attached file in Microsoft Word (*.doc) not exceeding 5 Mb, containing text, tables, and figures (usually, black-and-white) as set forth below. If the volume of a figure exceeds 1 Mb, it must be submitted as a separate file. If necessary, it is recommended to compress files using Zip or RAR archiving. Color illustrations are accepted only upon agreement with the editorial board, and their publication is paid for by the authors. Manuscript must be accompanied by a brief

accompanying letter, which states that the manuscript (title, authors) is submitted for publication in *Biochemistry (Moscow), Supplement Series A: Membrane and Cell Biology* and that all authors agree.

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Front page: title; list of all authors; affiliations of authors with postal addresses; name of the corresponding author with his postal address, telephone number, fax number, and e-mail; keywords (3–6); number of words in the main text; number of tables; number of figures; signatures of all authors.

Main body of text: title; list of all authors; affiliations of authors with postal addresses; abstract; keywords (3–6); INTRODUCTION; MATERIALS AND METHODS; RESULTS; DISCUSSION (or RESULTS AND DISCUSSION); ACKNOWLEDGMENTS; Tables (each on a separate page); Figure captions (on a separate page); REFERENCES (on a separate page); Figures (numbered, each on a separate page).

The main materials of a theoretical work may be arranged arbitrarily, although, it should generally stick to the sequence described above. Equations should be typed preferably using Microsoft Equation Editor. Use fractional degrees rather than root symbols. Do not use a colon as a sign of division. Equations should be numbered in parentheses near the right margin. Symbols must be defined upon first mention in the text. If there are more than ten symbols, all symbols must be listed on a separate page.

Mathematical models should be presented in such a way that for a wide range of readers, it is clear which system (molecular, cellular, etc.) or process is simulated, what the initial postulates of the model are and the suitability of its use to describe the process or system, as well as the limitations of the model. Methods for solving equations of the model should be described in detail sufficient for replication. Commercial programs and algorithms used therein should be mentioned. Basic details of the derivation of equations and/or their solutions may be presented in the Appendix, at the end of manuscript.

The **abstract** should give a clear idea about the essence of work, subjects and research methods, main results, and conclusions.

Materials and Methods should include information on research methods sufficient for their clear understanding and replication. Methods described previously can be represented in brief form and must be accompanied by appropriate references. It is necessary to specify the qualification and source of main reagents; name (in original transcription) of the manufacturer of reagents or equipment and country are given in parentheses (Serva, Germany). Statistical methods of data processing, graphics programs, etc., should also be specified.

Tables and figures should be numbered using Arabic numerals in the order they appear in the text. Each table should have a title and, if necessary, a brief explanation to the data presented (experimental conditions, number of experiments, etc.).

Figures should be prepared with a resolution of at least 300 dpi and at a scale that allows for their twofold reduction without loss of quality. In complex figures with multiple panels, each panel should be marked with an italic letter (*a*, *b*, *c*, ...). Standard symbols (▲, ▽, □, ■, ◇, ○, ●) should be used in graphs. At the bottom of the figure, the sequential number and surname of the first author should be specified.

Electronic versions of line drawings and halftone photographs should be submitted in JPEG or TIFF format.

List of references. References in the text should be numbered sequentially and should be numerals in square brackets. If a reference is cited in a table or figure caption, it is assigned a sequential number corresponding to the location of the material in the text.

The authors are solely responsible for the accuracy of references. The sources should be either published or accepted for publication. References to abstracts of papers, dissertations, or author's certificates should only apply if they are the only source. Citations of "unpublished data" or "personal communication" are not allowed in the list of references, but they can be cited in the text—for example, (Prutkov K.F., personal communication). It is assumed that authors have received permission to cite in any form.

The list of references should be prepared as follows:

Journal articles:

A. V. Karpushev, T. S. Pavlov, and A. V. Starushenko, "Regulation of epithelial sodium channels (ENaC) by small G-proteins and phosphatidylinositol species," *Biochemistry (Moscow), Suppl. Ser. A: Membr. Cell. Biol.* **26** (4) 265–279 (2009).

H. Takeuchi, Y. Imanaka, H. Hirono, and T. Kurahashi, "Cross-adaptation between olfactory responses induced by two subgroups of odorant molecules," *J. Gen. Physiol.* **122**, 255–264 (2003).

Books:

Yu. A. Vladimirov and G. E. Dobretsov, *Fluorescent Probes in Study of Biological Membranes* (Nauka, Moscow, 1980).

B. Hille, *Ionic Channels of Excitable Membranes*, 2nd ed. (Sinauer Associates, Sunderland, 1992).

Collections of papers:

V. V. Lednev, "Investigation of the structure of actin-containing filaments by X-ray diffraction," in *Molecular and Cellular Biophysics*, Ed. by G. M. Frank (Nauka, Moscow, 1977), pp. 164–172.

M. T. Keating, "Molecular genetics of the long QT syndrome," in *Ion Channels and Genetic Diseases*, Ed. by D. C. Dawson and R. A. Frizzell (Rockefeller University, New York, 1995), pp. 53–60.

Articles in press:

S. O. Dodonova, N. A. Krupenina, and A. A. Bulychev, "Inhibition of H⁺-conductivity of plasma membrane on the background of high activity of H⁺-pump of *Chara* cells under the effect of dithiothreitol," *Biochemistry (Moscow), Suppl. Ser. A: Membr. Cell. Biol.* (in press).

Many international journals publish articles in electronic form before the paper version. Such articles are identified with DOI (digital object identifier), and they should be cited in the original format:

S. Komaki, T. Abe, S. Coutuer, D. Inze, E. Russinova, and T. Hashimoto, "Nuclear-localized subtype of endbinding 1 protein regulates spindle organization in *Arabidopsis*," *J. Cell Sci.* doi 10.1242/jcs.062703

Authors should make necessary corrections to the list of references if an article cited *in press* has been published at the time of receiving the proof.

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