Special Issue

Novel Signaling Mechanisms of G Protein-Coupled Receptors

Message from the Guest Editor

Members of the G protein-coupled receptor (GPCR) superfamily represent the largest group of cell membrane receptors, responsible for transducing a vast array of signals that lead to diverse cellular responses.

GPCRs exhibit multiple conformations and signaling possibilities. Biased ligands can induce selective signaling of the receptors, adding another layer of complexity to GPCR functions. Activated GPCRs are able to initiate waves of signaling events through various mechanisms, including activation of G proteins, binding to □-arrestins and transactivation of other receptors, and even some internalized receptors can induce signaling.

The aim of this Special Issue is to provide an overview of the latest findings in the novel aspects of GPCR functions and signaling. Therefore, this Special Issue of Cells invites contributions of review articles and original research papers that cover the novel, exciting aspects of GPCRs, providing a better understanding of the complexity of their functions.

Guest Editor

Dr. András Balla

Department of Physiology, Faculty of Medicine, Semmelweis University, H-1094 Budapest, Hungary

Deadline for manuscript submissions

closed (25 May 2025)

Cells

an Open Access Journal by MDPI

Impact Factor 5.2
CiteScore 10.5
Indexed in PubMed

mdpi.com/si/209919

Cells
Editorial Office
MDPI, Grosspeteranlage 5
4052 Basel, Switzerland
Tel: +41 61 683 77 34
cells@mdpi.com

mdpi.com/journal/cells

Cells

an Open Access Journal by MDPI

Impact Factor 5.2
CiteScore 10.5
Indexed in PubMed

mdpi.com/journal/cells

About the Journal

Message from the Editorial Board

Cells has become a solid international scientific journal that is now indexed on SCIE and in other databases. We have successfully introduced a special issues format so that these issues serve as mini-forums in specific areas of cell science. *Cells* encourages researchers to suggest new special issues, serve as special issues editors, and volunteer to be reviewers. Our main focus will remain on cell anatomy and physiology, the structure and function of organelles, cell adhesion and motility, and the regulation of intracellular signaling, growth, differentiation, and aging. We are open to both original research papers and reviews.

Editors-in-Chief

Dr. Alexander E. Kalyuzhny
Dental Basic Sciences, University of Minnesota, 308 Harvard St. SE, Minneapolis, MN 55455, USA

Prof. Dr. Cord Brakebusch
Biotech Research & Innovation Centre, The University of Copenhagen, Copenhagen, Denmark

Author Benefits

High Visibility:

indexed within Scopus, SCIE (Web of Science), PubMed, MEDLINE, PMC, CAPlus / SciFinder, and other databases.

Journal Rank:

JCR - Q2 (Cell Biology) / CiteScore - Q1 (General Biochemistry, Genetics and Molecular Biology)

Rapid Publication:

manuscripts are peer-reviewed and a first decision is provided to authors approximately 16 days after submission; acceptance to publication is undertaken in 2.7 days (median values for papers published in this journal in the first half of 2025).