



Advances in Cell Death Pathways

Guest Editor:

Dr. Magdalena Skonieczna

1 Department of Systems Biology and Engineering, Faculty of Automatic Control, Electronics and Computer Science, Silesian University of Technology, 44-100 Gliwice, Poland; 2 Biotechnology Centre, Silesian University of Technology, 44-100 Gliwice, Poland.

Deadline for manuscript submissions:

closed (30 November 2021)

Message from the Guest Editor

Dear Colleagues,

Human health is influenced by many external factors, ranging from cellular dysfunction such as oxidative stress. The intracellular redox potential influences cellular function, and its deregulation is associated with cell death, resulting in the development of various diseases. Reactive oxygen species (ROS) are free-radical or non-radical oxygen species that are characterized by high reactivity. In healthy cells, ROS occur at the physiological level because they are involved in many cellular processes, such as hormone secretion, drug removal, and detoxification or stimulation of the immune system. The overproduction of ROS can lead to oxidative stress, which can result in permanent changes in the cells, leading to the loss of protein function, which in turn can cause disease. Irreversible changes in the cell can severely disrupt entire metabolic pathways, leading to various types of cell death, such as apoptosis, ferroptosis, and necrosis.

Keywords

- cellular death
- oxidative stress
- apoptosis
- necrosis, ferroptosis





an Open Access Journal by MDPI

Editor-in-Chief

Prof. Dr. Giancarlo Cravotto

Department of Drug Science and
Technology, University of Turin,
Via P. Giuria 9, 10125 Turin, Italy

Message from the Editor-in-Chief

You are invited to contribute either a research article or a comprehensive review for consideration and publication in *Processes* (ISSN 2227-9717). *Processes* is published in open access format – research articles, reviews, and other content are released on the internet immediately after acceptance. The scientific community and the general public have unlimited, free access to the content. As an open access journal, *Processes* is supported by the authors and their institutes through the payment of article processing charges (APCs) for accepted papers. We would be pleased to welcome you as one of our authors.

Author Benefits

Open Access: free for readers, with article processing charges (APC) paid by authors or their institutions.

High Visibility: indexed within Scopus, SCIE (Web of Science), Ei Compendex, Inspec, AGRIS, and other databases.

Journal Rank: JCR - Q2 (*Engineering, Chemical*) / CiteScore - Q2 (*Chemical Engineering (miscellaneous)*)

Contact Us

Processes Editorial Office
MDPI, Grosspeteranlage 5
4052 Basel, Switzerland

Tel: +41 61 683 77 34
www.mdpi.com

mdpi.com/journal/processes
processes@mdpi.com
[X@Processes_MDPI](https://twitter.com/Processes_MDPI)