

Special Issue

New Advances in Myocardial Regeneration: Molecular Mechanisms and Promising Approaches

Message from the Guest Editor

Myocardial infarction (MI) and consequent heart failure remain the leading cause of death worldwide and a major burden on healthcare systems. This Special Issue "New Advances in Myocardial Regeneration" aims to focus on the latest basic and translational research aimed at finding a cure for heart failure due to cardiomyocyte loss and/or dysfunction. This Special Issue aims to highlight key findings and promising approaches to cardiac remuscularisation, but may also discuss remaining challenges or critical issues regarding internal regenerative processes (resident factors or cells; the direct reprogramming of resident cells) or external approaches (the transplantation of cells; the application of substances). Both original studies and reviews will be published. These could include topics such as cardiac organoids, modified RNA, single cell omics, 3D bioprinting, exosome delivery, and machine learning approaches. Any type of research dedicated to finding new effective approaches to myocardial regeneration will be of interest.

Guest Editor

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Deadline for manuscript submissions

closed (20 March 2025)



International Journal of Molecular Sciences

an Open Access Journal
by MDPI

Impact Factor 4.9
CiteScore 9.0
Indexed in PubMed



mdpi.com/si/172735

*International Journal of
Molecular Sciences*
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Message from the Editor-in-Chief

The International Journal of Molecular Sciences (*IJMS*, ISSN 1422-0067) is an open access journal, which was established in 2000. The journal aims to provide a forum for scholarly research on a range of topics, including biochemistry, molecular and cell biology, molecular biophysics, molecular medicine, and all aspects of molecular research in chemistry. *IJMS* publishes both original research and review articles, and regularly publishes special issues to highlight advances at the cutting edge of research. We invite you to read recent articles published in *IJMS* and consider publishing your next paper with us.

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