

# Special Issue

## New Advances of Cosmology and Astrophysics

### Message from the Guest Editor

In recent years, the development of powerful telescopes, along with advanced computer facilities and sophisticated programs, have revealed that the structure of galaxies does not agree with simple static Newtonian mechanics. The assumption of the existence of some kind of dark matter is able to account for observed rotation curves, but so far, there are no viable candidates for this matter, and there is some evidence that estimates of the Hubble constant may not be consistent. There has been a number of proposed alternative theories; the situation is rapidly developing, and it will be important at this stage to express these new ideas and results in the Special Issue of *Symmetry* that is being planned.

---

### Guest Editor

Prof. Dr. Lawrence Horwitz

1. Department of Physics and Astronomy, Tel Aviv University, Tel Aviv 69978, Israel
2. Department of Physics, Bar Ilan University, Ramat Gan 52900, Israel
3. Department of Physics, Ariel University, Ariel 40700, Israel

---

### Deadline for manuscript submissions

closed (19 November 2021)



# Symmetry

---

an Open Access Journal  
by MDPI

---

Impact Factor 2.2  
CiteScore 5.2



[mdpi.com/si/43849](https://mdpi.com/si/43849)

*Symmetry*  
Editorial Office  
MDPI, Grosspeteranlage 5  
4052 Basel, Switzerland  
Tel: +41 61 683 77 34  
[symmetry@mdpi.com](mailto:symmetry@mdpi.com)

[mdpi.com/journal/  
symmetry](https://mdpi.com/journal/symmetry)





# Symmetry

---

an Open Access Journal  
by MDPI

---

Impact Factor 2.2  
CiteScore 5.2



[mdpi.com/journal/  
symmetry](https://mdpi.com/journal/symmetry)



## About the Journal

### Message from the Editor-in-Chief

Symmetry is ultimately the most important concept in natural sciences. It is not surprising then that very basic and fundamental research achievements are related to symmetry. For instance, the Nobel Prize in Physics 1979 (Glashow, Salam, Weinberg) was received for a unified symmetry description of electromagnetic and weak interactions, while the Nobel Prize in Physics 2008 (Nambu, Kobayashi, Maskawa) was received for the discovery of the mechanism of spontaneous breaking of symmetry, including CP symmetry. Our journal is named *Symmetry* and it manifests its fundamental role in nature.

---

### Editor-in-Chief

Prof. Dr. Sergei Odintsov  
ICREA, 08010 Barcelona and Institute of Space Sciences (IEEC-CSIC),  
C. Can Magrans s/n, 08193 Barcelona, Spain

---

### Author Benefits

#### Open Access:

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

#### High Visibility:

indexed within SCIE (Web of Science), Scopus, CAPlus / SciFinder, Inspec, Astrophysics Data System, and other databases.

#### Journal Rank:

JCR - Q2 (Multidisciplinary Sciences) / CiteScore - Q1  
(General Mathematics)