



*universe*



an Open Access Journal by MDPI

## Bounce Cosmology

Guest Editors:

**Prof. Dr. Yi-Fu Cai**

Department of Astronomy,  
School of Physical Sciences,  
University of Science and  
Technology of China, 96 Jinzhai  
Road, Hefei 230026, China

**Dr. Chunshan Lin**

Faculty of Physics, Astronomy  
and Applied Computer Science,  
Jagiellonian University, 30-348  
Krakow, Poland

**Prof. Dr. Antonino Marciano**

Center for Field Theory and  
Particle Physics and Department  
of Physics, Fudan University,  
Shanghai 200433, China

Deadline for manuscript  
submissions:

**closed (28 February 2021)**

### Message from the Guest Editors

Dear Colleagues,

Research on cosmology has been greatly developed over the past few decades, from both observational and theoretical points of view. Particularly, with the help of a series of cosmic microwave background observations, we are fortunate to be able to witness the golden age that the probe of the earliest moments of our Universe has become possible. The paradigm of inflationary cosmology, which was proposed in previous decades, was applied to understand the initial conditions issued in the hot big bang cosmology, and soon became the most prevailing theory describing the early universe. It is interesting to note that, however, that inflationary cosmology is not a unique paradigm describing the early universe. Moreover, general inflation models have difficulty in explaining the existence of the space-time singularity at the very moment that the universe was born. [...]

For more information, please visit [link](#).

Prof. Dr. Yi-Fu Cai  
Dr. Chunshan Lin  
Prof. Dr. Antonino Marciano  
*Guest Editors*



[mdpi.com/si/13972](https://mdpi.com/si/13972)

**Special** Issue



*universe*



an Open Access Journal by MDPI

## Editor-in-Chief

### **Prof. Dr. Lorenzo Iorio**

Ministero dell'Istruzione e del Merito, Viale Unità di Italia 68, 70125 Bari, BA, Italy

## Message from the Editor-in-Chief

The multidisciplinary *Universe* journal is aiming to follow and, hopefully, to lead to the largest extent as possible the ever-self renovating threads which weave mathematical theories with our understanding of the magnificent natural world. On behalf of all the distinguished members of the editorial board, I extend my welcome to this new journal and look forward to hearing from the interested contributors and learning about their valuable research.

## 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), Astrophysics Data System, INSPIRE, CAPlus / SciFinder, Inspec, and other databases.

**Journal Rank:** JCR - Q2 (*Astronomy and Astrophysics*) / CiteScore - Q2 (*General Physics and Astronomy*)

## Contact Us

---

Universe Editorial Office  
MDPI, Grosspeteranlage 5  
4052 Basel, Switzerland

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

mdpi.com/journal/universe  
universe@mdpi.com  
X@Universe\_MDPI