

## Special Issue

# Artificial Intelligence Techniques for Medical Imaging and Computational Biology

### Message from the Guest Editors

This Special Issue aims to provide a forum to publish original research papers covering state-of-the-art and novel algorithms, methodologies, and applications of AI methods for biomedical data analysis and processing, ranging from classic ML to DL. Research areas may include but are not limited to:

- ML and CI techniques for the segmentation, co-registration, classification, or dimensionality reduction of medical images.
- Generative adversarial models for medical image super-resolution, denoising, and synthesis.
- Deep learning for neuroimaging and oncological imaging analysis.
- Application of graph theory to MRI and functional MRI (fMRI) data.
- Computational modeling and analysis of neuroimaging.
- Radiomic analyses for disease phenotyping.
- Radiogenomics for intra- and intertumoral heterogeneity evaluation.
- CI methods for optimizing biomedical data analysis tasks.
- Integration of multiomics data.
- ML and CI techniques for combinatorial problems in bioinformatics and computational biology.
- Deep neural networks for classification tasks in single-cell data analysis.
- New clustering approaches for single-cell data analysis.

---

### Guest Editors

Dr. Carmelo Militello

Dr. Leonardo Rundo

Dr. Andrea Tangherloni

Dr. Fulvio Zaccagna

Dr. Filippo Vella

Dr. Vincenzo Conti



## Applied Sciences

---

an Open Access Journal  
by MDPI

---

Impact Factor 2.5  
CiteScore 5.5



[mdpi.com/si/151572](https://mdpi.com/si/151572)

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

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

[appls.c](https://appls.c)





# Applied Sciences

---

an Open Access Journal  
by MDPI

---

Impact Factor 2.5  
CiteScore 5.5



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



## About the Journal

### Message from the Editor-in-Chief

As the world of science becomes ever more specialized, researchers may lose themselves in the deep forest of the ever increasing number of subfields being created. This open access journal *Applied Sciences* has been started to link these subfields, so researchers can cut through the forest and see the surrounding, or quite distant fields and subfields to help develop his/her own research even further with the aid of this multi-dimensional network.

---

### Editor-in-Chief

Prof. Dr. Giulio Nicola Cerullo  
Dipartimento di Fisica, Politecnico di Milano, Piazza L. da Vinci 32,  
20133 Milano, Italy

---

### 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, Embase, CAPIus / SciFinder, and other databases.

#### Journal Rank:

JCR - Q2 (Engineering, Multidisciplinary) / CiteScore - Q1 (General Engineering )