



Behavior and Effects of Nanoscale Materials and Plastics— Understanding the Mechanisms of Toxicity

Guest Editors:

Dr. Vera Lúcia Maria

Department of Biology & CESAM,
University of Aveiro, 3810-193
Aveiro, Portugal

Dr. Ângela Barreto

Department of Biology & CESAM,
University of Aveiro, 3810-193
Aveiro, Portugal

Deadline for manuscript
submissions:

closed (31 October 2020)

Message from the Guest Editors

This Special Issue of the *Applied Sciences* invites the submission of original research, case studies or up-to-date review papers on environmental risks posed by nanoscale materials and plastics. In particular, it will welcome studies focused on the following topics

- Ecotoxicity assessed at individual (e.g., reproduction, behavior), biochemical (e.g., DNA damage, oxidative stress, neurotransmission) and molecular (e.g., gene and protein expressions) levels;
- Long-term exposures with special attention to multigenerational and/or transgenerational effects;
- Advances in characterization and understanding of the biological interactions of nanoscale materials and plastics, and therefore, biological effects;
- The role of these nanoscale materials and plastics as carriers of other contaminants;
- Abiotic characterization of the nanoscale materials and plastics in the media of exposure (e.g., spiked soil/water) or in different environmental compartments;
- Analytical methods to assess environmental samples (monitoring the fate of nanoscale materials and plastics).

Dr. Vera Lúcia Maria

Dr. Ângela Barreto

Guest Editors





an Open Access Journal by MDPI

Editor-in-Chief

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

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.

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), Inspec, CAPlus / SciFinder, and other databases.

Journal Rank: JCR - Q1 (Engineering, Multidisciplinary) / CiteScore - Q1 (General Engineering)

Contact Us

Applied Sciences Editorial Office
MDPI, Grosspeteranlage 5
4052 Basel, Switzerland

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

mdpi.com/journal/applsci
applsci@mdpi.com
[X@Applsci](#)