Journal of Nanomaterials

Hindawi

Special Issue on

Nanomaterials for the Neural Interfaces: State of the Art and Future Challenges

CALL FOR PAPERS

Recent advances in nanotechnology are pushing the state of the art in neuroscience and neurotechnology, where the main challenge is to improve the electrode–neuron interface.

This special issue provides an overview of the applications of nanomaterials as *peripheral* and central nervous *system* interfaces; it evaluates state-of-the-art methodologies, analyzes their limitations, and draws attention to the possible advances that could speed up the translation of nanomaterial-based neurotechnologies from research to clinical applications.

We encourage authors to submit original, high quality research and perspective papers, as well as review articles.

Potential topics include but are not limited to the following:

- Electroactive nanomaterials for neural interfaces: synthesis, processing, and applications
- Nanofabricated devices for high-resolution neural interfacing: electrode design, fabrication process, topographical patterning, and applications
- Nanomaterials for drug delivery to neural tissues: strategies, technologies, and applications
- Nanomaterial approaches for improved neural electrode biocompatibility and long-lasting functionality
- Current status and future perspectives of carbon-based nanomaterials for neural interfaces
- Toxicology of nanomaterials in nervous tissue

Authors can submit their manuscripts through the Manuscript Tracking System at https://mts.hindawi.com/submit/journals/jnm/nbis/.

Papers are published upon acceptance, regardless of the Special Issue publication date.

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