



Bioprinting and Nano-Biomaterials in Tissue Engineering and Regenerative Medicine

Guest Editor:

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Message from the Guest Editor

Dear Colleagues,

The combination of 3D bioprinting technologies and nano-biomaterials may open a wide range of perspectives towards the generation of highly complex cell-laden constructs in the field of tissue engineering and regenerative medicine. The possibility to overcome critical weaknesses of obtained products, at the same time improving their structural and functional features, will allow the success of existing studies, especially in the perspective of in vitro and in vivo applications. Cell behavior over time may benefit from natural mimicking microenvironment, specific biochemical and biophysical cues, as well as from a specific array of bioactive stimuli able to modulate cell fate. Morphological, topographical, and chemical features of 3D bioprinted structures, through the employment of micro- or nano-structured bioactive materials, may be—directly or indirectly—involved in tissue regeneration processes.

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Guest Editor





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