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## Mitochondrial Functions in Stem Cells

Guest Editor:

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Deadline for manuscript submissions:

**closed (30 September 2021)**

### **Message from the Guest Editor**

Regenerative cell-based therapies, such as infusion of stem cells or progenitor cells, have shown promising results in repairing damaged tissues in several organs. Mitochondria are intracellular organelles responsible for energy production that also regulate generation of reactive oxygen species, proliferation, apoptosis, and calcium homeostasis. Accumulating evidence suggests that mitochondria play critical roles in regulating multiple aspects of stem cell function, including their viability, plasticity, proliferative, and differential potential. However, the exact mechanisms by which these organelles modulate stem cell biology and function remain to be clarified. Understanding these mechanisms will aid the development of novel strategies to preserve mitochondrial structure and function and improve the efficacy and regenerative capacity of stem cells.

We invite investigators to contribute original research articles and review articles that help us to get more insight into the role of mitochondria in stem cell function and the development of strategies to preserve these organelles.



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**Special** Issue



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