biomedicines

IMPACT FACTOR 3.9

Indexed in: PubMed

CITESCORE 5.2

an Open Access Journal by MDPI

# Regulation of Rad51 Nucleoprotein Filament Formation and Genomic Stability

Guest Editor:

**Dr. Eric Coïc**
Inserm, LGRM/iRCM/IBFJ-CEA, UMR Stabilité Génétique Cellules Souches et Radiations, Université de Paris and Université Paris-Saclay, F-92265 Fontenay-Aux-Roses, France

Deadline for manuscript submissions:
**closed (30 September 2023)**

## Message from the Guest Editor

Homologous recombination (HR) is a critical pathway for DNA double-strand break repair, present in all forms of life. In eukaryotes, HR requires the presence of recombinase RAD51 filaments on single-stranded DNA. These filaments scan the genome for double-stranded DNA homologous sequences used as a template for DNA repair synthesis. RAD51 nucleoprotein filament formation, stability and dissociation implicate complex management of ATP uptake and hydrolysis by the recombinase. In humans, several RAD51 nucleofilament regulators have been associated with cancer, suggesting that RAD51 nucleofilament homeostasis is an important guardian of genome stability. The aim of this Special Issue on Biomedicines is to provide an overview of the state-of-the-art practice and promote new insights into the relationship between RAD51 filament regulation and genomic stability. Both original articles and reviews consistent with this research topic will be considered for publication in this Special Issue.

# biomedicines

IMPACT FACTOR 3.9 | Indexed in: PubMed | CITESCORE 5.2

an Open Access Journal by MDPI


## Editor-in-Chief


**Prof. Dr. Felipe Fregni**

1. Neuromodulation Center and Center for Clinical Research Learning, Spaulding Rehabilitation Hospital and Massachusetts General Hospital, Harvard Medical School, Boston, MA 02114, USA
2. Department of Epidemiology, Harvard T.H. Chan School of Public Health, Boston, MA 02115, USA


## Message from the Editor-in-Chief

*Biomedicines* (ISSN 2227-9059) is an open access journal devoted to all aspects of research on human health and disease, the discovery and characterization of new therapeutic targets, therapeutic strategies, and research of naturally driven biomedicines, pharmaceuticals, and biopharmaceutical products. Topics include pathogenesis mechanisms of diseases, translational medical research, biomaterial in biomedical research, natural bioactive molecules, biologics, vaccines, gene therapies, cell-based therapies, targeted specific antibodies, recombinant therapeutic proteins, nanobiotechnology driven products, targeted therapy, bioimaging, biosensors, biomarkers, and biosimilars. The journal is open for publication of studies conducted at the basic science and preclinical research levels. We invite you to consider submitting your work to Biomedicines, be it original research, review articles, or developing Special Issues of current key topics.

## 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), PubMed, PMC, CAPlus / SciFinder, and other databases.
**Journal Rank:** JCR - Q1 (Pharmacology and Pharmacy) / CiteScore - Q2 (*Medicine (miscellaneous)*)

## Contact Us


*Biomedicines* Editorial Office
MDPI, Grosspeteranlage 5
4052 Basel, Switzerland

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

mdpi.com/journal/biomedicines
biomedicines@mdpi.com
𝕏@Biomed_MDPI