

Special Issue on  
**Fluorescence Spectroscopy in Biomolecules and Drug Interaction**

# CALL FOR PAPERS

Fluorescence spectroscopic techniques in the study of the interaction of small molecules of clinical interest with biomacromolecules like proteins, peptides, lipids, DNA, RNA, and so on have been an important and interesting area of research in the field of life science, chemistry, and clinical medicine for the last few years. As the fluorescence spectroscopic techniques, both steady state and time-resolved, are fast, reliable, highly sensitive, and selective in detection and are an indispensable tool for the study of fast kinetic processes this research field is attracting a growing interest from researchers of all over the world. However, there is a great need for the improvements of the new strategies and fluorescent techniques in terms of specificity and sensitivity.

This special issue aims to test the existing knowledge in this area and to create new direction to enhance the specificity, selectivity, and sensitivity of fluorescence spectroscopic techniques with the in-field application to follow the quantitative aspects of biological systems, that is, functional, structural, energetical, and dynamical evolution of biological activities. This issue will be multidisciplinary in nature and a platform for the discussion on the requisite photophysical and chemical properties of fluorescent reporters to dissect biological systems and their dynamics in unprecedented detail and highlight the main challenges in applying fluorescence spectroscopic techniques to biophysical questions.

We encourage the researchers to submit the original unpublished research articles sharing the development and evaluation of a variety of new state-of-the-art fluorescence spectroscopic techniques, both steady state and time-resolved, that aid in the characterization of relevant biophysical and biochemical processes and their conversion to biodiagnostic information. In particular we welcome articles and review articles focusing on the development and modern implementation of time-resolved fluorescence spectroscopy, both intensity decay (lifetime) and anisotropy decay (dynamic polarization) with their application to biomacromolecule-drug interactions.

Potential topics include but are not limited to the following:

- ▶ Steady state and time-resolved fluorescence spectroscopy and their application in the biomacromolecule-drug interaction
- ▶ Tracking of drug molecules, sensing biomolecules
- ▶ Bioimaging via FRET
- ▶ Bioimaging via FRAP
- ▶ Phototherapy-induced binding
- ▶ Bioluminescence and its application
- ▶ Fluorescence spectroscopy as diagnostic tool for detecting diseases

Authors can submit their manuscripts through the Manuscript Tracking System at <https://mts.hindawi.com/submit/journals/ij/s/bir/>.

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

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**Publication Date**

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