



Spectroscopic Probes of Ion-Molecule Interactions in the Gas Phase

Guest Editor:

Dr. Fabian S. Menges

CBIC, Department of Chemistry,
Yale University, 255 Prospect St,
New Haven, CT 06511, USA

Deadline for manuscript
submissions:

closed (31 December 2021)

Message from the Guest Editor

The range of applications of molecular spectroscopy is constantly expanding. Systems under study are ever more closely approximating species in solution while under complete control of temperature and composition. These tools allow for the characterization of ion-molecule interactions in complexes and clusters - especially when paired with mass spectrometry - employing techniques such as micro-solvation and solvent exchange, collision induced dissociation, cryogenic tagging, isotopic labeling and multi-photon excitations from one or multiple light sources. These improvements now allow us to address fundamental questions in fields ranging from fundamental physics to biology.

This special issue is meant to provide an overview of recent advances in optical spectroscopies in the frequency and time-domain, with an emphasis on the intersection of spectroscopy with mass spectrometry-based techniques. These include applications to a broad variety of fields: organic and inorganic reaction intermediates, ion molecule reactions, ionic salt and ion-solvent clusters, ionic liquids and biological molecules including non-covalent interactions with drug targets.





an Open Access Journal by MDPI

Editor-in-Chief

Prof. Dr. Maurizio Battino

Department of
Odontostomatologic and
Specialized Clinical Sciences,
Sez-Biochimica, Faculty of
Medicine, Università Politecnica
delle Marche, Via Ranieri 65,
60100 Ancona, Italy

Message from the Editor-in-Chief

The International Journal of Molecular Sciences (*IJMS*, ISSN 1422-0067) is an open access journal, which was established in 2000. The journal aims to provide a forum for scholarly research on a range of topics, including biochemistry, molecular and cell biology, molecular biophysics, molecular medicine, and all aspects of molecular research in chemistry. *IJMS* publishes both original research and review articles, and regularly publishes special issues to highlight advances at the cutting edge of research. We invite you to read recent articles published in *IJMS* and consider publishing your next paper with us.

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, MEDLINE, Embase, CAPlus / SciFinder, and other databases.

Journal Rank: JCR - Q1 (Biochemistry and Molecular Biology) / CiteScore - Q1 (Inorganic Chemistry)

Contact Us

*International Journal of Molecular
Sciences* Editorial Office
MDPI, Grosspeteranlage 5
4052 Basel, Switzerland

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

mdpi.com/journal/ijms
ijms@mdpi.com
X@IJMS_MDPI