

Department of Chemistry 2021-22

International Webinar

Photonics to Quantum Mechanics: Disappearing Boundaries in Research

Department of chemistry in association with IQAC organized an international webinar on **Photonics to quantum mechanics: Disappearing boundaries in research** on February 12, 2022 in Googlemeet. The webinar aims at introducing the concept of quantum mechanics as well as photochemistry and photophysics and updating the academic communities with the current advancement in this area. Students, faculties from this college as well as other colleges, research scholars actively participated in this webinar.

There were three speakers. First speaker was Dr. Sumesh Krishnan, Florida state university, USA. He explained the significance of the study of photochemistry, the fundamental process by which nature harnesses the sun's energy by the absorption of solar photons to produce food and energy for our planet, vision, and the formation of vitamin D with sunlight. At the end of the talk, he also gave an overview of the Ph. D. application process in various universities in the United States. Second talk was given by Dr. Prabha V., She discussed about the computational/molecular modelling studies using Density Functional theory (DFT) methods which have been widely used to shed light on the mechanistic insights of catalytic reactions in order to increase the efficacy of the reactions and to characterize the short-lived intermediates. The third talk was given by Dr. Adarsh, Govt. College Attingal, about the disappearing boundaries in research. He also motivated the women students to pursue a research career. It was inaugurated by our principal Smt Jaya A. S.



Chemistry Webinar
**"Photonics to Quantum Mechanics :
 Disappearing Boundaries in Research**

February 12, 10.00 am-1.00 pm

Organized by
 Department of Chemistry
 Government College Kariavattom



The seminar discusses on how the interaction of light influence the chemical and physical behaviour of molecules. Density Functional theory (DFT) methods are used to shed light on the mechanistic insights of catalytic reactions and also how interdisciplinary approaches will vanish the boundaries between the scientific research and contribute the possible potential leads for many unanswered questions in science. An overview of Ph. D. application process in various universities in the United States will be discussed at the end. We cordially invite the faculty members, students, research scholars to join this webinar.

HOD
Dr. Sreekala G.

Dr. Bijitha B. (Coordinator)
Dr. Vinayak M. V. (Convener)

Organizing committee members

Smt. Angeo Varghese, Smt. Asha S., Sri. Sudheer B.

Smt. Lekshmy R. K., Smt. Saritha S. R.

PROGRAMME

Introduction : Dr. Bijitha B.

Welcome : Dr. Sreekala G.

Inauguration : Smt. Jaya A. S. (Principal)

Felicitation : Dr. Sabeen H. M. (IQAC Coordinator)

Dr. Jolly Bose (NAAC convener)

Dr. Baiju S. (PTA Secretary)

Vote of Thanks : Dr. Vinayak M. V.

Speakers

Session 1 10.00 -11.00 am


Dr. Sumesh Krishnan
*Florida State University,
 USA*

Impact of light in chemistry

Session 2 11.00 am -12.00 pm


Dr. Prabha V.
*Department of Chemistry,
 Central University of
 Tamilnadu, Thiruvavur*

Role of molecular modelling studies for revealing the mechanistic insights of bio-mimetic complexes

Session 3 12.00 -1.00 pm


Dr. Adarsh N. V.
*Department of Polymer
 Chemistry, Govt. College
 Atingal*

Paradigm shift in research- Disappearing boundaries

