About The Symposium

Agriculture is the sole process to sustain human life. In the world of agriculture, as the plants, and the microbes live in and out of the plants, understanding their inter and intra play is equally important. No surprise that, these two - the plants and microbes are the factors for sustaining our life. Proteins are the major players of biological activities in any organism including the plants and microbes. Modern day agriculture is benefited by the use of many omics platforms thorough which the crop improvement in terms of increased productivity, improving the quality of the produce, managing the biotic and abiotic stresses and new elite varieties to suit the climate change is made possible. Among the omics tools, proteomics had been applied to provide insights into the molecular mechanism on growth, development, plant responses to various environmental stresses and its adaptation mechanisms. With the advent of new proteomics tools, the application of this technology in plant is expected to expand more. Plants are constantly interacting with microorganisms throughout their crop growth cycle from seed and also from the soil they are planted on. These microbes have many roles in modulating the nutrient uptake, defence, growth, fitness and yield of the plants. The proteomics of plant associated microbes provides understanding on the pathways and proteins in microbes for plant growth and yield. With the proteome mining approach, the study on microbial metabolism in agriculture is gradually increasing. The climate resilience with the sustainable yield is dependent on the interplay of plant- microbe interaction. The host genotype dictates the nature of microbes to be associated with and the microbes decides the plant fitness. In light of the above, this symposium is aimed to bring the discussion on crop proteomics, microbial proteomics and the interplay of plant-microbe proteomics towards crop improvement.

About CUTN

The Central University of Tamil Nadu (CUTN) was established in the year 2009 in Thiruvarur, Tamil Nadu by an Act of a Parliament. Spread over 516 acres across the banks of picturesque river Vettaru in a lush green Cauvery delta the university boasts 13 schools with 28 departments offering 64 academic programmes, including 29 research, 22 specialized, 6 integrated, and 2 undergraduate programmes, along with several PG diploma and certificate courses. CUTN is dedicated to fostering innovation, interdisciplinary studies, and a holistic learning experience. This symposium is jointly organised by department of horticulture and department of microbiology under the vibrant School of Life Sciences. Department of Horticulture is unique as it is the only department offering horticulture courses in a central university in the entire landscape of south of Vindhyas and microbiology is the DST-FIST funded department. Both the departments offer M.Sc. & Ph.D. programmes and has dedicated teaching and research laboratories with state of art instrumentation facilities.

About IARI-RBGRC

Rice Breeding and Genetics Research Centre (RBGRC) is a one of the research centres of Division of Genetics, Indian Council of Agricultural Research (ICAR)-Indian Agricultural Research Institute (IARI) and it is located at Aduthurai, Tamil Nadu. Situated in Cauvery delta region, blessed with the environment for year-round rice cultivation, this centre was identified as a shuttle breeding centre by Father of Green revolution in India Late. Prof. M.S. Swaminathan in the year 1968 to accelerate the rice breeding programs of ICAR. Since then this centre has played a significant role in the early success of the Green Revolution in India and contributed immensely in the development of Pusa rice varieties of ICAR. As a success story of Division of Genetics IARI this tiny centre continues in robustly impacting India's rice economy through modern crop improvement strategies.

About Thiruvarur

CUTN is located around 9 Kms from Thiruvarur town. Thiruvarur is the place where culture, heritage, history and modernity confluence. It is one of the capitals of early Cholas and birth place of one the trinities of Carnatic music Sadguru Tyagaraja Swami. The temple car of the town is the biggest in Asia. In and around Thiruvarur many tourist attractions are there which includes grand living Chola temples, French settlement in Karaikal, Danish settlement at Tranquebar, Portuguese built church at Velankanni, Nagore dargha and scenic beaches with ever attractive back waters.

National symposium on

PROTEOMICS FOR LIFE : THE INTRA AND INTERPLAY OF PROTEINS IN PLANTS AND MICROBES

Organised by

IARI- Rice Breeding and Genetics Research Centre
Aduthurai, Tamil Nadu

School of Life Sciences
Central University of Tamil Nadu
Thiruvarur, Tamil Nadu

Sponsored by

Proteomics Society, India

March 18, 2025

Central University of Tamil Nadu
Thiruvarur

Patrons

Dr. Himanshu Pathak
Secretary (DARE) and
Director General, ICAR
New Delhi

Prof. M. Krishnan
Vice Chancellor
Central University of Tamil Nadu
Thiruvarur

Co-Patron

Dr. Ch. Srinivasa Rao, Director, ICAR-IARI, New Delhi

National Advisory Committee

Prof. R. Thirumurugan, Registrar, CUTN ,Thiruvarur
Dr. Ashok Kumar Singh, Former Director, ICAR-IARI, New Delhi
Dr. C. Viswanathan, Joint Director (Research), ICAR-IARI, New Delhi
Prof. K. Dharmalingam, Director, AMRF, Madurai
Dr. Shantanu Sengupta, President, Proteomics Society, India
Dr.Tushar K. Maiti, General Secretary, Proteomics Society, India
Dr. Ramcharan Bhattacharya, Director, ICAR-NIPB, New Delhi
Dr. M. Raveendran, Director of Research, TNAU, Coimbatore
Dr. P. Irene Vethamoni, Dean (Horticulture), TNAU, Coimbatore
Dr. S. Keshava Prasad, Deputy Director, CSBMM, Yenepoya Research Centre, Mangalore
Dr. K. K. Vinod, Associate Dean (International Affairs), ICAR-IARI, New Delhi
Dr. Doss Ganesh, Chairperson, SBT, Madurai Kamaraj University, Madurai
Prof. C. P. Suresh, Head, Department of Horticulture, NEHU, Tura Campus, Meghalaya
Dr. Rajesh Banu, Head, Department of Biotechnology, CUTN, Thiruvarur
Dr. Sujata Upadhyay, Head, Department of Horticulture, Sikkim University, Gangtok

Chairperson

Prof. S.Manivannan, Dean, School of Life Sciences, CUTN, Tiruvarur

Co-Chairperson

Dr. S. Gopala Krishnan, Head, Division of Genetics, ICAR- IARI, New Delhi

Organising Committee

Dr. K. Subrahmaniyan, Director, TRRI, Aduthurai
Prof. Rajaguru, Dean, School of Integrative Biology, CUTN, Thiruvarur
Prof. P. Ravanan, Head, Department of Microbiology, CUTN, Thiruvarur
Prof. Guru Balamurugan, Depatment of Geology, CUTN, Thiruvarur
Dr. A. Ramesh Kumar, Head, Department of Horticulture, CUTN, Thiruvarur
Dr. Ramarao Golime, Head, Department of Epidemiology and Public Health, CUTN, Thiruvarur

Organising Secretary

Dr. P. Umadevi, Senior Scientist, IARI-RBGRC, Aduthurai
e-mail : Umadevi.P@icar.gov.in, Ph : +91 8943022844

Convenors

Dr. Moumita Malakar, Asst.Prof ,CUTN,Thiruvarur
E-mail: moumitamalakar@cutn.ac.in, Ph : +91 8777351481
Dr. Amit Kumar Bajhaiya, Asst.Prof. CUTN,Thiruvarur
E-mail : amitkumar@cutn.ac.in, Ph : +91 7499879105

Theme 1: Plant proteomics

> Plant proteomics; novel strategies, application and challenges

> Proteomic approach for crop improvement and food security

> Proteome mining for plant metabolites, unlocking bioactive compound

Theme 2: Plant associated microbial proteomics

> Plant associated microbial proteomics for sustainable agriculture

> Proteomics for unravelling functions of microbial proteins in plants

> Proteome mining for microbial metabolism for climate resilience and sustainable yield

Theme 3: The interplay of plant microbe proteomics

> Proteomic exploitation to unravel configuration and function of microbial proteins underlying in plants growth and observed phenotypes

> Protein interactome and peptide design

> Application of AI in proteomics and machine learning

REGISTRATION LAST DATE March 03, 2025

Registration Fee details:

Physical participation

Students: INR 1000

Faculty/Public/Research Scholar : INR 2000

Online participation

Students/Faculty/Public/Research Scholar: INR 1000

(All the fee should be included additional 18% GST)

Details regarding payment of registration fee and guest house booking are available on link below.

https://drive.google.com/file/d/11zHJkJLo5I1KGvsslvRLOrsDH5NkCpDZ/view?usp=drive_link

Dead lines:

Last date for registration and abstract submission : 03/03/2025

Full-length paper submission : 15/03/2025

Abstract should be submitted in the format given below:
https://docs.google.com/document/d/1PMJIN5qc0qkCYos6vEnvHHrYrzYKPnzGJNgoSwvqKHc/edit?usp=drivesdk

Registration link : https://forms.gle/NwCB7DeiRGzCMs1w8

Communication details anything related to Symposium: Proteomics2025@gmail.com

How to reach Thiruvarur?

Participants can board a train from Chennai Egmore to Thiruvarur Junction or take connecting trains from Tiruchirappalli, Thanjavur and Mayiladuthurai Junctions. Alternatively, participants can also avail air transport, from Tiruchirappalli (Trichy) International Airport (100 km away) and Chennai International Airport (299km).From the above-mentioned Airports one can take buses or trains to Thiruvarur.

Other details:

> Registration fee includes symposium kit and working lunch during the symposium.
> Registration fee is non-refundable in any circumstances.
> Registration fee does not include accommodation charges and accommodation will be arraged in university guest house subject to availability.