# **Activity Report**

**Title of Event**: Invited talk on "Process of Innovation development, technology readiness

level (TRL) commercialization of lab technologies and tech - transfer"

**Date** : 4<sup>th</sup> February 2025 (Tuesday)

Time/ Mode :

9.30 a.m.- 10. 30 a.m. / Online - Google meet

Unit

Coordinator Dr. S. Divya

Speaker : Dr. Leeba Balan

### Poster/Banner/Brochure of the event:



#### **ACTIVITY SUMMARY**

### **Objective:**

The process of innovation development, technology readiness level (TRL), commercialization of lab technologies, and tech transfer is to efficiently transition scientific research and innovations from the laboratory to real-world applications, maximizing their societal and economic impact.

### **Key Objectives:**

### 1. Innovation Development:

- Foster creativity and problem-solving to address market or societal needs.
- Develop and refine new technologies through iterative research and prototyping.

## 2. Technology Readiness Level (TRL) Progression

- Assess and advance the maturity of a technology from basic research (TRL 1) to full commercial deployment (TRL 9).
- Identify gaps in development, testing, and validation to ensure reliability and scalability.

# 3. Commercialization of Lab Technologies

- Transform lab-scale innovations into viable market products.
- Conduct market analysis to assess demand and potential applications.
- Secure funding and partnerships with industry stakeholders.
- Develop business models and strategies for product launch and scaling.

### 4. Technology Transfer

- Facilitate the movement of knowledge, processes, and innovations from research institutions to industry or public sectors.
- Protect intellectual property (IP) through patents and licensing agreements.
- Establish collaboration frameworks such as spin-offs, joint ventures, or licensing deals.
- Support startups and entrepreneurs in leveraging research innovations for commercialization.

#### **BRIEF BIO OF SPEAKER**

Dr. Leeba Balan is the Director of Bionyme Laboratories Pvt. Ltd., located in Chennai, Tamil Nadu, India. She earned her Ph.D. in Plant Tissue Culture and Phytochemistry of Medicinal Plants from the University of Madras. Her research interests encompass nanotechnology, protoplast culture, cancer biology, and herbal technology. Dr. Balan has contributed to 17 publications, accumulating over 80 citations. She has also served as a reviewer for the Journal of Molecular Structure. Notably, she secured funding from the Biotechnology Industry Research Assistance Council (BIRAC) for enhancing banana varieties in Tamil Nadu.





### **KEY OUTCOME**

- 1. Participants gained a deeper understanding of the innovation development process, and commercialization strategies through the insights shared by the guest speaker.
- 2. Real-world examples and case studies provided practical insights into the challenges and successes associated with technology transfer and commercialization.
- 3. Participants acquired knowledge applicable to both academic research and industry settings and to promote a bridge between laboratory innovations and market applications.

### **CONCLUSION**

By achieving these objectives, research-based innovations can be successfully developed, scaled, and introduced into industries, benefiting both society and the economy.

Total number of Students participated: 97

Staff Members participated: 08

Unit Coordinator	Head of the Department

AIIC Convenor

AIIC Vice-president

Principal