



**SHINAWATRA  
UNIVERSITY**  
FOSTERING INNOVATION

# 47<sup>th</sup> World Conference on Applied Science, Engineering and Technology (WCASET-2024)

27<sup>th</sup> & 28<sup>th</sup> December 2024 | Bangkok, Thailand

Organized by  
**IFERP Academy - Thailand Society**

Academic Partner  
**Shinawatra University, Thailand**

**Explore your Research Journey with IFERP**

## Guest of Honour

Time zone in Thailand (GMT+7)



**Dr. Pratikshya Bhandari**

Director, International Affairs lecture Faculty of  
Management Shinawatra University Pathum Thani,  
Thailand



**Mr. Siddh Kumar Chhajer**

Founder & Managing Director,  
IFERP, Technoarete Group,  
India.

## Guest of Honour



**Dr. Venus Dennen Claver**  
Manager  
International Relations,  
Shinawatra University.



**Ms. Julie Simon Macariola,**  
Manager,  
International Relations, Shinawatra University

## Keynote Speakers

Time zone in Thailand (GMT+7)



**Dr. Aswath M U**

Principal

Bangalore Institute of Technology,  
India.



**Prof. Dr. Zahriladha Zakaria BEM,  
SMIEEE**

Centre for Telecommunication Research  
& Innovation (CeTRI)  
Faculty of Electronic and Computer  
Technology and Engineering,  
Universiti Teknikal Malaysia Melaka  
(UTeM),  
Malaysia.



**Dr. MUHAMAD FIRDAUS SYAHMI  
BIN SAM-ON**

Senior Lecturer  
Department of Food Sciences, Faculty of  
Science and Technology  
Universiti Kebangsaan,  
Malaysia.

## Keynote Speakers

Time zone in Thailand (GMT+7)



**Assoc Prof Dr. Gurmeet Singh**

Vice Principal  
Head to the P.G. Department of  
Mathematics  
GSSDGS Khalsa College (Autonomous)  
Patiala,  
Punjab.



**Prof. V. Venkata Ramana**

Vice-Chairman, Telangana State Council  
of Higher Education (TSCHE) &  
Vice-Chancellor, Rajiv Gandhi University  
of Knowledge Technologies, Basar &  
Professor, School of Management Studies,  
University of Hyderabad, Telangana.  
India.



**Dr. Prakash Subramaniam**

Dean  
Sathyabama Institute of Science &  
Technology,  
India.

## Keynote Speakers

Time zone in Thailand (GMT+7)



**Dr. Mrutunjaya Bhuyan**  
Ramanujan Faculty (Scientist D)  
Institute of Physics, Bhubaneswar,  
India.



**Dr. Sipnarong Kanchanawongpaisan**  
Deputy Director  
The Institute of Multidisciplinary  
Postdoctoral and Franchise Program  
(IPF),  
Thailand.



**Dr. A. K. Mahbubul Hye**  
Chairperson,  
Logistic and Supply Chain,  
Faculty of Management,  
Shinawatra University,  
Thailand.

## Session Speakers

Time zone in Thailand (GMT+7)



**Prof. Dr. Froilan Mobo**  
Professor II  
Philippine Merchant Marine Academy,  
Philippines.



**Dr. Kayatri Govindaraju**  
Head of Department  
Department of Pharmaceutical Life  
Sciences  
Universiti Malaya,  
Malaysia.



**Asst Prof. Dr. Yogesh Golhar**  
St. Vincent Pallotti College of  
Engineering & Technology  
Nagpur University,  
India.

## Session Speakers

Time zone in Thailand (GMT+7)



**Asst Prof. Dr. Johannes V. Gloria**  
North Eastern Mindanao State  
University,  
Philippines.



**Dr. Suha Khanfar**  
Doctor of business administration  
International American University,  
Jordan.



**PROF. DAISY MAE R.  
BONGTIWON**  
Eulogio Amang Rodriguez Institute  
Of Science and Technology  
De la salle University  
Manila,  
Philippines.



## Session Speakers



**Assoc Prof. Dr. Dowroong  
Watcharinrat**  
Faculty of Liberal Arts  
Shinawatra University,  
Thailand.



**Dr. Anu Sayal**  
Faculty of Business and Law  
School of Accounting and Finance,  
Taylor's University.



**Prof Dr. Chitra Kiran. N**  
Department of ECE,  
Alliance College of Engineering,  
Alliance University,  
Bengaluru, India.

## Session Chairs

Time zone in Thailand (GMT+7)



**Dr. B. Purnachandra Rao,**  
Sr Solutions Architect  
HCL Technologies  
Bangalore,  
India.



**Dr. Manikandan T**  
Professor  
Department of CSBS  
Rajalakshmi Engineering  
College,  
Rajalakshmi Nagar, Thandalam,  
Chennai



**Dr. S. Ramesh**  
Assistant Professor (SS),  
Department of Mechatronics  
Engineering,  
Rajalakshmi Engineering  
College,  
Thandalam,  
Chennai



**Dr. Nasreen Khan**  
Assistant Professor,  
Department of Management  
Sciences  
Szabist University  
Dubai ,  
UAE

## Session Chairs

Time zone in Thailand (GMT+7)



**Dr. MADHURIMADASGUPTA, HOD,**  
DEPARTMENT OF GENDER STUDIES,  
ASHADI WISDOM CAMPUS,  
Sri Lanka  
&  
Post-doctoral fellow,  
Abo-Akademi University,  
Finland



**DR. LHYNETTE T. ZAMBALES**  
Assistant Professor,  
College of Business  
PALAWAN STATE UNIVERSITY  
Palawan, Philippines



**Dr. Jemmarie G. Suetos** Assistant  
Professor II  
College of Agriculture Food and  
Sustainable Development

## Moderators



**Ms. Ena Marie Tiro**  
Shinawatra University



**Mr. Ajarn Aleksei**  
Shinawatra University



**Ms. Yulia Febrianti Putri**  
UIN Sulthan Thaha Saifuddin  
Jambi



**Ms. Syaikha Zakira Denila**  
UIN Sulthan Thaha Saifuddin Jambi

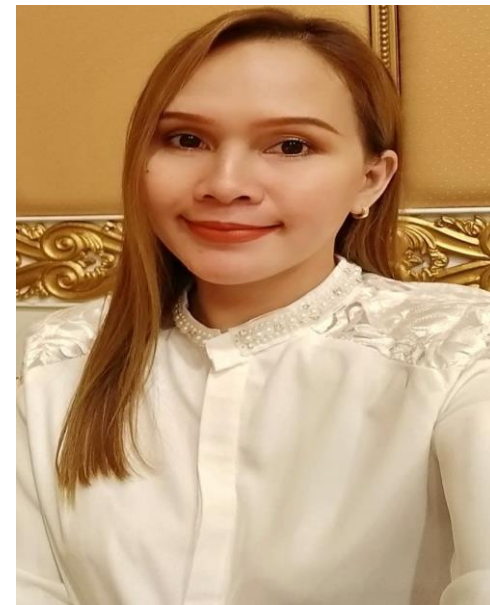
## Event Facilitators



**Dr. Venus Dennen**  
Shinawatra University



**Ms. Busaya Chaysuriya**  
Shinawatra University



**Ms Heart Mahinay**  
Shinawatra University

### Program Schedule Day1 – Physical – 27/12/2024

Time zone in Thailand (GMT+7)

|                     |  |
|---------------------|--|
| 08:30 AM - 09:00 AM | Registration desk  |
| 09:00 AM - 09:30 AM | Introduction by Moderator  |
| 09:30 AM - 09:55 AM | Speech By Keynote Speaker <b>Dr. MUHAMAD FIRDAUS SYAHMI BIN SAM-ON</b> |
| 09:55 AM - 10:20 AM | Speech By Keynote Speaker <b>Assoc Prof Dr. Gurmeet Singh</b>          |
| 10:20 AM - 10:45 AM | Speech By Keynote Speaker <b>Dr. Sipnarong Kanchanawongpaisan</b>      |
| 10:45 AM - 11:00 AM | Networking Break   |
| 11:00 AM - 11:30 AM | Inaugural Ceremony   |
| 11:30 AM - 11:55 AM | Speech By Session Speaker <b>Assoc Prof. Dr. Dowroong Watcharinrat</b> |
| 11:55 AM – 12:20 PM | Speech By Keynote Speaker <b>Dr. A. K. Mahbubul Hye</b>                |
| 12:40 PM - 01:30 PM | Lunch Break  |
| 01:30 PM -02:50 PM  | Technical Session 1A   |
| 02:50 PM -03:00 PM  | Networking Break   |
| 03:00 PM – 03:05 PM | Valedictory Function   |
| 03:05 PM – 03:10 PM | Vote of Thanks   |

## Inaugural Ceremony Day1 – Physical – 27/12/2024 Time zone in Thailand (GMT+7)

Inaugural Speech by **Mr. A. Siddth Kumar Chhajer**

Inaugural Speech by **Dr. Manikandan T**

Inaugural Speech by **Dr.S.Ramesh**

Inaugural Speech by **Dr. Sipnarong Kanchanawongpaisan**

Inaugural Speech by **Dr. Pratikshya Bhandari**

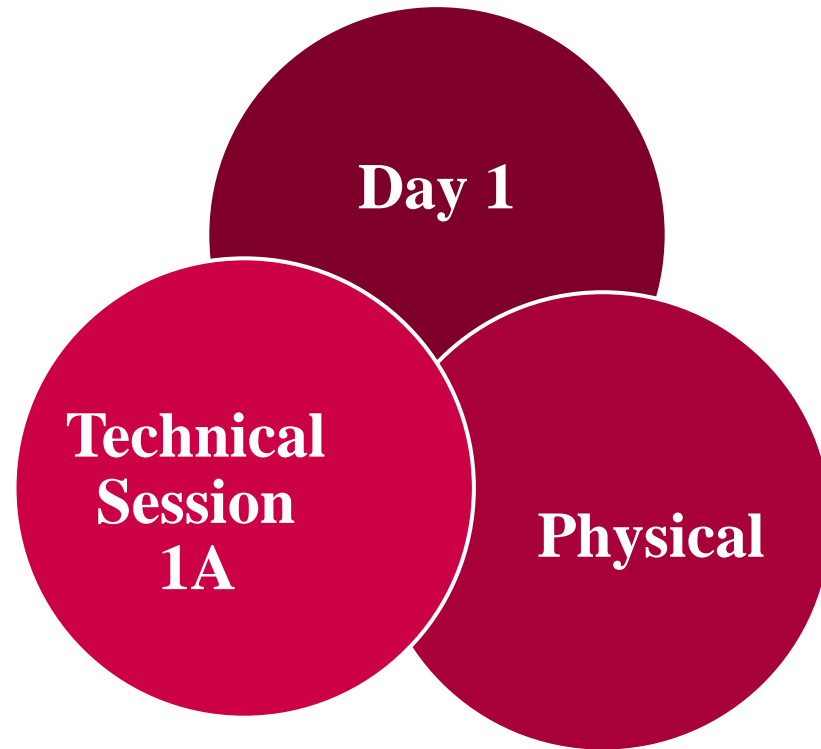
Inaugural Speech by **Dr. Venus Dennen Claver**

Proceeding Booking Release

Memento Distribution

Award Ceremony

**Time zone in Thailand (GMT+7)**





## Technical Session 1A

Time zone in Thailand (GMT+7)

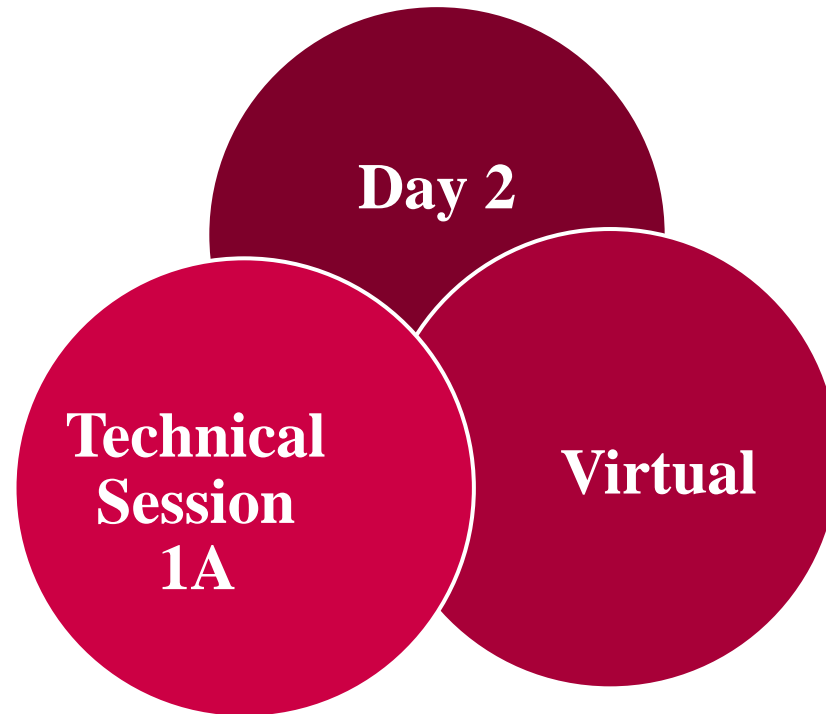
|                     |  |
|---------------------|--|
| 01:30 PM - 01:38 PM | Exploring the Potential of Purple Sweet Potato Extract as a Natural Reagent for Copper Ion Detection for Green Chemistry and Sustainable Education<br><b>Presentation by Annida Nurul Shabrina</b> |
| 01:38 PM - 01:42 PM | The Impact of Community Activities on the Level of Seawater Pollution at Kualo Beach, Bengkulu City<br><b>Presentation by Linda Alfionita</b>  |
| 01:42 PM - 01:50 PM | Factors Influencing Young Workers Towards Digital Labour Platforms<br><b>Presentation by Siti Suraya Abd Razak</b>   |
| 01:50 PM - 01:58 PM | Fostering Case-Based Learning by Developing Hypermedia-Based Module in Educational Statistics<br><b>Presentation by Fahlulia Rahma Shofiana</b>  |
| 01:58 PM - 02:06 PM | Innovating Roleplay Method Assisted By WhatsApp Bots as Learning Media for ESP: Insights from Student Experiences<br><b>Presentation by Novita Dyah Pitaloka</b>                                   |
| 02:06 PM - 02:14 PM | Optimizing Job Search: A Practical Guide to Using Personality Tests for Better Career Alignment<br><b>Presentation by Annisa Wulandari</b>   |
| 02:14 PM - 02:22 PM | The Role of Nano-Biofertilizer in Agroecosystem Conservation for Plants Under Stressed and Non-Stressed Conditions<br><b>Presentation by Niken Agustin</b>   |
| 02:22 PM - 02:30 PM | Study Spatial Kampung Pahandut, History and Image Regional of Palangka Raya Cities<br><b>Presentation by Tari Budayanti Usop</b>   |
| 02:30 PM - 02:38 PM | Assessing the Accuracy of Random Forest in Mapping Urban Green Cover in Baguio City Using Sentinel-2 Imagery and Spectral Indices<br><b>Presentation by Joan M. Peralta</b>                        |
| 02:38 PM - 02:46 PM | OMNI Personality Traits as an Alternative Measurement in Enhancing Business and Management Education Practices<br><b>Presentation by Made Jessita Kirandra</b>                                     |

### Program Schedule Day – 2 Virtual – 28/12/2024

Time zone in Thailand (GMT+7)

|                     |  |
|---------------------|--|
| 09:00 AM - 09:05 AM | Introduction by Moderator  |
| 09:05 AM - 09:15 AM | Speech By Keynote Speaker <b>Dr. Aswath M U</b>                    |
| 09:15 AM - 09:25 AM | Speech By Keynote Speaker <b>Prof . Dr Zahriladha Zakaria</b>      |
| 09:25 AM - 09:35 AM | Speech By Keynote Speaker <b>Dr. Prakash Subramaniam</b>           |
| 09:35 AM - 09:45 AM | Speech by Session speaker <b>Dr. Kayatri Govindaraju</b>           |
| 09:55 AM - 10:05 AM | Speech by Session speaker <b>Prof. Dr. Froilan Mobo</b>            |
| 10:15 AM - 10:25 AM | Speech by Session speaker <b>Asst Prof. Dr. Johannes V. Gloria</b> |
| 10:25 AM - 12:43 AM | Technical Session 1 A  |
| 12:43 AM - 12:58 PM | Networking Break   |
| 12:58 PM - 01:08 PM | Speech by Session speaker <b>Dr. Anu Sayal</b>                     |
| 01:08 PM - 01:18 PM | Speech by Session speaker <b>Asst Prof. Dr. Yogesh Golhar</b>      |
| 01:18 PM - 01:28 PM | Speech by Session speaker <b>Dr. Suha Khanfar</b>                  |
| 01:28 PM – 01:38 PM | Speech By Keynote Speaker <b>Prof. V. Venkata Ramana</b>           |
| 01:38 PM – 01:48 PM | Speech By Session Speaker <b>PROF. DAISY MAE R.</b>                |
| 01:48 PM – 01:58 PM | Speech By Session Speaker <b>Dr. Chitra Kiran. N</b>               |
| 01:58 PM – 02:08 PM | Speech By Keynote Speaker <b>Dr. Mrutunjaya Bhuyan</b>             |
| 02:08 PM – 06:00 PM | Technical Session 2 A  |
| 06:00 PM - 06:05 PM | Valedictory Function   |
| 06:05 PM - 06:10 PM | Vote of Thanks   |

**Time zone in Thailand (GMT+7)**



## Technical Session 1A

Time zone in Thailand (GMT+7)

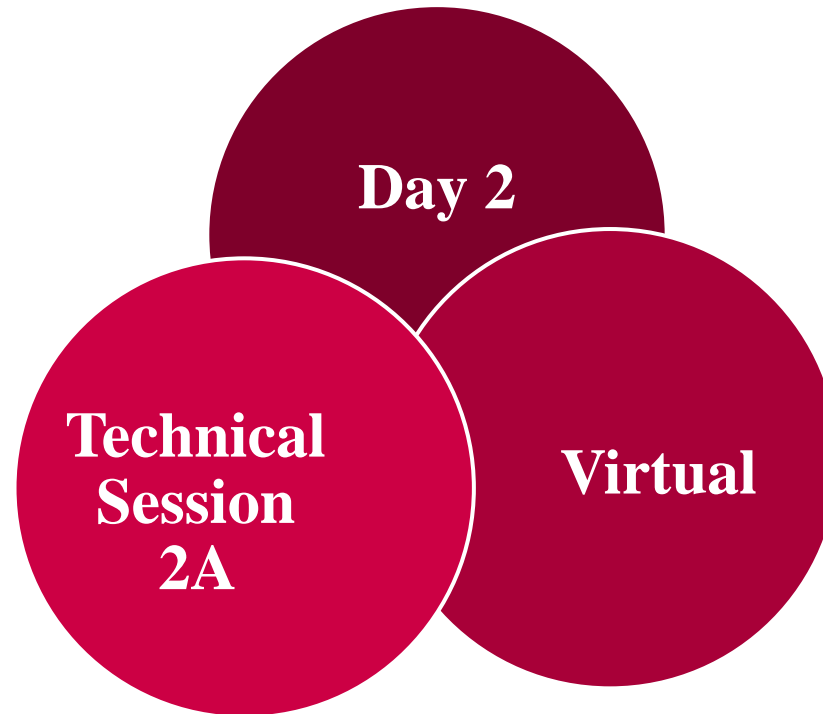
|                     |  |
|---------------------|--|
| 10:25 AM - 10:33 AM | Fostering the Next Generation of Farmers: The Critical Role of Teachers in Rural Areas in Indonesia<br><b>Presentation by Yogaprasta Adi Nugraha</b>                                     |
| 10:33 AM - 10:41 AM | From Remote Village to Tourist Destination: Transforming Community-Based Tourism through Village Leadership and Ancillary Aspects<br><b>Presentation by Mariana Rista Ananda Siregar</b> |
| 10:41 AM - 10:49 AM | Advancing Cardiovascular Diagnostics: Deep Learning Approaches For Heart Disease Detection<br><b>Presentation by Dr. S. Sasikala</b>   |
| 10:49 AM - 10:57 AM | Significance of Intelligent Machine Learning Techniques in Forecasting the Development and Progression of Multiple Sclerosis<br><b>Presentation by Ms. E. Kavipriya</b>                  |
| 10:57 AM - 11:05 AM | Predictive Analysis of Hashimoto's Thyroiditis Using Advanced Machine Learning Techniques<br><b>Presentation by Dr. S. Sasikala</b>  |
| 11:05 AM - 11:13 AM | Prognosis Prediction of Carcinoma Using Novel Feature Selection in Machine Learning Techniques<br><b>Presentation by Dr. D. Priyadharsini</b>  |
| 11:13 AM - 11:21 AM | The Multiplying Effect of Micronutrients Deficiency on Human Development in ASEAN Countries<br><b>Presentation by Dewi Firda Sari</b>  |
| 11:21 AM - 11:29 AM | Faculty Understanding of Student Learning Outcomes to Develop Teaching and Learning Activities<br><b>Presentation by Roberto Layague Jr</b>  |

## Technical Session 1A

Time zone in Thailand (GMT+7)

|                     |   |
|---------------------|---|
| 11:29 AM - 11:37 AM | Investigating Factors Affecting Leadership Styles and Their Impact on Employee Turnover at a Pharmaceutical Organisation in Johannesburg, South Africa<br><b>Presentation by Prof. Barnes Sookdeo</b> |
| 11:37 AM - 11:45 AM | Exploring International Sales Factors and Growth Impact for Mrembo Naturals Limited in Rwanda<br><b>Presentation by Prof. Barnes Sookdeo</b>  |
| 11:45 AM - 11:53 AM | Nanobots: Revolutionising Medicine and Beyond – A Comprehensive Review<br><b>Presentation by Vinita Khatri</b>  |
| 12:03 PM - 12:11 PM | Research on the Application of Transformer Deep Learning Model in Content Analysis and Theme Modeling of the Prajnaparamita Heart Sutra<br><b>Presentation by Wei Meng</b>                            |
| 12:11 PM - 12:19 PM | The Role of Documentary Film in Interior Design Education<br><b>Presentation by Titi Indahyani</b>  |
| 12:19 PM - 12:27 PM | The Design of a New Single Phase Cascaded Quasi-Z-Source Inverter with High Boost and Better THD<br><b>Presentation by Ahamed Al-Arifin</b>   |
| 12:27 PM - 12:35 PM | Integrating Virtual Experiential Learning Activities Through Interactive Website for Interior Design Education<br><b>Presentation by Titi Indahyani</b>   |
| 12:35 PM - 12:43 PM | Developing a New Instructional Model for Sustainable Education in MIMAROPA State Universities and Colleges during the New Normal<br><b>Presentation by Jergen Jel C. Labaria</b>                      |

**Time zone in Thailand (GMT+7)**



## Technical Session 2A

Time zone in Thailand (GMT+7)

|                     |  |
|---------------------|--|
| 02:08 PM - 02:16 PM | Precision Magnetic Field Monitoring and Dynamic Calibration<br><b>Presentation by Niraj Gahukar</b>  |
| 02:16 PM - 02:24 PM | An Exploratory Approach to Managerial Innovation: From Distinctive Characteristics to Practice<br><b>Presentation by Lazaar Ikram</b>  |
| 02:24 PM - 02:32 PM | Hybrid Energy Solutions: Solar-Tracking Panels and Piezoelectric Pavement Integration for Sustainable Power Generation<br><b>Presentation by Niraj Pandit</b>                |
| 02:32 PM - 02:40 PM | Enhancing Oyster Mushroom Cultivation with Solar-Powered IoT and Machine Learning: Predicting Harvest Readiness<br><b>Presentation by Gilda J. Taupa</b>                     |
| 02:40 PM - 02:48 PM | Secure Health Insurance Portability Using Blockchain and Cloud Technologies for Decentralized Record Transfer<br><b>Presentation by Lakshmi Narasimhan Srinivasagopalana</b> |
| 02:48 PM - 02:56 PM | Designing an Adaptive Dynamic Approach Applied in Text Summarization<br><b>Presentation by Tenio, Jonald</b>   |
| 02:56 PM - 03:04 PM | SolPort-Powermate: An Environmentally Friendly Solar Panel Powers a Smart Inverter<br><b>Presentation by Jagdish Waghmode</b>  |
| 03:04 PM - 03:12 PM | RFID Based Challan System<br><b>Presentation by Abhishek Deokar</b>  |
| 03:12 PM - 03:20 PM | Sociodemographic Factors Impact on Employability Skills: Predictive Insights for Career Success<br><b>Presentation by Paulina Guerra</b>                                     |
| 03:20 PM - 03:28 PM | Development of Artificial Intelligence Model for Defect Detection of Carrots<br><b>Presentation by Tien-Think Le</b>   |

## Technical Session 2A

Time zone in Thailand (GMT+7)

|                     |   |
|---------------------|---|
| 03:28 PM - 03:36 PM | Enhancement of the Procedural Map Generation Algorithm Used in the Game Lethal Company<br><b>Presentation by Christian Angelo M. Uy</b>   |
| 03:36 PM - 03:44 PM | Enhanced Content-Based Filtering Algorithm Applied in Topic Recommendations for First Year Computer Science Students of Pamantasan Ng Lungsod Ng Maynila<br><b>Presentation by Michael Anjo H. Jaime</b>                            |
| 03:44 PM - 03:52 PM | OMNI Personality Traits as an Alternative Measurement in Enhancing Business and Management Education Practices<br><b>Presentation by Made Jessita Kirandra</b>  |
| 03:52 PM - 04:10 PM | Optimizing Hyperparameters for Enhanced Satsuma Fruit Disease Detection<br><b>Presentation by Jann Vincent Paul C. Lagmay</b>   |
| 04:10 PM - 04:18 PM | Acalypha Indica-Infused Hydrogel for Anti-Inflammatory and Antimicrobial Applications<br><b>Presentation by Abinaya R</b>   |
| 04:18 PM – 04:26 PM | Interrelationship between Business Intelligence and Knowledge Management and its impact on Decision Making in Jordan's Banking Sector.<br><b>Presentation by Issa M Shehabat</b>  |
| 04:26 PM – 04:34 PM | Effectiveness of Village Fund Policy for BUMDes Development (Case Study of BUMDes Dharma Utama Wonokerto Village, Turi District, Sleman Regency, DI Yogyakarta Province)<br><b>Presentation by Raden Roro Ratnasari Dwi Riyanti</b> |
| 04:34 PM – 04:42 PM | ETCD SEARCH EFFICIENCY AMPLIFIED THROUGH ADVANCED OPTIMIZATION STRATEGIES<br><b>Presentation by Satya Ram Tsaliki</b>   |
| 04:42 PM – 04:50 PM | Exploring Restrained Pitchfork Domination: Theory and Application Perspectives<br><b>Presentation by Vijayalakshmi P</b>  |



## Technical Session 2A

|                     |  |
|---------------------|--|
| 04:50 PM – 04:58 PM | Reducing costs using smart sustainable manufacturing and its role in achieving the sustainable development goal (sustainable cities and communities)<br><b>Presentation by Dr. Ghazi Maan Faisal</b> |
| 05:58 PM – 05:06 PM | Modified Sha-512 Applied With Rivest-shamir-adleman Algorithm<br><b>Presentation by Neil Marcus Manubay</b>  |
| 05:06 PM – 05:14 PM | Modified Gale-Shapley Algorithm with Multi-Attribute Utility Theory (MAUT) for Unbalanced Sets<br><b>Presentation by Romeo II Pateño</b>   |
| 05:14 PM – 05:22 PM | Integration Development Hybrid Charging Station in Gas Station of DKI Jakarta<br><b>Presentation by Irvan Ari Ganda</b>  |
| 05:22 PM – 05:30 PM | Performance Analysis of IR Distance Sensors on Different Surface Materials<br><b>Presentation by Chacharin Lertyosbordin</b>   |