



## ICSTAR UNILA 2022

The 8th International Conference on Science,  
Technology and Interdisciplinary Research 2022



## RUNDOWN PROGRAM

### September 26, 2022 (Monday)

13:00 Arrival of the participation (offline meeting)  
14:00 - 17:30 Hotel check in and Pre-Registration participants

### September 27, 2022 (Tuesday) @ Bukit Randu Hotel and Resort

08:00 - 08:30	Registration for conference participants
08:30 - 09:00	<b>Official Opening Ceremony</b> <a href="https://zoom.us/j/99947411555">https://zoom.us/j/99947411555</a>   Meeting ID: 999 4741 1555   Passcode: unilajaya
	<b>Report and Acknowledgement Speech by Assoc. Prof. Ir. Irza Sukmana, S.T., M.T., Ph.D., IPU - Conference Chair</b>
	<b>Welcoming Speech by Ir. Dr. Eng Helmy Fitriawan, S.T., M.Sc. - Dean, Faculty of Engineering Unila</b>
	<b>Official Opening Speech by Prof. Dr. dr. Asep Sukohar, M.Kes. - Vice-Rector for General Administration and Finance, Unila</b>
09:00 - 09:30	<b>Coffee Break</b>
09:30 - 10:30	<b>Pleenary Keynote Speaker Session I</b> <a href="https://zoom.us/j/99947411555">https://zoom.us/j/99947411555</a>   Meeting ID: 999 4741 1555   Passcode: unilajaya
	<b>Session Chair: Dr. Eng. Lukmanul Hakim, S.T., M.Sc.</b>
	<b>Prof. Syarifah nur Aqida Binti Syed Ahmad - Universiti Malaysia Pahang, Malaysia</b> "Laser Technology for Surface Enhancement"
	<b>Prof. Joni Agustian - Universitas Lampung, Indonesia</b> "Mesosstructure Cellular Foam (MCF) Silica in Amulases Immobilization for Strach Hydrolysis"

<p>10:30 - 12:00 12 min. max 8-10 minutes presentation 2-4 minutes Q&amp;A</p>	Parallel Presentation Session I : Morning				
	Parallel Room 1 Offline Meeting	Parallel Room 2 Offline Meeting	Prarallel Room 3 Zoom meeting link:	Prarallel Room 4 Zoom meeting link:	Parallel Room 5 Zoom meeting link:
	Session Chair: Assistant:	Session Chair: Assistant:	Session Chair: Assistant:	Session Chair: Assistant:	Session Chair: Assistant:
	<b>Gusri Akhyar Ibrahim (#4409)</b> Optimization Cutting Parameters of Ti-6Al-4V ELI Thread on Major and Minor Diameters Using Taguchi Method	<b>Yogita Dharmik (#3842)</b> Blockchain-Based Document Verification for Smart Learning Management	<b>Dinda Wahyu Setiarini (#3099)</b> Geological Strength Index (GSI) and Tunnel Construction Method In Bintang Bano Irrigation Tunnel, Sumbawa Barat, Nusa Tenggara Barat	<b>Muhammad Rizaldi Nuraulia (#0614)</b> Stability Analysis of Support System: A Case Study of Rukoh Dam Supplementation Tunnel, Pidie Regency, Aceh	<b>Delfly Abdjul (#2551)</b> UV absorbing substances in the Indonesian starfish <i>Archaster typicus</i>
	<b>Muslimin (#5514)</b> 3D Printing Filament Extruder Machine: Heat Transfer Analysis	<b>Aditya Eka Harsana (#4725)</b> Design and Implementation of Helpdesk Module in Digital Repository Information System at University of Lampung Library	<b>Andi Rochmadi (#3599)</b> Analysis of Subsurface Engineering Geological Condition Based on Rock Mass Rating (RMR) and Geological Strength Index (GSI) in Asahan 3 Hydroelectric Power Plant Tunnel (STA 7+085 - STA 7+717), North Sumatra	<b>Eska R Triristanto (#1279)</b> Correlation between Schmidt hardness and Uniaxial Compressive Strength of Breccia in Kebobutak Formation at Bener Diversion Tunnel, Purworejo, Central Java, Indonesia	<b>Aubain Hilaire Nzokem (#4054)</b> Pricing European Options under five-Parameter Gamma-Variance Process
	<b>Muhamad Farizi (#6815)</b> Design Desktop Extrusion Molding Machine for Recycled Plastic	<b>Frisa Yugi Hermawan (#9930)</b> The Automatic Film Viewer Integrated With The Automatic Densitometer Using Light Intensity Method	<b>Jodan Panretta Diwan (#3544)</b> Slope Stability Analysis by Limit Equilibrium Method of The Inlet and Outlet	<b>Andy Purwanto (#5920)</b> Determination of The Tunnel Excavation Methods, Support Systems, and Stand-up Time Based on Rock Mass Rating 1989 (RMR89) of The Spillway Tunnel, Bulango Ulu Dam, Gorontalo Province, Indonesia	<b>Fisa Savanti (#4520)</b> Assessment of Natural Ventilation on Carbon Dioxide Concentrations in Pandemic Situation

<b>Achmad Yahya Teguh Panuju (#7272)</b> Green Innovation for SMEs in Indonesia – A Literature Analysis	<b>Farist Khaeruman (#8053)</b> Noise Detection System in Library Reading Room Using Arduino-based Internet of Things	<b>Hidayat Wisnuaji (#4182)</b> Slope stability analysis of spillway tunnel in Pelosika Dam, Konawe, South East Sulawesi	<b>Aditya Rasdi Metly (#1509)</b> Numerical Evaluation of Proposed Support Design for Intake Tunnel of Meniting Dam, West Nusa Tenggara, Indonesia	<b>Martinus (#5748)</b> Bamboo Electric Bicycle as an Alternative Transportation Vehicle in Lampung University
<b>A M Ummati (#7045)</b> Curved Damper as Structural Retrofitting Element to Improve Steel Truss Bridge Performance	<b>Paulus Setianugroho (#4965)</b> Performance of Deep Beam In Seismic-Resistant Building Using Strut And Tie Method Based on SNI 2847-2019 and ACI 318-19	<b>Lutfie Arlan Sandria (#8173)</b> Relationship between Rock Mass Rating (RMR), Q-System, and Geological Strength Index (GSI) of Rock Masses at the Dolok Dam's Diversion Tunnel, Central Java	<b>Rahmat Catur Wibowo (#7293)</b> Multiple Linear Regression Method For Thermal Maturity Prediction Based On Well Logs	<b>Elman Torres (#8846)</b> Evaluation of Vermicompost Tea Quality as Affected by Short Duration of Brewing Process
<b>Jihan Aferiansyah (#5322)</b> Folklore Visual Novel Game Development Using Agile Kanban Board Method	<b>Nadia Aulia Febrizki (#6851)</b> Performance of Building Structures Using Building-Frame System And Dual System In Seismic-Resistant Building	<b>Dwitra W Elris Purba (#5118)</b> Preliminary Excavatability Assessment Based on Quality of Rock Mass in Mbay Dam Diversion Tunnel, East Nusa Tenggara	<b>Zulhilmi Bangkit Harwinda (#1346)</b> Correlation between RMR and GSI at the Rukoh Dam Suppletion Tunnel, Aceh Province, Indonesia	<b>Kesit Himawan Setyadji (#5676)</b> Typology of Javanese House in Saradan Wonogiri
<b>Irza Sukmana (#8340)</b> Static Structural Properties of Magnesium AZ31B Based on Experimental and Finite Element Analysis for Bone-Plate Implant Application	<b>Husnul Khotimah (#5194)</b> Performance of Seismic-Resistant Building Structure Using Diaphragm Based on SNI 2847:2019 and ACI 318-20	<b>Anggoro Bagyo Mulyo (#9108)</b> Numerical Evaluation Slope Stability Based On Initial Design of the Inlet Portal Jragung Dam Diversion Tunnel, Indonesia	<b>Rangga Prasetya (#63644)</b> Rock Mass Evaluation on The Post Construction Stage in Cisumdawu Tunnel, Rancakalong, Sumedang District, West Java, Indonesia	<b>Musyawaroh (#5742)</b> Puntukrejo Village Development Strategy Based on Agrotourism
<b>Septafiansyah D Putra (#8765)</b> Usability Testing of Dashboard System at Smart Greenhouse in Lampung Province, Indonesia	<b>Meizano Ardhi Muhammad (#2687)</b> Mixed Reality Implementation for Lampung Museum	<b>Restika Putri (#1369)</b> Performance Assessment of Small-Scale Irrigation Areas Based on ePAKSI in Pringsewu Regency	<b>Chetan Kannake (#8887)</b> The School ERP System in India	<b>Armijon (#4989)</b> Preliminary Study: Determining Optimal Location for House Relocation in Way Krui, Lampung, Indonesia
12:00 - 13:00	<b>Lunch and Dzuhur Praying</b>			

13:00 - 14:00	<b>Pleenary Keynote Speaker Session I</b> <a href="https://zoom.us/j/99947411555">https://zoom.us/j/99947411555</a>   Meeting ID: 999 4741 1555   Passcode: unilajaya				
	<b>Session Chair: Dr. Misfa Susanto</b>				
	<b>Dr. Fethma M Nor - Universiti Teknologi Brunei, Brunei Darussalam</b> <b>"Synthesis of natural hydroxyapatite from waste pig bones, buffalo bones and goat bones via calcination method at various times and temperatures"</b>				
	<b>Dr. Yongqiang Cheng - University of Hull, UK</b> <b>"Challenges, Pitfalls and Lessons Learnt on Development of A Smart Digital Healthcare Device to Achieving the CE Medical Class II Status"</b>				
	<b>Parallel Presentation Session II : Afternoon</b>				
14:00 - 15:00	<b>Parallel Room 1 Offline Meeting</b>		<b>Prarallel Room 3 Zoom meeting link:</b>	<b>Prarallel Room 4 Zoom meeting link:</b>	
	<b>Session Chair: Dr. Khairudin Assistant:</b>		<b>Session Chair: Dr. Nandi Assistant:</b>	<b>Session Chair: Assistant:</b>	
	<b>Tarkono (#9925)</b> The Effect of Natural Rubber Volume on Sound Absorption Ability of Oil Palm Empty Fruit Bunch Fibre Boards		<b>Rina Widayanti (#8176)</b> Comparison of the microclimate in the village with the element of the water body as one of the land functions	<b>Anggoro Bagyo (#5182)</b> Numerical evaluation slope stability based on initial design inlet portal Jragung dam	
	<b>Rizal Adi Saputra (#4817)</b> Application of Lampung Natural Rubber Composite Reinforcement OPEFB Fiber (Oil Palm Empty Fruit Bunch) for Truck Engine Bio-Isolators		<b>Alya Putri Ardinal (#8646)</b> Fire Risk Assessment on Fishing Vessel	<b>Warlinda Eka Triastuti (#6181)</b> Effect of Steam Delignification and Bleaching Process on Pineapple Leaf Fiber as Textile Material	
	<b>Rizkimia Akbar Setiawan (#6187)</b> Design a Test Set Generator Using Error Table Method for Error Diagnosis on Combination Digital Circuits		<b>Warlinda Eka Triastuti (#9105)</b> Production of Starch Modification as Fishing Nets Composite by Acetylation Methods	<b>Missaoui Sayah (#8587)</b> Prediction of the Onset of Nucleate Boiling in a narrow, rectangular channel in a research reactor for Molybdenum-99 production.	

Endro P Wahono (#8052) Rainwater Harvesting Technology: Efficiency and Public Preference of Clean Water Supply at The Pasaran Island		Ayu E Sri Wulansari (#9923) Spatial Pattern Squatter Settlements In Semanggi Railway Track	Er. Kulbushan Rassewatt (#1622) Effectiveness of DCT and Walsh Transforms employing DWT-SVD designed for watermarking	
Muslimin Muslimin (#7039) Manufacture and Testing of 3D Filament Printers Using Recycled LDPE Plastic Raw Materials				
Amrul (#9924) Potential of Waste to Energy in the Lampung University Campus				
15:00-15:30	Coffee Break			
15:30-15:40	Concluding Remarks and Closing Statement from the Organizer			

### September 28, 2022 Workshop on International Publication (using Online Zoom meeting platform)

09:00 - 09:30	Registration, welcome, and practical information by Organiser
09:30 - 11:30	<b>Preparing Your Manuscript for The International Journal</b> <b>Prof. Moh. Badaruddin, S.T., M.T., Universitas Lampung, Indonesia</b>
11:30-11:45	Closing for the IC-STAR 2022 activity