

**THE 2nd INTERNATIONAL CONFERENCE ON
ADVANCES IN INFORMATION AND COMMUNICATION TECHNOLOGY (ICTA 2023)**

ICTU, 13-14 December, 2023

<https://icta.ictu.edu.vn>

13 DECEMBER 2023 - OPENING CEREMONY <i>Venue: Multi-purpose Hall</i>	
13h00-13h30	Registration and welcoming delegates & participants
13h30-13h45	ICTA 2023 Opening Ceremony
13h45-13h50	ICTU Brief Introduction
13h50-13h55	Opening remark Assoc.Prof. Dr. Phung Trung Nghia - ICTU Rector, ICTA 2023 General Co-Chair
13h55-14h00	Welcome Speech Assoc.Prof. Dr. Hoang Van Hung, TNU President, ICTA 2023 General Co-Chair
14h00-14h10	ICTA 2023 Plenary Speech Prof. Dr. Huynh Van Nam, Japan Advanced Institute of Science and Technology, ICTA 2023 Program Co-Chair
13 DECEMBER 2023 - PLENARY SESSION <i>Venue: Multi-purpose Hall</i>	
14h10-15h40	<u>Keynote Speeches</u> <i>Chair 1:</i> Prof. Dr. Dongkyun Kim, Kyungpook National University, Korea Keynote Speech 1: Exploitation of Electronic Medical Records Prof. Dr. Ho Tu Bao, Institute for Advanced Study in Mathematics, Vietnam Keynote Speech 2: Advancing Slope Land Disaster Monitoring and Alert Systems through Synergistic IoT and AI Integration Prof. Dr. Tien-Yin Chou, Feng Chia University, Taiwan <i>Chair 2:</i> Prof. Dr. Huynh Van Nam, Japan Advanced Institute of Science and Technology, Japan Keynote Speech 3: Audio/Speech Information Hiding Based on Human Auditory Characteristics Prof. Dr. Masashi Unoki, Japan Advanced Institute of Science and Technology, Japan Keynote Speech 4: Research on Intrusion Detection on Host Devices Prof. Dr. Ren-Hung Hwang, College of Artificial Intelligence, National Yang Ming Chiao Tung University, Taiwan
15h40-15h50	Group photos
15h50-16h00	Coffee break

13 DECEMBER 2023 - PARALLEL SESSIONS

Sessions	Paper ID	Paper titles & Authors
<p style="text-align: center;">Session 1: Artificial Intelligence 1 Room C2.101 16h00-17h30</p> <p>Chair 1. Assoc. Prof. Roselyn A. Maaño 2. Dr. Nguyen Van Hau Secretary: Dr. Nguyen T. Mai Phuong</p>	145	A combination of Active learning and Deep learning for improving breast cancer prediction Huong Hoang Luong, Hai Thanh Nguyen and Thai-Nghe Nguyen
	25	A Novel Arm Bone Fracture Detection Using Deep Learning Huy Hoang Nguyen, Tuan Khoi Nghiem and Ngoc Minh Dang
	115	A systematic review of Artificial Intelligence in Geographic Information Systems Kim-Son Nguyen, The-Vinh Nguyen and Duc-Binh Nguyen
	107	Build an effective system for container code recognition Nong Thi Hoa and Nguyen Van Tao
<p style="text-align: center;">Session 2: Artificial Intelligence 2 Room C2.102 16h00-17h30</p> <p>Chair 1. Assoc. Prof. Bui Thu Lam 2. Dr. Vo Van Nhan Secretary: Dr. Nguyen T. Thanh Nhan</p>	126	A Real-time Crowd Density Level Detection System Dinh-Lam Pham, Thanh-Hai Nguyen, Kyong-Sook Kim, and Kwanghoon Pio Kim
	149	An Architecture for More Fine-grained Hidden Representation in Named Entity Recognition for Biomedical Texts Bui Duc Tho, Son-Ba Giang, Minh-Tien Nguyen, and Tri-Thanh Nguyen
	153	DCDynUnet: Deep Supervision Attention Context for Brain Segmentation Vo Thanh Hoang Son, Tran Nguyen Quynh Tram, Nguyen Quoc Huy, Do Nhu Tai
	14	Choosing data points to label for semi-supervised learning based on neighborhood Dinh-Minh Vu, Thanh-Son Nguyen, Trung-Nghia Phung and Trinh-Hoang Vu
<p style="text-align: center;">Session 3: Electronics Room C2.103 16h00-17h30</p> <p>Chair 1. Assoc. Prof. Nguyen Tuan Minh 2. Dr. Vu Chien Thang Secretary: Dr. Pham Thanh Nam</p>	162	A Closely Spaced Multi-Element Self-Isolated MIMO Antenna Array Tan Dao-Duc, Nguyen Sy Hiep, Duc-Nguyen Tran Viet and Huy-Hung Tran
	117	A Comparative of Positive Real Truncation and H-infinity Reduction Techniques for Model Simplification in Electrical Circuits and Power Systems Thanh-Tung Nguyen, Ngoc-Kien Vu and Huy-Du Dao
	148	A Low Noise 10-Bit 59.41dB SNR SAR ADC Using Chopper Comparator for Biomedical Applications Xuan Thanh Pham, Viet Ha Nguyen Thi, Van Thai Le, Thi Thu Huong Tran, Trung-Nghia Phung and Manh Kha Hoang
	179	Approach New Framework of Compressive Sensing Based Secret Sharing in Wireless Sensor Network: Theory and Applications Thang C. Vu, Minh T. Nguyen, Tao V. Nguyen, Quynh C. Le
<p style="text-align: center;">Session 4: Control and Automation Room C2.201 16h00-17h30</p> <p>Chair: 1. Prof. Dr. Tran Duc Tan 2. Dr. Nguyen Von Dim Secretary: Dr. Gia Thi Dinh</p>	18	A case study on the kinematics analysis of a self-stabilizing dual-wheeled mobile robot Von Dim Nguyen and Van Tung Bui
	175	A Finite-Time Recursion-based Tracking Control for Under-Actuated Autonomous Underwater Vehicles Ngo Sy Thanh Tung, Do Manh Dung, Le Xuan Hai, Phan Xuan Minh, Nguyen Duc Khoat and Hoang Duc Quynh
	135	A Reinforcement Learning Method for Control Scheme of Permanent Magnet Synchronous Motor Xuan Khanh Tran, Duy Tung Le, Duc Thuan Tran, Phuong Nam Dao
	170	An effective intelligent control strategy for the inverted pendulum system on a cart applies a hierarchical sliding mode control technique combined with an adaptive RBF neural network Minh Xuan Dinh, Do Manh Dung, Hai Xuan Le, Ngoc Thanh Pham, Dam Bao Loc and Quynh Hoang Duc

<p>Session 5: Multimedia Room C2.202 16h00-17h30</p> <p>Chair: 1. Assoc. Prof. Le Khắc Nhuong 2. Dr. Le Van Hung Secretary: Dr. Tran Quang Quy</p>	56	A Lightweight Attention Model for Face Recognition Duc-Quang Vu, Thu Hien Nguyen, Danh Vu Nguyen, Yen Quynh Nguyen, Trung-Nghia Phung, and Trang Phung T. Thu
	67	Assessment of video transmission delay from a telemetry surveillance system Nguyen Toan Thang and Dinh Xuan Lam
	142	Automatic Identification of Vietnamese Singer Voices Using Deep Learning and Data Augmentation Dao Thi Le Thuy, Chu Ba Thanh, Trinh Van Loan and Le Xuan Thanh
	2	The impact of the construction of a virtual Traditional Room on virtual tour support using digital transformation technology: A case study of Thai Nguyen High School for the Gifted Nguyen Van Huan, Nguyen Manh Hung, Nguyen Thi Hang and Truong Thi Viet Phuong
<p>Session 6: Digital Economics and Management Room C2.203 16h00-17h30</p> <p>Chair: 1. Assoc. Prof. Nguyen Long Giang 2. Dr. Nguyen Duc Hien Secretary: Dr. Tran Le Duy</p>	12	A Bibliometric and Thematic Analysis of Systematic Reviews of Artificial Intelligence in Education Vinh Nguyen The, Trung-Nghia Phung and Cuong Do Dinh
	16	A Study on Electronic Payments and Economic Growth: Evidence in Vietnam Before and During Covid-19 Pandemic Nguyen Thi Vu Khuyen
	157	BALANGAY: Navigating Innovation Through Design Thinking Approach for a Boat Reservation and Booking System Jules Vincent C. Banta, Roselyn A. Maaño, Mikaela S. Quinsanos, Mico Jhosua A. Oriola, Osias Robert O. Paderez, John Rover R. Sinag, Donabell S. Hernandez, Leah T. Salas, Nguyen Duc Binh
<p>Session 7: Mathematical Foundations in Informatics Room C2.204 16h00-17h30</p> <p>Chair: 1. Prof. Dang Quang A 2. Dr. Tran Minh Tuoc Secretary: Dr. Nguyen Dinh Dung</p>	166	Cryptocurrency Investment using the Analytic Hierarchy Process Nguyen Tran Le, Nguyen Thi Kim Lien, Do Nhu Tai
	34	Combining Local Search and Multi-objective Optimization Algorithm in Signalized Intersection Optimization Phuong Thi Mai Nguyen and Luong Huy Vu
	116	Comparative Evaluation of PRR and PODA Methods for Model Order Reduction in Electrical Circuits Thanh-Tung Nguyen, Huy-Du Dao, Ngoc-Kien Vu
	30	Data-driven narratives: Unleashing the Potential of R for Journalistic Storytelling Tran Quang Quy, Nguyen Duc Binh and Pham Chien Thang
	144	Dynamic analysis of capsbot model in liquid environment by numerical method Quoc-Huy Ngo, Ky-Thanh Ho and Van-Dam Vu
18h00-20h00	ICTA 2023 BANDQUET & NETWORKING <i>Floor 8, The King Hotel, No. 99 Bac Son St., Thai Nguyen city</i>	
14 DECEMBER 2023- PARALLEL SESSIONS		
Sessions	Paper ID	Paper Titles & Authors
<p>Session 8: Artificial Intelligence 1 Room C2.101 8h00-9h30</p> <p>Chair: 1. Assoc. Prof. Rodrigo D.Belleza Jr. 2. Dr. Nguyen Hai Minh Secretary: Dr. Tran Thi Xuan</p>	138	Building an Efficient Retriever System with Limited Resources Quang Nhat Nguyen and Huong Thanh Le
	155	Deep Learning based Coconut Fruit Maturity Classification Nhut Lam Nguyen, Ngoc Van Khanh Duong, and Hoang Duy Thien Nguyen
	52	Enhanced prediction of mRNA subcellular localization using a novel ensemble learning and hybrid approach Thi-Tuyen Nguyen, Van-Nui Nguyen, Thi-Xuan Tran, Nguyen-Quoc-Khanh Le
	85	Improved Approach for Mapping Anthropological Facial Features Based on A Convolutional Neural Network Nguyen Thu Huong, Nguyen The Long and Pham Thi Lien

<p>Session 9: Artificial Intelligence 2 Room C2.102 8h00-9h30</p> <p>Chair: 1. Prof. Dr. Kwang Hoon Pio Kim 2. Dr. Nguyen Quang Vu Secretary: Dr. Nguyen Toan Thang</p>	161	Classification of Fermentation Levels of Cacao Beans (<i>Theobroma cacao</i> L.) Using Sensing Technology and Neural Networks Rikiya E.Yamamoto, Roselyn A.Maano, James Leo C.Grimaldo, Mary Meliza V.Parcon, Ronaldo C.Maaño, Jose B.Jr. Tan, Rodrigo C.Jr. Belleza, Pedro L.Jose De Castro and Duc Binh Nguyen
	80	Application of Deep Learning Methods for Forest Intelligent Image Processing Nguyen The Long, Nguyen Thu Huong, Shmeleva Anna.G. and Pham Thi Lien
	37	Enhancing Wildfire Detection Using Semi-Supervised Fuzzy Clustering on Satellite Imagery Phung The Huan, Hoang Thi Canh, Vu Duc Thai, Do Huy Khoi and Le Truong Giang
	150	Evaluating the performance of some deep learning model for the problem of emotion recognition based on EEG signal Thuong Duong Thi Mai and Trung-Nghia Phung
<p>Session 10: Electronics Room C2.103 8h00-9h30</p> <p>Chair: 1.Prof. Dr. Tran Duc Tan 2. Dr. Dang Thai Son Secretary: Dr. Hoang Duc Quynh</p>	95	Design and Implementation of a Natural Respiratory Rate Monitoring System using Flex and Inertial Sensors on Medium-Power Microcontrollers To-Hieu Dao, Hoang Thi Hai Yen, Van-An Tran, Hoang-Dieu Vu and Duc-Nghia Tran
	143	Design of 1×4 Microstrip Patch MIMO Antenna for 5G Applications Duc-Nguyen Tran Viet, Nguyen Sy Hiep and Huy-Hung Tran
	86	GPRS Based health monitoring system A. R. Deepa, Quang-Trung Hoang, Van-Tung Bui, Duc-Tan Tran, V. Ramaswamy, C. J. Jeba Sheela, S. Chowdhury and Duc-Nghia Tran
	113	Model Reduction Techniques for Circuits: Positive Real Balancing and Stochastic Balancing Comparison Thanh-Tung Nguyen, Huy-Du Dao and Ngoc-Kien Vu
<p>Session 11: Control and Automation Room C2.201 8h00-9h30</p> <p>Chair: 1. Assoc. Prof. Nguyen Thai Son 2. Dr. Pham Thanh Nam Secretary: Dr. Dam Bao Loc</p>	07	Design and control an unmanned aerial vehicle (Quadcopter) for agricultural Hoang Duc Quynh
	160	Design and simulation of PID-based control system for UAV Quadcopter Cuong Van Nguyen, Minh Tuan Nguyen
	119	Development of traffic congestion prediction problem using Cellular Neural Network technology Vu Duc Thai, Ngo Huu Huy, Le Anh Tu, Sonexay Phanthavong
	131	Optimal design of hedge-algebras-based controller for active suspension systems with parameter uncertainty Hai-Le Bui, Tien-Duy Nguyen and Viet-Duc Le
<p>Session 12: Multimedia Room C2.202 8h00-9h30</p> <p>Chair: 1. Dr. Jose B. Tan Jr. 2. Dr. Nguyen Duc Binh Secretary: Dr. Phung The Huan</p>	124	FAVS: 3D Facial Animation according to Vietnamese Semantic Analysis Do Thi Chi, Le Son Thai, Nguyen Van Huan
	159	InstaFace: Single-view 3D Face Reconstruction with Hair Try-on Hieu Dao-Quang, Anh-Duc Lo and Chau Ma-Thi
	133	Movie prediction based on feature generation Hung Nguyen Vu Duy, Nhung Vuong Thi, Thanh Trinh
	105	Skeleton-based student activities recognition from classroom videos Phuong-Dung Nguyen, Xuan-Vuong Le, Viet-Duc Le, Huu-Linh Nguyen, Ngoc-Trang Le, Tuan-Dung Kieu, Thanh-Hai Tran, Huu-Quynh Nguyen, Thi-Lan Le

<p>Session 13: Digital Economics and Management Room C2.203 8h00-9h30</p> <p>Chair: 1. Assoc. Prof. Tran Nhuan Kien 2. Dr. Nguyen Van Hau Secretary: Dr. Vu Xuan Nam</p>	98	BPR/ISP the Effective Way for Digital Transformation in Higher Education Institutions Hoang Anh, Le Truong Giang, Hoang Minh Tuan, Trinh Thi Phuong and Phung The Huan
	130	Big data application in data management at universities in Vietnam Phan Thi Van Giang, Nguyen Thu Huong and Duong Thi Hong An
	20	Discovering User Interest in Social Media Based on Correlation Nguyen Thi Hoi and Tran Dinh Que
	36	Earnings Management in Vietnamese Family Firms: A Comparative Analysis with Non-Family Firms Huyen Thi Thanh Phan
<p>Session 14: Mathematical Foundations in Informatics Room C2.204 8h00-9h30</p> <p>Chair: 1. Prof. Dang Quang A 2. Assoc. Prof. Tran Thi Ngan Secretary: Dr. Dinh Dieu Hang</p>	3	Genetic Programming – A Preliminary Study of Knowledge Transfer in Mutation Pham Thi Thuong, Hoang Thi Canh, Nguyen Thi Dung, Nguyen Thu Phuong, Nguyen Lan Oanh
	168	Improvement of spectral clustering method in social network community detection Nguyen Hien Trinh and Cap Thanh Tung
	93	Probable characteristics of multi-channel queuing systems with “Impatient” and “Patient” claims Tran Quang Quy, Ngo Huu Huy and Nguyen Vu Hai
	90	Processing overlapping communities using the Gradient Descent optimization method Nguyen Hien Trinh and Cap Thanh Tung
9h30-9h45	COFFEE BREAK & NETWORKING	
<p>Session 15: Artificial Intelligence 1 Room C2.101 9h45-11h15</p> <p>Chair: 1. Assoc. Prof. Le Khac Nhung 2. Dr. Nguyen The Vinh Secretary: Dr. Nguyen Tuan Anh</p>	88	Intrusion Detection System Using Semi-Supervised Learning with Hybrid Labeling Techniques Ren-Hung Hwang, Tzu-Hao Tsai and Jia-You Lin
	139	Monitor respiration rate and sleep positions using multi-task learning Hoang-Dieu Vu, Dinh-Hieu Le, Khanh-Ly Can, Hieu Dao-To, Dinh-Dat Pham, Sy-Hiep Nguyen, Ha-My Nguyen, Duc-Nghia Tran
	79	Predicting drug-disease associations based on integrated similarities and weighted bi-level network Van Tinh Nguyen, Huy Vu Duc, Yen Vu Minh and Lan Nguyen Thi Huong
<p>Session 16: Artificial Intelligence 2 Room C2.102 9h45-11h15</p> <p>Chair: 1. Assoc. Prof. Nguyen Gia Nhu 2. Dr. Nguyen Van Nui Secretary: Dr. Ha Thi Thanh</p>	169	Feature reduction for interpretability of neuro-fuzzy classifier Thanh-Tung Nguyen, Dang Thi Hien and TuanLinh Nguyen
	96	Improved Accuracy of Path System on Creating Intelligence Base Don T Tran, Vinh Q Nguyen, Cuong V Nguyen, Dong LT Tran, Hoang T Tran, Anh N.D
	102	The Vehicle Routing Problem with Drones for Fresh Agricultural Products Quang Huy Vuong, Trung-Nghia Phung, and Minh-Trien Pham
	172	ViT-SigNet: Combining Deep CNN and Vision Transformer for Enhanced Signature Verification Ton Do Thanh, Chi Thanh Nguyen, Nhu Hai Phung, Nguyen Hai Minh, Van-Hau Nguyen
<p>Session 17: Electronics Room C2.103 9h45-11h15</p> <p>Chair: 1. Dr. Pham Duc Long 2. Dr. Bui Van Tung Secretary: Ngo Huu Huy</p>	32	Non-invasive Feature Selection for Intrusion Detection Systems in the Internet of Things Duc Trung Tran, Nguyen Canh Minh, Dang Hai Hoang, Nguyen Thanh Trung, Nguyen Van Khoi and Duc-Tan Tran
	147	Piggybacked based collaborative resource selection in C-V2X Malik Muhammad Saad, Muhammad Ashar Tariq, Mahnoor Ajmal, Sunghyun Kim and Dongkyun Kim
	29	Speeding up SIFT for Faster Feature-Based UAV Visual Localization Ngo Van Quan, Duong Dinh Luyen, Phan Huy Anh, Pham Thi Hoai Thu, Nguyen Chi Thanh, Vu Duc Thai
	120	The Using of Real Part Component to Enhance Performance of MVDR Beamformer Quan Trong The and Ha Thi Hien

<p>Session 18: Control and Automation Room C2.201 9h45-11h15</p> <p>Chair: 1. Dr. Nguyen Von Dim 3. Dr. Vu Chien Thang Secretary: Dr. Vu Huy Luong</p>	75	Optimizing cooling loads, taking into account compensation costs for users, temperature factors, and distributed energy sources Hong Anh Pham Thi, Mai DoThi and Thu Phuong Le Thi
	69	Path tracking control approach and processing lumped disturbances for AGV in recent years: an overview Thi Mai Do and Hoai Nam Nguyen
	70	Radial Basis Function Neural Network Based Fractional Order Sliding Mode Control For Planar Flexible-Joint Robot 2-Dof Nguyen Thi Thu Hien and Nguyen Duy Minh
	146	Stabilizing control for an inverted eccentric pendulum system Dinh Gia Thi and Hao Nguyen Dang
<p>Session 19: Multimedia Room C2.202 9h45-11h15</p> <p>Chair: 1. Assoc. Prof. Roselyn A. Maaño 2. Dr. Dinh Xuan Lam Secretary: Dr. Nguyen Quoc Khanh</p>	47	Timbre and height differences in self-perceived own voices Shota Morita, Teruki Toya and Masashi Unoki
	55	TNUE-Fight Detection: A New Challenge Benchmark for Fighting Recognition Duc-Quang Vu, Thu Hien Nguyen, Mai Nguyen, Bao Yen Nguyen, Trung-Nghia Phung, and Trang Phung T.Thu
	38	Using Information Technology to Identify Fruit Flies in Agriculture Pham Duc Long
	57	Voice Separation using Multi Learning on Squash-norm Embedding Matrix and Mask Ha Minh Tan, Duc-Quang Vu, Duyen Nguyen Thi, and Trang Phung T. Thu
<p>Session 20: Digital Economics and Management Room C2.203 9h45-11h15</p> <p>Chair: 1. Dr. Pham Dinh Lam 2. Dr. Tran Quang Quy Secretary: Dr. Nguyen Thi Hang</p>	134	Exploring Correlations Between Personality Traits and Criminal Attitudes Son Hong Nguyen and Binh Thanh Nguyen and Bao Chung Hoang and Binh Ton That and Huy Truong Dinh
	24	Rapid Synergy Realisation in Post-Merger Integration through Targeted Transition Architectures Lars Malmqvist
	108	Research for building virtual models online visit Hung Vuong museum Nguyen Quoc Khanh, Nguyen Van Huan and Thipphavongxay Anousit
	31	Unveiling the Influence of Perceived Limitations: Exploring Tourist Acceptance and Usage Intentions towards Virtual Tourism in Ho Chi Minh City Tran Tuyen and Nguyen Thi Van Hanh
<p>Session 21: Mathematical Foundations in Informatics Room C2.204 9h45-11h15</p> <p>Chair: 1. Assoc. Prof. Pham Nguyen Khang 2. Dr. Nguyen Kim Tuan Secretary: Dr. Ngo Manh Tuong</p>	35	Scheduling Production of High Economic Values Crops in Plant Factory Nguyen Dinh Dai, Pham Chau Long, Trung-Nghia Phung, Minh-Trien Pham, Khanh Le Nguyen and Duc-Dong Do
	71	Sixth order numerical method for solving second order nonlinear boundary value problem Dang Quang A and Truong Ha Hai
	50	Solving the Dirichlet problem for fully sixth order nonlinear differential equation Nguyen Thanh Huong and Vu Vinh Quang
	100	The Minmax Regret Longest Path of a Tree with Interval Edge Lengths Tran Quang Quy, Nguyen Ha Cong Ly, Do Dinh Cuong and Huy Minh Le

PARALLEL SESSIONS OVERVIEW

Venue	Parallel Sessions Overview		
	Sessions 1-7 16h00-15h30 13 December 2023	Sessions 8-14 8h00-9h30 14 December 2023	Sessions 15-21 9h45-11h15 14 December 2023
Room 1 (C2.101)	<p>Session 1: Artificial Intelligence 1</p> <p>Chair: 1. Assoc. Prof. Roselyn A. Maaño 2. Dr. Nguyen Van Hau Secretary: Dr. Nguyen T. Mai Phuong</p>	<p>Session 8: Artificial Intelligence 1</p> <p>Chair: 1. Assoc. Prof. Rodrigo D. Belleza Jr. 2. Dr. Nguyen Hai Minh Secretary: Dr. Tran Thi Xuan</p>	<p>Session 15: Artificial Intelligence 1</p> <p>Chair: 1. Assoc. Prof. Le Khac Nhung 2. Dr. Nguyen The Vinh Secretary: Dr. Nguyen Tuan Anh</p>
Room 2 (C2.102)	<p>Session 2: Artificial Intelligence 2</p> <p>Chair: 1. Assoc. Prof. Bui Thu Lam 2. Dr. Vo Van Nhan Secretary: Dr. Nguyen T. Thanh Nhan</p>	<p>Session 9: Artificial Intelligence 2</p> <p>Chair: 1. Prof. Dr. Kwang Hoon Pio Kim 2. Dr. Nguyen Quang Vu Secretary: Dr. Nguyen Toan Thang</p>	<p>Session 16: Artificial Intelligence 2</p> <p>Chair: 1. Assoc. Prof. Nguyen Gia Nhu 2. Dr. Nguyen Van Nui Secretary: Dr. Ha Thi Thanh</p>
Room 3 (C2.103)	<p>Session 3: Electronics</p> <p>Chair: 1. Assoc. Prof. Nguyen Tuan Minh 2. Dr. Vu Chien Thang Secretary: Dr. Pham Thanh Nam</p>	<p>Session 10: Electronics</p> <p>Chair: 1. Prof. Dr. Tran Duc Tan 2. Dr. Dang Thai Son Secretary: Dr. Hoang Duc Quynh</p>	<p>Session 17: Electronics</p> <p>Chair: 1. Dr. Pham Duc Long 2. Dr. Bui Van Tung Secretary: Ngo Huu Huy</p>
Room 4 (C2.201)	<p>Session 4: Control and Automation</p> <p>Chair: 1. Prof. Dr. Tran Duc Tan 2. Dr. Nguyen Von Dim Secretary: Dr. Gia Thi Dinh</p>	<p>Session 11: Control and Automation</p> <p>Chair: 1. Assoc. Prof. Nguyen Thai Son 2. Dr. Pham Thanh Nam Secretary: Dr. Dam Bao Loc</p>	<p>Session 18: Control and Automation</p> <p>Chair: 1. Dr. Nguyen Von Dim 3. Dr. Vu Chien Thang Secretary: Dr. Vu Huy Luong</p>
Room 5 (C2.202)	<p>Session 5: Multimedia</p> <p>Chair: 1. Assoc. Prof. Le Khac Nhung 2. Dr. Le Van Hung Secretary: Dr. Tran Quang Quy</p>	<p>Session 12: Multimedia</p> <p>Chair: 1. Dr. Jose B. Tan Jr. 2. Dr. Nguyen Duc Binh Secretary: Dr. Phung The Huan</p>	<p>Session 19: Multimedia</p> <p>Chair: 1. Assoc. Prof. Roselyn A. Maaño 2. Dr. Dinh Xuan Lam Secretary: Dr. Nguyen Quoc Khanh</p>
Room 6 (C2.203)	<p>Session 6: Digital Economics and Management</p> <p>Chair: 1. Assoc. Prof. Nguyen Long Giang 2. Dr. Nguyen Duc Hien Secretary: Dr. Tran Le Duy</p>	<p>Session 13: Digital Economics and Management</p> <p>Chair: 1. Assoc. Prof. Tran Nhuan Kien 2. Dr. Nguyen Van Hau Secretary: Dr. Vu Xuan Nam</p>	<p>Session 20: Digital Economics and Management</p> <p>Chair: 1. Dr. Pham Dinh Lam 2. Dr. Tran Quang Quy Secretary: Dr. Nguyen Thi Hang</p>
Room 7 (C2.204)	<p>Session 7: Mathematical Foundations in Informatics</p> <p>Chair: 1. Prof. Dang Quang A 2. Dr. Tran Minh Tuoc Secretary: Dr. Nguyen Dinh Dung</p>	<p>Session 14: Mathematical Foundations in Informatics</p> <p>Chair: 1. Prof. Dang Quang A 2. Assoc. Prof. Tran Thi Ngan Secretary: Dr. Dinh Dieu Hang</p>	<p>Session 21: Mathematical Foundations in Informatics</p> <p>Chair: 1. Assoc. Prof. Pham Nguyen Khang 2. Dr. Nguyen Kim Tuan Secretary: Dr. Ngo Manh Tuong</p>

CONTACT INFORMATION OF TECHNICAL SUPPORTERS

No	Venue	Sessions	Technical supporters
1	Multi Purpose Hall	Plenary Session & Keynote Speeches	Person-in-charge: Tran Duy Minh Email: tdminh@ictu.edu.vn Mobile: 0374.473.888
2	Room C2.101	Sessions 1,8,15: Artificial Intelligence 1	Person-in-charge: Nguyen An Khanh Email: nakhanh@ictu.edu.vn Mobile: 0989.166.111
3	Room C2.102	Sessions 2,9,16: Artificial Intelligence 2	Person-in-charge: Nguyen An Khanh Email: nakhanh@ictu.edu.vn Mobile: 0989.166.111
4	Room C2.103	Sessions 3,10,17: Electronics	Person-in-charge: Nguyen An Khanh Email: nakhanh@ictu.edu.vn Mobile: 0989.166.111
5	Room C2.201	Sessions 4,11,18: Control and Automation	Person-in-charge: Trinh Van Giac Email: tvgiac@ictu.edu.vn Mobile: 0984.096.114
6	Room C2.202	Sessions 5,12,19: Multimedia	Person-in-charge: Trinh Van Giac Email: tvgiac@ictu.edu.vn Mobile: 0984.096.114
7	Room C2.203	Sessions 6,13,20: Digital Economics and Management	Person-in-charge: Tran Ngoc An Email: tnan@ictu.edu.vn Mobile: 0965.957.333
8	Room C2.204	Sessions 7,14,21: Mathematical Foundations in Informatics	Person-in-charge: Tran Ngoc An Email: tnan@ictu.edu.vn Mobile: 0965.957.333

NOTES FOR PRESENTERS

- One presentation's maximum time length is 20 minutes, including Q&A.
- Presenters should be in the session room at least 10 minutes in advance. Please contact ICTA 2023 Organizers at ictacontact@ictu.edu.vn or call hotline 0904.101.008 (Assoc. Prof. Dr. Huan)/ 0963.810.122 (Ms. An) if you need any assistance.
- Only listed authors can present their papers. Any presenters not on the list of authors cannot present in any circumstances. The session chair may request the author's identification if necessary.
- Slides for presentation should be submitted to the technical supporters in each session **before 6th December 2023**.
- To download the conference documents, please scan the QR:

