IIH-MSP 2021 Conference Schedule (Virtual)

Times are expressed in TST (GMT+8).

October 29th, 2021		
09:30 | 09:40	**Opening**	
09:40 | 10:30	**Keynote Speech (I):** **Applying De-Clustering Concept to Information Hiding** **by Professor Chin-Chen Chang**	
10:30 | 10:50	**Coffee Break**	
10:50 | 12:10	**Session A01** Biomedical System Design and Applications	**Session A02** New Energy Vehicle Design and Application
12:10 | 13:50	**Lunch**	
13:50 | 15:10	**Session A03** Algorithm Developments and Applications	**Session A04** Recent Advance in Multimedia Signal Processing Techniques
15:10 | 15:30	**Coffee Break**	
15:30 | 16:20	**Keynote Speech (I I):** **Explainable AI for multimedia processing** **by Professor Vaclav Snasel**	
16:30	**Dinner**	

IIH-MSP 2021 Conference Schedule (Virtual)

Times are expressed in TST (GMT+8).

October 30th, 2021		
09:30 | 10:20	**Keynote Speech (I I I):** Improving Metaheuristic Algorithms Using Information Feedback Model by Professor Gai-Ge Wang	
10:20 | 10:40	**Coffee Break**	
10:40 | 12:00	**Session B01** Soft Computing Applications, Multimedia Signal Processing, and Hardware Design (I)	**Session B02** Emerging Techniques and Its Applications
12:00 | 13:50	**Lunch**	
13:50 | 15:10	**Session B03** Soft Computing Applications, Multimedia Signal Processing, and Hardware Design (II)	**Session B04** Wearable Computing, IOT Privacy and Information Security
15:10 | 15:30	**Coffee Break**	
15:30 | 16:50	**Session B05** Advances in Speech and Language Processing	**Session B06** Intelligent Distribution Systems and Applications
17:00	**Dinner**	

IIH-MSP 2021 Conference Schedule

Times are expressed in TST (GMT+8).

October 31th, 2021		
09:00 | 10:20	**Session C01** Multimedia Security and Its Applications	**Session C02** Massive Image/Video Compression and Transmission for Emerging Networks
10:20 | 10:40	**Coffee Break**	
10:40 | 12:00	**Session C03** Applications of Image Encoding and Rendering	
12:00	**Closing Remarks**	

Session A01: Biomedical System Design and Applications

October 29th (Fri.), 10:50~12:10

Virtual Platform

Chairs:

Paper ID.: IIH-MSP-2021-0008

Paper Title: Variational Autoencoder based Deep Neural Network for Coronary Heart Disease Risk Prediction

Author(s): Tsatsral Amarbayasgalan, Kwang Ho Park, Khishigsuren Davagdorj, Keun Ho Ryu, and Nipon Theera-Umpon

Paper ID.: IIH-MSP-2021-0119

Paper Title: Establishment and Simulation of Forest Fire Spreading Model Based on Cellular Automata?

Author(s): Liang Liu, Langyi Hou, Bohu Liu, Fuquan Zhang, Qiang Gao, Shaobo Zhong, Huijun Fu, and Yifan Shi

Paper ID.: IIH-MSP-2021-0308

Paper Title: Face Virtual Sample Generation with 3D Model Based on Generative Adversarial Networks

Author(s): Hongtao yin, shengwei meng, and yu han

Paper ID.: IIH-MSP-2021-0382

Paper Title: RGB Image Guided Depth Hole-Filling Using Bidirectional Attention Mechenism

Author(s): Anran Chen, Yao Zhao, Chunyu Lin, Lingzhi He, Kang Liao, and Shujuan Huang

Paper ID.: IIH-MSP-2021-0456

Paper Title: An Enhanced Bats Algorithm for Optimization Thresholds in Medical Image Segmentation

Author(s): Thi-Kien Dao, Ngoc-Thanh Vu, Thi-Xuan-Huong Nguyen, and Trong-The Nguyen

Paper ID.: IIH-MSP-2021-0470

Paper Title: Early Detection of Melanoma Skin Cancer using Image Processing and Deep Learning

Author(s): Shah Syed Asif Raza, Israr Ahmed, Ghulam Mujtaba, Moon-Hyun Kim, Cheonyong Kim, and Seo-Young Noh

Session A02: New Energy Vehicle Design and Application

October 29th (Fri.), 10:50~12:10
Virtual Platform
Chairs:

Paper ID.: IIH-MSP-2021-0044
Paper Title: Design analysis and optimization of the anti-collision structure of the four-wheel electric scooter
Author(s): Wen-Zhi Wang, Yijui Chiu, and Liang-Jian Zhan

Paper ID.: IIH-MSP-2021-0048
Paper Title: Design and optimization of electric vehicle seat
Author(s): Bi Li, Ji-Ming Yi, Yijui Chiu, and Zhon-Zhen Xie

Paper ID.: IIH-MSP-2021-0053
Paper Title: Design and optimization of spring in damping system of new energy electric vehicle
Author(s): Bi Li, Yijui Chiu, Ji-Ming Yi, and Cheng-Yang Qiu

Paper ID.: IIH-MSP-2021-0059
Paper Title: Simulation analysis and optimization of body structure and strength of the four-wheel low-speed electric vehicle
Author(s): Wen-Zhi Wang, Yijui Chiu, and Zhi-Peng Gan

Paper ID.: IIH-MSP-2021-0123
Paper Title: Expressway Traffic Speed Prediction Method Based on CNN_Bi-LSTM model via ETC Data
Author(s): JunShan Tian

Session A03: Algorithm Developments and Applications

October 29th (Fri.), 13:50~15:10

Virtual Platform

Chairs:

Paper ID.: IIH-MSP-2021-0018

Paper Title: Simulation and analysis of steering mechanical characteristics between tire and soil

Author(s): Zi-Hao Long, Ding Chen, Jing Sheng, Xiu-Jing Gao, and Peng-Fei Sun

Paper ID.: IIH-MSP-2021-0062

Paper Title: Small object detection based on multi-source data learning fusion network

Author(s): Lei Xu, Hejun Jiang, Huanyu Liu, Yi Yang, and Yanyan Liu

Paper ID.: IIH-MSP-2021-0218

Paper Title: An Expressway Congestion Detection Algorithm based on ETC Data Mining

Author(s): Xiang Yu

Paper ID.: IIH-MSP-2021-0224

Paper Title: Study on the Method of Adversarial Example Attack based on MI-FGSM

Author(s): Guanqiao Mao, Lu Li, Qingyu Wang, and Junbao Li

Paper ID.: IIH-MSP-2021-0402

Paper Title: An Enhanced Harmony Search Algorithm for Cascade Reservoirs Planning

Author(s): Thi-Kien Dao, Thi-Xuan-Huong Nguyen, Thi-Xuan-Huong Vu, and Trong-The Nguyen

Paper ID.: IIH-MSP-2021-0408

Paper Title: Hybrid Gray Wolf Optimization and Cuckoo Search Algorithm Based on the Taguchi Theory

Author(s): Wang Zhisheng

Session A04: Recent Advance in Multimedia Signal Processing Techniques
October 29th (Fri.), 13:50~15:10
Virtual Platform
Chairs:

Paper ID.: IIH-MSP-2021-0091
Paper Title: Five Phases Algorithm for Global Optimization
Author(s): Xiaopeng Wang

Paper ID.: IIH-MSP-2021-0094
Paper Title: An Ultra-Fast Static Hand Gesture Recognition Method for Finger-Guessing Robots
Author(s): Jianglei Gong, Nannan Liao, Cheng Li,Chaoyan Zhang, and Baolong Guo

Paper ID.: IIH-MSP-2021-0097
Paper Title: Simple Linear Iterative Clustering with Efficiency
Author(s): Nannan Liao, Hui Liu, Cheng Li, Xia Ren, and Baolong Guo

Paper ID.: IIH-MSP-2021-0150
Paper Title: K-PPE: A Variant Phasmatodea Population Evolution Algorithm for Global Optimization
Author(s): Jeng-Shyang Pan, Pei Hu, Shu-Chuan Chu, and Vaclav Snasel

Paper ID.: IIH-MSP 2021-0504
Paper Title: A Study on Stock-Recommendation Based on Supply-Chain Dependence Information Analysis
Author(s): Yuan-Cheng Cheng, Mong-Fong Horng, Yu-Peng Chiang, Wei-Hsiang Wang, Chun-Chih Lo, and Chin-Shiuh Shieh

Session B01: Soft Computing Applications, Multimedia Signal Processing, and Hardware Design (I)

October 30th (Sat.), 10:40~12:00
Virtual Platform
Chairs:
To be determined

Paper ID.: IIH-MSP-2021-0140
Paper Title: Optimal reliability density function based on entropy index under single parameter and two parameters
Author(s): Chaofan xie, De-Bao Zhang, and Fuquan Zhang

Paper ID.: IIH-MSP-2021-0163
Paper Title: Occluded and tiny face detection with   deep and shallow features   fusion and compensation
Author(s): Zhuofan Xu, Huihui Bai, Jimin Xiao, Feiran Jie, and Yao Zhao

Paper ID.: IIH-MSP-2021-0175
Paper Title: Feature-aware Network Based on Upper Triangular Interaction for Single Shot Detector
Author(s): Xiang Dong, Feng Li, Huihui Bai, and Yao Zhao

Paper ID.: IIH-MSP-2021-0200
Paper Title: Transformer fault identification method based on improved Roberts algorithm
Author(s): HUANG Xuhong, and ZHAO Nan

Paper ID.: IIH-MSP-2021-0215
Paper Title: Video Surveillance System of Substation Based on AdaBoost Pedestrian Anti-Misjudgment Algorithm
Author(s): HUANG Xuhong, TANG Shengping, ZHENG Shang, and ZHAO Nan

Session B02: Emerging Techniques and Its Applications

October 30th (Sat.), 10:40~12:00

Virtual Platform

Chairs:

To be determined

Paper ID.: IIH-MSP-2021-0205

Paper Title: A Method for Extracting Solar Cell Parameters Based on Phasmatodea Population Evolution Algorithm

Author(s): Ai-Qing Tian, A. H. Liang, Shu-Chuan Chu, Lin Xu, and Jeng-Shyang Pan

Paper ID.: IIH-MSP-2021-0228

Paper Title: A New PPE Algorithm Based On Parallel Communication Strategy

Author(s): Lu-Lu Liang, Zhi-Gang Du, Chin-Shiuh Shieh, Chia-Cheng Hu, Shu-Chuan Chu, and Qing Feng

Paper ID.: IIH-MSP-2021-0291

Paper Title: Unscented Kalman Filter for UAV Real-time Localizating Dynamic Target on the Ground

Author(s): Xuyang Zhou, Wei Sun, Ruofei He, and Hongjuan Liu

Paper ID.: IIH-MSP-2021-0297

Paper Title: A Novel Fish Migration Optimization with QUasi-Affine TRansformation Evolutionary for Numerical Optimization and Application

Author(s): Ru-Yu Wang, Xiaopeng Wang, Hong-Mei Yang, Shu-Chuan Chu, and Jeng-Shyang Pan

Paper ID.: IIH-MSP-2021-0358

Paper Title: A Fully Restored Quantum Progressive Visual Secret Sharing Scheme

Author(s): Tongtong Zhu

Session B03: Soft Computing Applications, Multimedia Signal Processing, and Hardware Design (II)

October 30th (Sat.), 13:50~15:10
Virtual Platform
Chairs:
To be determined

Paper ID.: IIH-MSP-2021-0231
Paper Title: Virtual Design of Chinese Theatre Arts in Augmented Reality Media System
Author(s): Yihang Du, Yan Pei, Ke Niu, and Lijun Wang

Paper ID.: IIH-MSP-2021-0234
Paper Title: Binary Fish Migration Optimization for Feature Selection using Time-Varying Transfer Function
Author(s): Zhi-Chao Dou, Zhongjie Zhuang, Ling-Ping Kong, Jeng-Shyang Pan, and Shu-Chuan Chu

Paper ID.: IIH-MSP-2021-0265
Paper Title: A PHR sharing model based on Tangle and PRE
Author(s): Xiaofeng Xue, Shuzhe Li, Siyu Liu, and Qiong Li

Paper ID.: IIH-MSP-2021-0396
Paper Title: Effects of printing temperature and filling percentage on the tensile behavior of fused deposition molding technology components
Author(s): Ming-Hsien Hsueh, JuiFang Chang, Chao-Jung Lai, Chieh-Yu Pan, Wen-Chen Huang, and Shi-Hao Wang

Paper ID.: IIH-MSP-2021-0487
Paper Title: Dual image reversible information hiding scheme using staggered turtle shells
Author(s): Yu-Yun Ye, Jau-Ji Shen, and Chin-Feng Lee

Session B04: Wearable Computing, IOT Privacy and Information Security

October 30th (Sat.), 13:50~15:10

Virtual Platform

Chairs:

To be determined

Paper ID.: IIH-MSP-2021-0197

Paper Title: A Dynamic Texture Classification and Recognition Method Based on Complex Network Theory

Author(s): Zhaobo Liu, and Yulong qiao

Paper ID.: IIH-MSP-2021-0268

Paper Title: A Novel Motor Task Classification Scheme in Magnetoencephalography based on CNN

Author(s): Fan Yongdong, Zhou Tong, and Li Qiong

Paper ID.: IIH-MSP-2021-0276

Paper Title: Cooperative Search of UAV Formation Guided by Probability Graph

Author(s): Tianye Sun, Wei Sun, and Jianjun Wu

Paper ID.: IIH-MSP-2021-0316

Paper Title: Deep Learning-based Helmet Wearing Detection for Safety Surveillance

Author(s): Jean Bosco Ndungutse, Rui Xu, Gilbert Shyirambere, Fatana Jafari, and Shi-Jian Liu

Paper ID.: IIH-MSP 2021-0498

Paper Title: An IMU-based Approach to High Accuracy Real-time Activity Recognition of Aerobic Boxing

Author(s): Jun-Lin Chen, Chin-Shiuh Shieh, Mong-Fong Horng, and Chun-Chih Lo

Session B05: Advances in Speech and Language Processing

October 30th (Sat.), 15:30~16:50

Virtual Platform

Chairs:

To be determined

Paper ID.: IIH-MSP-2021-0132

Paper Title: How consumers??lending knowledge and self-efficacy drive their intention: A model of TAM within information asymmetric condition

Author(s): Runfa Li, Qinlin Zhang, and TSAIFA YEN

Paper ID.: IIH-MSP-2021-0212

Paper Title: Haptic Music Immersive System

Author(s): Yang zhang, Di li, and Hongyang yu

Paper ID.: IIH-MSP-2021-0259

Paper Title: Speech Manipulation Detection Method Using Speech Fingerprints and Timestamp Data

Author(s): Kota Muroi, and Kazuhiro Kondo

Paper ID.: IIH-MSP-2021-0319

Paper Title: Pattern Matching Method for Q&A Information Retrieval System

Author(s): Tiehua Zhou, Yuan Li, Yifan Zhang , and Ling Wang

Session B06: Intelligent Distribution Systems and Applications
October 30th (Sat.), 15:30~16:50
Virtual Platform
Chairs:
To be determined

Paper ID.: IIH-MSP-2021-0082
Paper Title: Design and fault research of relay protection for shore power
Author(s): LV Zhaorui, Meng Qingpu, Huo Fuguang, Teng Song, Ding Zushan, Gu Tun,Cao Chuang, and Wu Jie

Paper ID.: IIH-MSP-2021-0113
Paper Title: Perceptual Hashing Based on Salient Region and NMF
Author(s): Xujun wu, Chen cui, and shen wang

Paper ID.: IIH-MSP-2021-0323
Paper Title: Research on Evaluation Method of Network Vulnerability in Power Monitoring System
Author(s): Kexiang Qian, Minghui Jin, Daojuan Zhang, Fei Xiao, and Peng Zhang

Paper ID.: IIH-MSP-2021-0474
Paper Title: Bin reservation based on IVPO reversible data hiding using smoothness mode selection strategy
Author(s): Chin-Feng Lee, Jau-Ji Shen, and Zong-Ye Lin

Session C01: Multimedia Security and Its Applications

October 31th (Sun.), 09:00~10:20

Virtual Platform

Chairs:

Paper ID.: IIH-MSP-2021-0208

Paper Title: An Image Encryption method based on Logistic mapping and Phasmatodea Population Evolution algorithm

Author(s): Xiao-xue Sun, Pei-Cheng Song, Chin-Shiuh Shieh, Pei-Wei Tsai, and Jeng-Shyang Pan

Paper ID.: IIH-MSP-2021-0283

Paper Title: Design of encryption system based on state machine optimization scheme and FPGA implementation

Author(s): Yerui Guang

Paper ID.: IIH-MSP-2021-0347

Paper Title: Reversible data hiding based on multiple strategies

Author(s): Tiancong Zhang

Paper ID.: IIH-MSP-2021-0480

Paper Title: Hiding scheme based on improved reduced difference expansion in multi-block shape

Author(s): Chin-Feng Lee, Jau-Ji Shen, and Chin-Yung Wu

Session C02: Massive Image/Video Compression and Transmission for Emerging Networks

October 31th (Sun.), 09:00~10:20
Virtual Platform
Chairs:
To be determined

Paper ID.: IIH-MSP-2021-0250
Paper Title: ResRnnNet: Learning to Reconstruct the 3D Room Layout from a Single RGB Panorama
Author(s): Shaonan Zhao, and Wei Li

Paper ID.: IIH-MSP-2021-0343
Paper Title: The Clustering Algorithm Based on Improved Antlion Optimization Algorithm with K-means Concepts
Author(s): Feng Qing

Paper ID.: IIH-MSP-2021-0366
Paper Title: Construction of Interface Evaluation System in Internet-connected Vehicle Oriented to Automation Trust Calibration
Author(s): Du Yihang, Niu Ke, and Sun Chao

Paper ID.: IIH-MSP-2021-0447
Paper Title: Multi-Strategy Parallel Phasmatodea Population Evolution Algorithm for Public Transport Scheduling
Author(s): Zhu Yunxiang, and Yan Fengting

Paper ID.: IIH-MSP-2021-0451
Paper Title: An Improved Ants Colony Optimization for Mobile Robot Path Planning
Author(s): Trong-The Nguyen, Trinh-Dong Nguyen, Shu-Chuan Chu, and Thi-Kien Dao

Session C03: Applications of Image Encoding and Rendering

October 31th (Sun.), 10:40~12:00

Virtual Platform

Chairs:

Paper ID.: IIH-MSP-2021-0254

Paper Title: Applying Image Processing Technology to Estimate Vehicle Speed

Author(s): Ming-Sung Chiu, Tung-Ming Liang, Yung-Cheng Lo, Ming-Tsung Yeh, Chao-Hsing Hsu, and Yi-Nung Chung

Paper ID.: IIH-MSP-2021-0388

Paper Title: Optimal Design of an Ecological Alarm Display for Automatic Train Supervision System

Author(s): Ke Niu, Yihang Du, Chenxu Niu, and Panke Li

Paper ID.: IIH-MSP-2021-0464

Paper Title: A STUDY ON VEHICLE EXHAUST EMISSION DETECTION SYSTEM USING YOLOV4 AND AOD-NET IMAGE DEFOGGING TECHNOLOGY

Author(s): Shi-Huang Chen, and Chuan-Sheng Hung

Paper ID.: IIH-MSP-2021-0483

Paper Title: Improved dynamic embedding scheme with adaptive pixel replacement

Author(s): Chin-Feng Lee, Jau-Ji Shen, and Yun-Chin Tsai

Paper ID.: IIH-MSP-2021-0490

Paper Title: An Estimation of distribution algorithm for Puzzle Reconstruction Problem

Author(s): Bin Qin, and Shih-Pang Tseng