

Schedule Booklet

CSCI
2018

Dec 13-15
Las Vegas, Nevada, USA

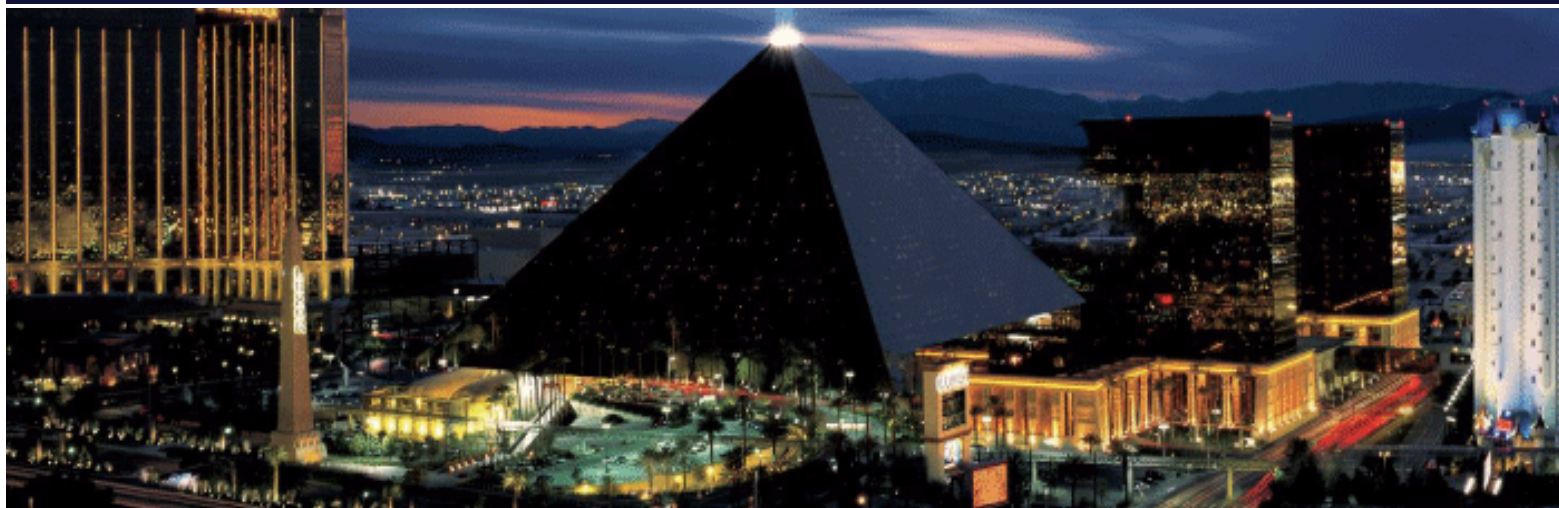
5th Annual Conference on
Computational Science &
Computational Intelligence

Editors

Hamid R. Arabnia

Leonidas Deligiannidis, Fernando G. Tinetti

Quoc-Nam Tran



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CSCI 2018 CONFERENCE SCHEDULE

The 2018 International Conference on Computational Science and Computational Intelligence

<https://americancse.org/events/csci2018>

December 13-15, 2018

Luxor (an MGM Resorts International), 3900 Las Vegas Blvd South,
Las Vegas, Nevada 89119, USA

Note that the title of presentations and authors' names that appear in the schedule below were extracted from the papers that were submitted to the EVALUATION web site. The official published proceedings/book will have any and all changes/revisions that the authors may have done to the title and/or authors lists in the final version of their manuscripts.

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DECEMBER 14, 2018

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CSCI 2018 CONFERENCE SCHEDULE

The 2018 International Conference on Computational Science and Computational Intelligence

<https://americancse.org/events/csci2018>

December 13-15, 2018

Luxor (an MGM Resorts International), 3900 Las Vegas Blvd South,
Las Vegas, Nevada 89119, USA

December 12

04:00 - 07:00pm: REGISTRATION
(LOCATION: Lotus Ballroom 1)

December 13

7:00am - 5:00pm: REGISTRATION
(LOCATION: Lotus Ballroom 1)

08:40 - 09:00am: CSCI'18 OPENING REMARKS - December 13, 2018, Thursday:
CSCI 2018 Steering Committee representative,
Prof. Hamid R. Arabnia
Department of Computer Science, University of Georgia, USA;
Editor-in-Chief, The Journal of Supercomputing (Springer);
Editor, Transactions of Computational Science & Computational
Intelligence (Springer)
(LOCATION: Galleria B-C)

09:05 - 10:05am: CONFERENCE KEYNOTE LECTURE - December 13, 2018, Thursday:
INDUSTRIAL ARTIFICIAL INTELLIGENCE - THE DRIVING FORCE OF
PREDICTIVE MAINTENANCE
Prof. Diego Galar
Professor & Former Director of Academic Innovation and Subsequently
Pro-Vice-Chancellor; Division of O&M Engineering; Lulea University
of Technology, Sweden; Head of Maintenance & Reliability, Tecnalia
(LOCATION: Galleria B-C)

10:20 - 10:40am: BREAK (Lotus Ballroom 1)

DECEMBER 13, 2018

THERE ARE THREE SETS OF CONCURRENT SESSIONS FOR THE REST OF December 13, 2018;
SCHEDULED IN CONFERENCE ROOMS: Galleria A, Galleria B, and Galleria C with
Poster Session in Lotus Ballroom 1.

-----> SESSIONS SCHEDULED IN CONFERENCE ROOM Galleria A - DECEMBER 13 <-----

- SESSION 1A-ISSE: SYMPOSIUM ON SOFTWARE ENGINEERING (CSCI-ISSE)**
Co-Chairs: Prof. Ron Coleman* and Prof. Jeong Yang**
*Marist College, USA;
**Computing and Cyber Security, Texas A&M
University-San Antonio, Texas, USA
December 13, 2018 (Thursday); 10:40am - 12:20pm
(LOCATION: Galleria A)
- 10:40 - 11:00am: Revealing the Unobvious Social Norms and Traditional Development
Fantasies that Impede Agile Adoption
John Ryskowski
JFR Consulting, Manhattan Beach, California, USA
- 11:00 - 11:20am: Beauty and Maintainability of Code
Ron Coleman
Computer Science Department, Marist College, Poughkeepsie,
New York, USA
- 11:20 - 11:40am: Source Code Analysis for Secure Programming Practices
Jeong Yang, Christian Barrientes, Joshua Sanchez, and
Young Rae Kim
Department of Computing and Cyber Security,
Texas A&M University - San Antonio, Texas, USA;
Department of Curriculum & Instruction, Texas A&M University,
San Antonio, Texas, USA
- 11:40a - 12:00p: Improving the Identification of Conflicts in Collaborative
Requirements Engineering
Claudia Litvak, Leandro Antonelli, Gustavo Rossi
Universidad Nacional de La Matanza La Matanza, Argentina;
Lifia, Facultad de Informatica, Universidad Nacional de La
Plata, Argentina
- 12:00 - 12:20pm: Qualitative Software Engineering and Event-B Modeling for
Class and Use Case Diagrams
Md Usman Gani Syed, Sravanthi Gogadi, Bhargavi Nadendla,
and Yijie Han
School of Computing and Engineering, University of Missouri
at Kansas City, Missouri, USA
- 12:20 - 01:00pm: LUNCH (On Your Own)

- SESSION 2A-ISPC: SYMPOSIUM ON SIGNAL & IMAGE PROCESSING, COMPUTER VISION & PATTERN RECOGNITION (CSCI-ISPC) + MEDICAL SYSTEMS (CSCI-ISHI)**
Co-Chairs: Prof. Hyo Jong Lee*, Nenad Mijatovic, and Neo Motlhabane*****
***Director, Center for Advanced Image & IT, Chonbuk National University, South Korea;**
****Florida Institute of Technology, USA;**
*****North-West University, South Africa**
December 13, 2018 (Thursday); 01:00pm - 03:00pm
(LOCATION: Galleria A)
- 01:00 - 01:20pm: Brainwave Analysis in Virtual Reality Based Emotional Regulation Training
 Yanjun Wu, Xiaoli Yang, Yinjie Li, Haibao Li, and Weidong Yang
 Department of ECE, Purdue University Northwest, USA;
 Institute of Biomedical Engineering (School of Communication & Information Engineering), Shanghai University, P. R. China
- 01:20 - 01:40pm: GPU Acceleration of a Best-Features Based Digital Rotoscope
 Michael L. Davis, Vivek K. Pallipuram
 School of Engineering and Computer Science, University of the Pacific, Stockton, California, USA
- 01:40 - 02:00pm: Ball Detection using Yolo and Mask R-CNN
 Matija Buric, Miran Pobar, Marina Ivasic-Kos
 Department of Informatics, University of Rijeka, Croatia;
 Hrvatska elektroprivreda d.d., Rijeka, Croatia
- 02:00 - 02:20pm: PyTracker: A Low-Cost Mobile Platform for Tele-rehabilitation
 Gary Roberts, Jinzhu Gao
 University of the Pacific, Stockton, California, USA
- 02:20 - 02:40pm: An Ensemble of Face Recognition Algorithms for Unsupervised Expansion of Training Data
 Jeff Dale, Anthony Clark
 Department of Computer Science, Missouri State University, Springfield, Missouri, USA
- 02:40 - 03:00pm: Densely Connected Convolutional Networks for Multi-Exposure Fusion
 Yue Que, Hyo Jong Lee
 Division of Computer Science and Engineering,
 Chonbuk National University, Jeonju, Korea
- 03:00 - 03:40pm: **POSTER SESSIONS 1-CSCI**
December 13, 2018 (Thursday)
(LOCATION: Lotus Ballroom 1)
Refreshments will be available.
List of poster papers appears at the end of December 13's schedule.

- SESSION 3A-ISPC: SYMPOSIUM ON SIGNAL & IMAGE PROCESSING, COMPUTER VISION & PATTERN RECOGNITION (CSCI-ISPC)**
Chair: Dr. Darla Sligh
University of Maryland University College, USA
and MITRE Corp., USA
December 13, 2018 (Thursday); 03:40pm - 06:20pm
(LOCATION: Galleria A)
- 03:40 - 04:00pm: Facial Expression Recognition from Different Angles Using DCNN for Autistic Children to Recognize Emotional Patterns
Md Inzamam Ul Haque, Damian Valles
Ingram School of Engineering, Texas State University,
San Marcos, Texas, USA
- 04:00 - 04:20pm: Sequence-to-Sequence Learning using Deep Learning for Optical Character Recognition (OCR)
Vishal Mishra, Devinder Kaur
Department of EECS, University of Toledo, Ohio, USA
- 04:20 - 04:40pm: Evaluation Experiments for Lane Keeping Assistance System - Under Several Conditions
Naohisa Hashimoto, Simon Thompson, Yusuke Takinami
Robot Innovation Research Center, National Institute of Advanced Industrial Science and Technology (AIST), Japan
- 04:40 - 05:00pm: Multiple Linear Regression Haze-removal Model Based on Dark Channel Prior
Binghan Li, Wenrui Zhang, Mi Lu
Electrical and Computer Engineering, Texas A&M University,
College Station, Texas, USA
- 05:00 - 05:20pm: Hardware-oriented Fast Foveated Rendering Algorithm for Mobile Real-time Ray Tracing
Imjae Hwang, Eunjae Kim, Hyuck-Joo Kwon, Youngsik Kim,
Cheong Ghil Kim, Sung-Kyu Lim, and Woo-Chan Park
Department of CE, Sejong Univeristy, Seoul, South Korea;
Department of EEE, Yonsei Univeristy, Seoul, South Korea;
Department of Game & Multimedia Engineering, Korea Polytechnic University, Siheung, South Korea;
Department of CS, Namseoul University, Cheonan, South Korea;
School of ECE, Georgia Institute of Technology, Georgia, USA
- 05:20 - 05:40pm: Image Classification on Visual Dictionary Optimization
Xi-Bin Xu, Xiao-lei Zhao
Modern Education Technology and Information Center,
Guangdong Engineering Polytechnic, China;
School of IS, Xinhua College of Sun Yat-Sen University, China
- 05:40 - 06:00pm: Reversible Data Hiding Based on Integer Wavelet Transforms and Prediction Error Expansion
G. Mamatha, Shaik Ahmad
Department of ECE, J.N.T.U.A College of Engineering,
Andhra Pradesh, India
- 06:00 - 06:20pm: Forensic Detection of JPEG Compressed Image
Kang Hyeon Rhee
School of EE, Chosun University, Gwangju, South Korea
- 06:20 - 08:00pm: Any Late Papers and/or Informal Participant-driven Panel Discussions**

-----> **SESSIONS SCHEDULED IN CONFERENCE ROOM Galleria B - DECEMBER 13** <-----

- SESSION 4B-ISCS: SYMPOSIUM ON COMPUTATIONAL SCIENCE (CSCI-ISCS)**
Co-Chairs: Dr. Kai Wang
Department of Computer Sciences,
Georgia Southern University, USA
December 13, 2018 (Thursday); 10:40am - 12:40pm
(LOCATION: Galleria B)
- 10:40 - 11:00am: Optimal Location of Voltage Sag Monitors Considering Electrical Network Reconfiguration in Presence of DG by Using Tabu Search
 S. Garcia-Martinez, E. Espinosa-Juarez, C. Perez-Rojas
 Faculty of Electrical Engineering, Universidad Michoacana de San Nicolas de Hidalgo, Mexico
- 11:00 - 11:20am: Flexible Computer Simulation for Power Loss Analysis of Direct AC LED Drive Systems
 Miles Head, Taufik Taufik, Onny Setyawati, Alfredo Satriya
 EE Department, Cal Poly State University, San Luis Obispo, California, USA;
 EE Department, Brawijaya University, Malang, Indonesia
- 11:20 - 11:40am: Method of Moment Analysis of Truncation Number in a Homogeneous Spheroid Model
 Alfredo Bayu Satriya, Onny Setyawati, Taufik Taufik
 EE Department, University of Jember, Jember, Indonesia;
 EE Department, Brawijaya University, Malang, Indonesia;
 EE Department, Cal Poly State University, San Luis Obispo, California, USA
- 11:40a - 12:00p: Simulating Asymptotic Orders of the Number of Graphical Partitions and Graphical Degree Sequences
 Kai Wang, Troy Purvis
 Department of Computer Sciences,
 Georgia Southern University, Statesboro, Georgia, USA
- 12:00 - 12:20pm: Feature Extraction Methods for the Detection of North Atlantic Right Whale Up-calls
 Ali K. Ibrahim, Hanqi Zhuang, Nurgun Erdol, Ali Muhamed Ali
 CEECS Department, Florida Atlantic University,
 Boca Raton, Florida, USA
- 12:20 - 12:40pm: Sentylyzer: Aspect-Oriented Sentiment Analysis of Product Reviews
 Johannes Zenkert, Wladislav Schulz, Christian Weber,
 Andre Klahold, and Madjid Fathi
 Department of EE&CS, Institute of Knowledge Based Systems and Knowledge Management, University of Siegen, Germany
- LUNCH (On Your Own): ISCS Participants: 12:40pm - 01:20pm**
ISPD Participants: 12:20pm - 01:00pm
ISCC Participants: 12:20pm - 01:00pm

SESSION 5B-ISPD-ISCC: (Overlap Scope)

**SYMPOSIUM ON PARALLEL & DISTRIBUTED COMPUTING (CSCI-ISPD) &
SYMPOSIUM ON CLOUD COMPUTING AND DATA CENTERS (CSCI-ISCC)**

Chair: Prof. Cheong Ghil Kim

Department of CS, Namseoul University, Korea

December 13, 2018 (Thursday); 01:00pm - 03:00pm

(LOCATION: Galleria B)

- 01:00 - 01:20pm: Temporal In-Situ Compression of Scientific Floating Point Data with t-GLATE
Henry Lehmann, Bernhard Jung
Institute for Informatics, Technical University Freiberg, Freiberg, Germany
- 01:20 - 01:40pm: Performance Analysis - A Theoretical Two Latencies Model
Fernando Herrera, Felix Njeh, Francisco J. Torres-Rojas
Intel Corporation, Heredia, Costa Rica;
Intel Corporation, Santa Clara, California, USA;
Tecnologico de Costa Rica, San Jose, Costa Rica
- 01:40 - 02:00pm: Developing Standardized API Between Intel and ARM NEON
Promyk Zamojski, Raafat Elfouly
Mathematics and Computer Science Department,
Rhode Island College, Rhode Island, USA
- 02:00 - 02:20pm: Lisingo: A Text-To-Speech Web Service-based Application using Serverless Cloud Computing
Andrew Daniel, Bransyn Luther, Imran Ghani
Indiana University of Pennsylvania, Pennsylvania, USA
- 02:20 - 02:40pm: InterCloud: A Data Movement Policy DApp for Managing Trust in the Cloud
Stephen S. Kirkman, Richard Newman
Computer and Information Science and Engineering,
University of Florida, Gainesville, Florida, USA
- 02:40 - 03:00pm: A Review for Virtualization, Hypervisor and VM Allocation Security: Threats, Vulnerabilities, and Countermeasures
Sane Bernard Ousmane, Niang Ibrahima, Fall Doudou
Cheikh Anta Diop University, Dakar, Senegal;
Nara Institute of Science and Technology, Ikoma, Nara, Japan
- 03:00 - 03:40pm: **POSTER SESSIONS 1-CSCI**
December 13, 2018 (Thursday)
(LOCATION: Lotus Ballroom 1)
Refreshments will be available.
List of poster papers appears at the end of December 13's schedule.

SESSION 6B-ISCS: SYMPOSIUM ON COMPUTATIONAL SCIENCE (CSCI-ISCS)

Chair: Prof. Yas A. Alsultanny

College of Graduate Studies,

Arabian Gulf University, Kingdom of Bahrain

December 13, 2018 (Thursday); 03:40pm - 06:20pm

(LOCATION: Galleria B)

- 03:40 - 04:00pm: Classification of Trending Topics in Twitter
Qi Zhu
Department of Computer Science, University of
Houston-Victoria, Texas, USA

- 04:00 - 04:20pm: LMI Approach: Design of Unknown Inputs Observers to Takagi-Sugeno Fuzzy Model
Victor Hugo Tellez-Izquierdo, Juan Anzures-Marin, and Elisa Espinosa-Juarez
Faculty of Electrical Engineering, Universidad Michoacana de San Nicolas de Hidalgo (UMSNH), Mexico
- 04:20 - 04:40pm: On the Family of qSpaces
Oskars Rieksts, Dylan Schwesinge, Andrew Wernicki, and Yong Zhang
Computer Science, Kutztown University, Pennsylvania, USA
- 04:40 - 05:00pm: Dynamic Prediction of Building HVAC Energy Consumption by Ensemble Learning Approach
Weisong Tian, Chengwei Lei, Mucun Tian
Department of EE, Widener University, Chester, PA, USA;
Department of CEE & CS, California State University Bakersfield, California, USA;
Department of CS, Boise State University, Idaho, USA
- 05:00 - 05:20pm: Multi-Criteria Weather Routing Optimization based on Ship Navigation Resistance, Risk and Travel Time
Tommaso Fabbri, Raul Vicen, Aren Hunter
NATO STO Centre for Maritime Research & Experimentation (CMRE), La Spezia, Italy;
Defence Research and Development Canada (DRDC) - Atlantic Research Centre, Nova Scotia, Canada
- 05:20 - 05:40pm: Innovative Scenarios to Improve Service Quality
Yas Alsultanny
College of Graduate Studies, Arabian Gulf University, Bahrain
- 05:40 - 06:00pm: A Non-Adaptive Scheme for Numerical Integration
Adel N. Boules
Department of Mathematics and Statistics,
University of North Florida, Jacksonville, Florida, USA
- 06:00 - 06:20pm: A Decision Tree Method on Fuzzy Name Identification from Chinese Phonemic Names to Chinese Names
Hua Zhao, Fairouz Kamareddine
School of Mathematical and Computer Science,
Heriot-Watt University, Edinburgh, United Kingdom
- 06:20 - 08:00pm: *Any Late Papers and/or Informal Participant-driven Panel Discussions*

-----> **SESSIONS SCHEDULED IN CONFERENCE ROOM Galleria C - DECEMBER 13** <-----

- SESSION 7C-ISBD: SYMPOSIUM ON BIG DATA AND DATA SCIENCE (CSCI-ISBD)**
Co-Chairs: Prof. Ali Dehghan-Banadaki* & Dr. Ki Jung Lee**
***California Polytechnic State University, USA;**
****University of Cincinnati, Ohio, USA**
December 13, 2018 (Thursday); 10:40am - 12:20pm
(LOCATION: Galleria C)
- 10:40 - 11:00am: Big Data Analytics in a Day-Ahead Price Forecasting Using TensorFlow in Restructured Power Systems
 Ali Dehghan Banadaki, Taufik Taufik, Ali Feliachi
 California Polytechnic State University, California, USA;
 West Virginia University, USA
- 11:00 - 11:20am: Datum based Event Mining: The Case of Customer Experience in Insurance
 Gilles Beaudon, Eddie Soulier
 Tech-CICO Team, University of Technology of Troyes, France
- 11:20 - 11:40am: Synthetic Trajectory Extraction for Maritime Anomaly Detection
 Mathias Anneken, Anne-Laure Jouselme, Sebastian Robert, and Jurgen Beyerer
 Vision and Fusion Laboratory (IES), Karlsruhe Institute of Technology (KIT), Karlsruhe, Germany;
 Fraunhofer Institute of Optronics, System Technologies and Image Exploitation (Fraunhofer IOSB), Karlsruhe, Germany;
 NATO STO Centre for Maritime Research and Experimentation (CMRE), La Spezia, Italy
- 11:40a - 12:00p: Revealing the Spatial Structure of Human Mobility in Diverse Travel Modes
 Wen Li, Mengqiao Xu, Haoxiang Xia
 Institute of Systems Engineering, Dalian University of Technology, Dalian, China
- 12:00 - 12:20pm: FREE SLOT
- 12:20 - 01:00pm: LUNCH (On Your Own)
- SESSION 8C-ISNA: SYMPOSIUM ON SOCIAL NETWORK ANALYSIS, SOCIAL MEDIA, & MINING (CSCI-ISNA)**
Chair: Prof. Cheong Ghil Kim
Department of CS, Namseoul University, Korea
December 13, 2018 (Thursday); 01:00pm - 03:00pm
(LOCATION: Galleria C)
- 01:00 - 01:20pm: Examining User's Trust towards Healthcare Information on Facebook: Impacts of information type, disease type, and social consensus
 Kijung Lee, Renuka Arora, Guo Freeman
 School of IT, University of Cincinnati, Ohio, USA;
 SLK America, Cincinnati, Ohio, USA;
 School of Computing, Clemson University, South Carolina, USA
- 01:20 - 01:40pm: On Evaluation of Pattern Match Queries in Large Graph Databases
 Yangjun Chen
 Department of Applied Computer Science,
 University of Winnipeg, Canada

- 01:40 - 02:00pm: Characteristics and Social Media Discourse That Influence Action
Michael Workman
Texas A&M University, College Station, Texas, USA
- 02:00 - 02:20pm: Get Smart on Information-Sharing in Social Networks
Xiaoqin Shelley Zhang, Vaishnavi Guduguntla, Kalyani Emani, Gaurav Kulkarni, and Pavan Kaparathi
Computer and Information Science Department,
University of Massachusetts Dartmouth, Massachusetts, USA
- 02:20 - 02:40pm: NOTE: Possible FREE SLOT (Speaker is waiting for US Visa)
Identifying Tweets from Syria Refugees using a Random Forest Classifier
Smarti Reel, Patrick Wong, Belinda Wu, Soraya Kouadri Mostefaoui, and Haiming Liu
Health Informatics Centre, University of Dundee, UK;
Open University, Milton Keynes, UK;
Department of CST, University of Bedfordshire, Luton, UK
- 02:40 - 03:00pm: FREE SLOT
- 03:00 - 03:40pm: **POSTER SESSIONS 1-CSCI**
December 13, 2018 (Thursday)
(LOCATION: Lotus Ballroom 1)
Refreshments will be available.
List of poster papers appears at the end of December 13's schedule.
- SESSION 9C-ISCW: SYMPOSIUM ON CYBER WARFARE, CYBER DEFENSE, & CYBER SECURITY (CSCI-ISCW)**
Co-Chairs: Prof. Haydar Teymourlouei
Interim Chair, Department of Computer Science,
Lincoln University, PA, USA
December 13, 2018 (Thursday); 03:40pm - 06:20pm
(LOCATION: Galleria C)
- 03:40 - 04:00pm: Radical Web Text Classification using a Composite-Based Approach
Kolade Olawande Owoeye, George R. S. Weir
Department of Computer and Information Sciences,
University of Strathclyde, Glasgow, United Kingdom
- 04:00 - 04:20pm: Application of Stream Splitting Moving Target Network Defenses
Joshua Klosterman, Daniel W. Burwitz, Jacob L. Williams, and Michael C. Shlanta
Beacom College of Cyber & Computer Sciences, Dakota State University, Madison, South Dakota, USA;
The MITRE Corporation, USA
- 04:20 - 04:40pm: Organization Risk Management on Network Vulnerability and Potential Data Breach
Haydar Teymourlouei, Vareva E. Harris
Department of CS, Lincoln University, Oxford, PA, USA;
School of Advanced Studies, University of Phoenix, Phoenix, Arizona, USA

- 04:40 - 05:00pm: Building a Cybersecurity Research and Experimentation Testbed
George Hsieh, Tonya L. Fields, Bigyan Kc, and
Jonah Yurko-Galvin
Computer Science, Norfolk State University, Norfolk,
Virginia, USA
- 05:00 - 05:20pm: An Attribute Certificate Management System for
Attribute-based Access Control
Christoph Ruland, Jochen Sassmannshausen, and
Jyoti Pragyan Satpathy
Faculty of Science and Technology, University of Siegen,
Siegen, Germany
- 05:20 - 05:40pm: Self-learning Semi-supervised Machine Learning for
Network Intrusion Detection
Ningxin Shi, Xiaohong Yuan, Joaquin Hernandez,
Kaushik Roy, and Albert Esterline
North Carolina Agricultural and Technical State
University, North Carolina, USA
- 05:40 - 06:00pm: Utility of User Roles in Comparing Network Flow Behaviors
Jeffrey S. Dean
United States Air Force, USA;
Naval Postgraduate School, USA
- 06:00 - 06:20pm: Classification of Extremist Text on the Web Using
Sentiment Analysis Approach
Kolade Olawande Owoeye, George R. S. Weir
Department of Computer and Information Sciences,
University of Strathclyde, Glasgow, UK
- 06:20 - 08:00pm: Any Late Papers and/or Informal Participant-driven Panel Discussions**

LIST OF PAPERS IN POSTER SESSIONS 1-CSCI**03:00 - 03:40pm: December 13, 2018 (Thursday)****(LOCATION: Lotus Ballroom 1)****Refreshments will be available.**

0. The Potential of Utilizing Mobile Cloud Computing
in Mobile Devices
Ali Alshehri, Hani Alshahrani, Abdulrahman Alzahrani,
and Raed Alharthi
School of ECS, Oakland University, Rochester,
Michigan, USA
0. Extraction and Use of Personality Traits from Written
Commentary in Cloud Environments using SAS
Gurpreet Singh Bawa
Accenture Company, Global Professional Services and
Consulting Company
0. Distributed Horizontal Collaboration Caching in Edge
Computing
Chuanming Yi, Haengrae Cho
Department of CE, Yeungnam University, Republic of Korea
0. Network-On-Chip Based Test Access Mechanism for
Multi-Site Test
Chaneui Hong, Sangho Park, Jin-Ho Ahn
School of Electronics and Display, Hoseo University,
Chungnam, South Korea

- 0. A Range Estimator of a Stationary Human among Stationary Clutter for Vital FMCW Radar
Sang Dong Kim, Bong-Seok Kim, Youngseok Jin, Jonghun Lee
Advanced Radar Technology Lab., Convergence Research Center for Future Automotive Technology, DGIST, Daegu, South Korea
- 0. Algorithm for Central Heating Heat Load Modelling
Erik Kral, Alena Kostalova, Petr Capek
Faculty of Applied Informatics, Tomas Bata University in Zlin, Czech Republic
- 0. A Human Detection Approach for Burning Building Sites Using Deep Learning Techniques
Farah B. Jaradat, Damian Valles
Ingram School of Engineering, Texas State University, San Marcos, Texas, USA
- 0. Graph Based Evolutionary Algorithms: Producing Spanning Tree Individuals
Alena Kostalova, Erik Kral, Zdenka Prokopova, Petr Capek, and Augusto L. da Costa
Faculty of Applied Informatics, Tomas Bata University in Zlin, Czech Republic;
LaR - Robotics Lab., Federal University of Bahia, Brazil
- 0. Voice Conversion using Conditional CycleGAN
Dongsuk Yook, In-Chul Yoo, Seungho Yoo
Artificial Intelligence Laboratory, Korea University, Seoul, Korea;
Business School, Korea University, Seoul, Korea
- 0. Analysis of Parallel Training Algorithms for Deep Neural Networks
Hyowon Lee, Keonnyeong Lee, In-Chul Yoo, Dongsuk Yook
Artificial Intelligence Laboratory, Korea University, Seoul, Korea
- 0. A Study on EMG Signal Acquisition Modules and Artificial Neural Networks for Personal Authentication
Siho Shin, Jaehyo Jung, Youn Tae Kim
IT Fusion Technology Research Center, Department of IT Fusion Technology, Chosun University, Gwangju, South Korea
- 0. Research on the Positioning of Quality Problem of EMU Parts
Hua Sun, Chun Zhang, Yaohua Chen
Information Technology Department, CRRC Qingdao Sifang Rolling Stock Research Institute Co., LTD., Shandong, China;
School of Computer and Information Technology, Beijing Jiaotong University, Beijing, China
- 0. Texture Transfer using Color Relationship
Dongwann Kang, Kyunghyun Yoon
Seoul National University of Science and Technology, Korea;
Chung-Ang University, Korea
- 0. Towards a Standard-based Security and Privacy of IoT System's Services
Christophe Feltus, Thierry Grandjean, Jocelyn Aubert, and Djamel Khadraoui
IT for Innovative Services (ITIS), Luxembourg Institute of Science and Technology (LIST), Luxembourg
- 0. ...

DECEMBER 14, 2018

THERE ARE THREE SETS OF CONCURRENT SESSIONS ON December 14, 2018; SCHEDULED IN CONFERENCE ROOMS: Galleria A, Galleria B, and Galleria C with Poster Session in Lotus Ballroom 1.

-----> SESSIONS SCHEDULED IN CONFERENCE ROOM Galleria A - DECEMBER 14 <-----

SESSION 10A-ISSE: SYMPOSIUM ON SOFTWARE ENGINEERING (CSCI-ISSE) + SOCIAL NETWORKS (CSCI-ISNA)
 Chair: Dr. Pankaj Kamthan
 Concordia University, Canada
 December 14, 2018 (Friday); 08:20am - 10:40am
 (LOCATION: Galleria A)

08:20 - 08:40am: Beyond Utility and Usability: Towards Affectability in Agile Software Requirements Engineering
 Pankaj Kamthan, Nazlie Shahmir
 Department of Computer Science and Software Engineering,
 Concordia University, Montreal, Canada;
 WestJet Airlines Limited, Calgary, Canada

08:40 - 09:00am: Sentiment Analysis of Twitter Data
 Amrita Shelar, Ching-Yu Huang
 School of Computer Science, Kean University, Union,
 New Jersey, USA

09:00 - 09:20am: Ranking Things in the Internet of Things
 Naseem Ibrahim
 CSSE, School of Engineering,
 The Pennsylvania State University, Erie, Pennsylvania, USA

09:20 - 09:40am: Estimating Change-Points based on Defect Data
 Lamees Alhazzaa, Anneliese Amschler Andrews
 Department of Computer Science, University of Denver,
 Denver, Colorado, USA

09:40 - 10:00am: Ontology, DSL and DSS-based Software Re-engineering: A Case Study
 Nuno Silva, Paulo Maio, Alexandre Gouveia, Rui Lopes
 School of Engineering, Polytechnic of Porto, Portugal;
 DigitalWind, Lda., Aveiro, Portugal

10:00 - 10:20am: Network Architecture as a Thining Machine
 Sabah Al-Fedaghi, Hadeel Alnasser
 CE Department, Kuwait University, Kuwait;
 Technical Support Department, Kuwait Anti-Corruption
 Authority, Kuwait

10:20 - 10:40pm: NOTE: Possible FREE SLOT (Speaker is waiting for US Visa)
 An Integrated Cost-effective Security Requirement
 Engineering
 Process in SDLC using FRAM
 Swe Zin Hlaing, Koichiro Ochimizu
 University of Information Technology, Yangon, Myanmar;
 Japan Advanced Institute of Science & Tech (JAIST), Japan

10:20 - 10:40am: BREAK (Lotus Ballroom 1)

SESSION 11A-ISPC: SYMPOSIUM ON SIGNAL & IMAGE PROCESSING, COMPUTER VISION & PATTERN RECOGNITION (CSCI-ISPC)

Co-Chairs: Dr. Colin Egan*, Wenwei Xu**, and Henok Ghebrechristos***
 *University of Hertfordshire, UK;
 **Pacific Northwest National Laboratory, USA;
 ***University of Colorado-Denver, USA
 December 14, 2018 (Friday); 10:40am - 12:20pm
 (LOCATION: Galleria A)

- 10:40 - 11:00am: Pure-CNN: A Framework for Fruit Images Classification
 Asia Kausar, Mohsin Sharif, JinHyuck Park, and Dong Ryeol Shin
 School of Information and Communication Engineering, Sungkyunkwon University, Suwon, South Korea
- 11:00 - 11:20am: New Switchless and Free Positioning Gesture Recognition System using RNN and CTC Loss Function
 Kei Nakada, Atsushi Ito
 Graduate School of Engineering, Utsunomiya University, Tochigi, Japan
- 11:20 - 11:40am: Underwater Fish Detection using Deep Learning for Water Power Applications
 Wenwei Xu, Shari Matzner
 Marine Sciences Division, Pacific Northwest National Laboratory, Seattle, Washington, USA;
 Operational Systems Technology Division, Pacific Northwest National Laboratory, Sequim, Washington, USA
- 11:40a - 12:00p: Ensuring the Credibility of a Colour Vision Deficient Improvement Algorithm by Use of Two Statistical Analysis Techniques
 Colin Egan, Majed Alsafyani
 School of CS, University of Hertfordshire, UK
- 12:00 - 12:20pm: Watermarking: A Review of Software and Hardware Techniques
 Azzam Sleit, Noora Fetais
 Kind Center for Computing Research, Qatar University, Doha, Qatar
- 12:20 - 01:00pm: LUNCH (On Your Own)

SESSION 12A-ISED: SYMPOSIUM ON EDUCATION - CS & CE (CSCI-ISED)

Co-Chairs: Dr. Ching-yu (Austin) Huang* and Prof. Shaoping Xiao**
 *School of CS, Kean University, New Jersey, USA;
 **University of Iowa, USA
 December 14, 2018 (Friday); 01:00pm - 03:00pm
 (LOCATION: Galleria A)

- 01:00 - 01:20pm: Incorporating Research in the Undergraduate Experience at a Private Teaching-Centric Institution
 David Mueller, Elizabeth Basha, Vivek K. Pallipuram
 School of Engineering and Computer Science Department, University of the Pacific, Stockton, California, USA

- 01:20 - 01:40pm: Cognitive Training to Improve Problem Solving with EEG Headset
Zhipeng Huang, Xiaoli Yang, Yingjie Li
Department of Electrical and Computer Engineering,
Purdue University Northwest, Hammond, USA;
Institute of Biomedical Eng., School of Communication
and Information Engineering, Shanghai University,
Shanghai, P. R. China
- 01:40 - 02:00pm: A Smart Class Hyperlearning and Management Suite
Wafa Ghonaim, Ahmed Al-Ghamdi
Faculty of Computing and Information Technology,
University of Jeddah, Jeddah, KSA, Saudi Arabia
- 02:00 - 02:20pm: Are Computer Science and Information Systems Students
More Likely to Earn a Better Grade in Basic Computer
Literacy Courses Than Their Peers: A Case Study
Nathan Barker, Laurie Harris
Computer Science & Information Systems Department,
Southern Utah University, Cedar City, Utah, USA
- 02:20 - 02:40pm: Integrating Hands-on Components into Database Curriculum
at Undergraduate and Graduate Levels
Dan Li
Department of Computer Science, Eastern Washington
University, Cheney, Washington, USA
- 02:40 - 03:00pm: Improvement of Interactive Learning Support System
with Adaptive Vocabulary Lists
Ikumi Horie, Yoshitatsu Matsuda
Dokkyo University, Saitama, Japan;
The University of Tokyo, Tokyo, Japan
- 03:00 - 03:40pm: **POSTER SESSIONS 2-CSCI**
December 14, 2018 (Friday)
(LOCATION: Lotus Ballroom 1)
Refreshments will be available.
List of poster papers appears at the end of December 14's schedule.
- SESSION 13A-ISED: SYMPOSIUM ON EDUCATION - CS & CE (CSCI-ISED)**
Chair: Prof. Charlie Obimbo
School of CS, University of Guelph, ON, Canada
December 14, 2018 (Friday); 03:40pm - 06:20pm
(LOCATION: Galleria A)
- 03:40 - 04:00pm: A Survey of Online Learning Platforms with Initial
Investigation of Situation-Awareness to Facilitate
Programming Education
Rasha AlBashaireh, Hua Ming
Department of CSE, Oakland University, Rochester, USA
- 04:00 - 04:20pm: Stories of Tomorrow. How 6th Graders Plan a Virtual
Trip to the Mars
Franz X. Bogner, Sofoklis Sotiriou
Centre of Math & Science Education,
University of Bayreuth, Bayreuth, Germany;
R&D, Ellinogermaniki Agogi, Athens, Greece

- 04:20 - 04:40pm: Click For Marks: A Student Response System
Charlie Obimbo, Ahmed El Shantaly
School of Computer Science, University of Guelph,
Guelph, ON, Canada
- 04:40 - 05:00pm: Discipline-Specific Critical Thinking Curriculum with
a Problem Solving Life Cycle Framework
C. Sophie Lee, Chi-Chun Chou
Department of Information Systems, College of Business
Administration, California State University, Long Beach,
California, USA;
College of Business, California State University,
Monterey Bay, Marina, California, USA
- 05:00 - 05:20pm: An Automated System for Collection and Analysis of ABET
Curriculum Requirements
Jamal Alhiyafi, Ibrahim Abuaqel
Department of Computer Science, College of Computer
Science and Information Technology, Imam Abdulrahman Bin
Faisal University, Dammam, Saudi Arabia
- 05:20 - 06:20pm: **INVITED TUTORIAL/LECTURE: (1 hour but can be extended if need be)**
ACCREDITATION BOARD OF ENGINEERING & TECHNOLOGY (ABET)
ACCREDITATION PROCESS OF COMPUTER SCIENCE DEGREE PROGRAM
Prof. Gurdeep S. Hura
Professor, Department of Maths and Computer Science,
University of Maryland Eastern Shore, Maryland, USA
- 07:00 - 09:00pm: **CONFERENCE RECEPTION DINNER / SOCIAL**
December 14, 2018 (Friday); 07:00 - 09:00pm
(LOCATION: Egyptian Ballroom)

-----> **SESSIONS SCHEDULED IN CONFERENCE ROOM Galleria B - DECEMBER 14** <-----

SESSION 14B-ISPD-ISCC: (Overlap Scope)

**SYMPOSIUM ON PARALLEL & DISTRIBUTED COMPUTING (CSCI-ISPD) &
SYMPOSIUM ON CLOUD COMPUTING AND DATA CENTERS (CSCI-ISCC)**

Co-Chairs: Prof. Vivek Pallipuram* and Dr. Darla Sligh**

***School of ECS, University of the Pacific,
California, USA;**

****University of Maryland University College, USA,
and MITRE Corp., USA**

December 14, 2018 (Friday); 08:20am - 10:20am

(LOCATION: Galleria B)

08:20 - 08:40am: FREE SLOT

08:40 - 09:00am: FREE SLOT

09:00 - 09:20am: Distributed Cache-Reduction Approach to DNA
Sequencing Using a Greedy Algorithm for the
Shortest Common Superstring
Ali Khalid, Anthony Enem, Eduardo Colmenares
Department of Computer Science, Midwestern State
University, Wichita Falls, Texas, USA

09:20 - 09:40am: Performance Improvement on Heterogeneous Platforms:
A Machine Learning Based Approach
Chenggang Lai, Yirong Chen, Xuan Shi, Miaoqing Huang,
and Genlang Chen
University of Arkansas, Arkansas, USA;
Zhejiang University, P. R. China

09:40 - 10:00am: Evaluating the Benefits of Many-Core Programming
Models with Scientific Kernels: A Case Study
Shady Boukhary, Eduardo Colmenares
Department of Computer Science, Midwestern State
University, Wichita Falls, Texas, USA

10:00 - 10:20am: Comparative Analysis of Cloud Computing Simulators
Neo Motlhabane, Naison Gasela, Micheal Esiefarienrhe
Computer Science Department, North-West University,
Mafikeng, South Africa

10:20 - 10:40am: **BREAK (Lotus Ballroom 1)**

SESSION 15B-ISCB: SYMPOSIUM ON COMPUTATIONAL BIOLOGY (CSCI-ISCB)

Co-Chairs: Prof. Shaoping Xiao* and Prof. Sangjin Kim**

***University of Iowa, USA**

****University of Texas at El Paso, Texas, USA**

December 14, 2018 (Friday); 10:40am - 12:20pm

(LOCATION: Galleria B)

10:40 - 11:00am: An Efficient Method for Discovering Functionally
Important Motifs in a Group of Protein Structures
Yang Du, Changhui Yan
Computer Science Department, North Dakota State
University, Fargo, North Dakota, USA

- 11:00 - 11:20am: Effects of Phenotypical Patterns on Epigenetic Markers
Ray R. Hashemi, Azita A. Bahrami, Jeffrey A. Young,
Aaron Schrey, Travis Robbins, Alexandria Ragsdale, and
Tracy Langkilde
Department of CS, Georgia Southern University, USA;
IT Consultation, Savannah, Georgia, USA;
Department of Biology, Georgia Southern University, USA;
Department of Biology, University of Nebraska Omaha, USA;
Department of Zoology, University of Otago, New Zealand;
Department of Biology, Pennsylvania State University,
University Park, Pennsylvania, USA
- 11:20 - 11:40am: A New Fuzzy Clustering-based Imputation Method
Thanh Le, Lan Vu
School of Business Information Technology, University
of Economics HCMC, Vietnam;
VMWare, Palo Alto, California, USA
- 11:40a - 12:00p: Supervised Machine Learning with Protein Structural and
Network Topological Features Predicts Physical Interactors
of the Human Huntington's Disease Protein
Sonali Lokhande, Seongjoon Koo, Animesh Ray
Riggs School of Applied Life Sciences, Keck Graduate
Institute, Claremont, California, USA;
Division of Biology and Bioengineering, California
Institute of Technology, Pasadena, California, USA
- 12:00 - 12:20pm: Compare and Contrast of Differential Gene Expression
Software Packages of RNA_Seq
Hamdan Alshehri
Department of Computer and Information Sciences,
Towson University, Towson, Maryland, USA
- 12:20 - 01:00pm: LUNCH (On Your Own)
- SESSION 16B-ISCS: SYMPOSIUM ON COMPUTATIONAL SCIENCE (CSCI-ISCS)**
Chair: Dr. Vijayarangan Natarajan
Tata Consultancy Services Ltd (TCS), India
December 14, 2018 (Friday); 01:00pm - 02:20pm
(LOCATION: Galleria B)
- 01:00 - 01:20pm: Computation in the Enumeration of Integer Matrices II
Shanzhen Gao, Keh-Hsun Chen
Department of Mathematics and Computer Sciences,
University of Richmond, Richmond, Virginia, USA;
Department of Computer Science, University of North
Carolina at Charlotte, North Carolina, USA
- 01:20 - 01:40pm: Modeling Digital Transformation Strategy
Sakir Yucel
NetApp, USA
- 01:40 - 02:00pm: Estimating the Benefits, Drawbacks and Risk of Digital
Transformation Strategy
Sakir Yucel
NetApp, USA
- 02:00 - 02:20pm: Modeling Digital Business Strategy
Sakir Yucel
NetApp, USA

SESSION 17B-ISCI: SYMPOSIUM ON COMPUTATIONAL INTELLIGENCE (CSCI-ISCI)

Co-Chairs: Prof. Khondkar R. Islam* and Dr. Kai Wang**
 *Department of Information Sciences and
 Technology, George Mason University, VA, USA;
 **Department of Computer Sciences,
 Georgia Southern University, USA
 December 14, 2018 (Friday); 02:20pm - 04:20pm
 (LOCATION: Galleria B)

02:20 - 02:40pm: Matching of Business Data in a Generic Business Process
 Warehousing
 Gamal Kassem, Klaus Turowski
 German University in Cairo, Cairo, Egypt;
 Fakultat fur Informatik, Otto-von-Guericke-Universitat
 Magdeburg, Germany

02:40 - 03:00pm: Effect of the Pseudorandom Number Generators on the
 Standard Particle Swarm Optimization on a GPU
 Md. Maruf Hussain, Noriyuki Fujimoto
 Graduate School of Science, Osaka Prefecture University,
 Osaka, Japan

03:00 - 03:40pm: **POSTER SESSIONS 2-CSCI**
 December 14, 2018 (Friday)
 (LOCATION: Lotus Ballroom 1)
 Refreshments will be available.
 List of poster papers appears at the end of December 14's schedule.

SESSION 17B-ISCI: Continued ...

SYMPOSIUM ON COMPUTATIONAL INTELLIGENCE (CSCI-ISCI)
 Co-Chairs: Prof. Khondkar R. Islam* and Dr. Kai Wang**
 *Department of Information Sciences and
 Technology, George Mason University, VA, USA;
 **Department of Computer Sciences,
 Georgia Southern University, USA
 December 14, 2018 (Friday); 02:20pm - 04:20pm
 (LOCATION: Galleria B)

03:40 - 04:00pm: An Implementation of Naive Bayes Classifier
 Feng-Jen Yang
 Department of Computer Science, Florida Polytechnic
 University, Lakeland, Florida, USA

04:00 - 04:20pm: ACTT: Automotive CAN Tokenization and Translation
 Miki E. Verma, Robert A. Bridges, Samuel C. Hollifield
 Cyber & Applied Data Analytics Division,
 Oak Ridge National Laboratory, Oak Ridge, Tennessee, USA

SESSION 18B-ISHI: SYMPOSIUM ON HEALTH INFORMATICS & MEDICAL SYSTEMS (CSCI-ISHI)

Chair: Prof. Jaime Raigoza
 CS Dept, California State University, Chico, USA
 December 14, 2018 (Friday); 04:20pm - 06:20pm
 (LOCATION: Galleria B)

04:20 - 04:40pm: Protection of Healthcare Information: Adding Cyber
 Resilience and Recovery
 Arun Sood, Khalid Moidu
 George Mason University, Virginia, USA;
 Hofstra University, New York, USA;
 SCIT Labs, Virginia, USA

- 04:40 - 05:00pm: Multi Depth Camera System for 3D Data Recording for Training and Education of Nurses
Conrad Fifelski, Anna Brinkmann, Simon Martin Ortmann, Melvin Isken, and Andreas Hein
C.v.O University Oldenburg, Germany
- 05:00 - 05:20pm: Single Line Design Technique to Improve the Accuracy of Drug Delivery System: Piston Type Extrusion
Sangjin Kim, Jihye Kim, Guikuan Yue, Brandon Cepeda, and Namsoo P. Kim
Department of Mathematical Sciences, The University of Texas at El Paso, Texas, USA;
Center for Printable Materials Certification (CPMC), The University of Texas at El Paso, Texas, USA;
Department of Metallurgical Materials and Biomedical Engineering (MMBME), The University of Texas at El Paso, Texas, USA
- 05:20 - 05:40pm: Security Management in Electronic Health Records: Attitudes and Experiences among Health Care Professionals
Berglind Fjola Smaradottir
Department of Information and Communication Technology
Centre for eHealth, University of Agder, Grimstad, Norway
- 05:40 - 06:00pm: A Blood Pressure and Heartbeat Anomaly Detection and Notification Mobile Application System (BPHADNS)
Saswat Raj Pandey, Ayush Goyal, David Hicks
Computer Science and Electrical Department,
Texas A&M University-Kingsville, Texas, USA
- 06:00 - 06:20pm: A Study on Automatic Detection of IDC Breast Cancer with Convolutional Neural Networks
Justin L. Wang, Ali K. Ibrahim, Hanqi Zhuang, Ali Muhamed Ali, and Anthony Y. Li
CEECS Department, Florida Atlantic University,
Boca Raton, Florida, USA
- 07:00 - 09:00pm: **CONFERENCE RECEPTION DINNER / SOCIAL**
December 14, 2018 (Friday); 07:00 - 09:00pm
(LOCATION: Egyptian Ballroom)

-----> **SESSIONS SCHEDULED IN CONFERENCE ROOM Galleria C - DECEMBER 14** <-----

SESSION 19C-ISCW-ISMC: (Overlap Scope)

**SYMPOSIUM ON CYBER WARFARE, CYBER DEFENSE, & CYBER SECURITY (CSCI-ISCW) +
SYMPOSIUM ON MOBILE COMPUTING, WIRELESS NETWORKS, & SECURITY (CSCI-ISMC)**

Co-Chairs: Prof. Damian Valles* and Stephen Kirkman
*EE, Texas State University, USA
University of Florida, USA

**December 14, 2018 (Friday); 08:20am - 10:40am
(LOCATION: Galleria C)**

08:20 - 08:40am: FREE SLOT

08:40 - 09:00am: A Comparison of MLA Techniques for Classification of Network Bandwidth Loss
Bikramjit Dasgupta, Damian Valles, Stan McClellan
Ingram School of Engineering, Texas State University, San Marcos, Texas, USA

09:00 - 09:20am: Performance of a Receiver-initiated X-MAC Protocol for Wireless Sensor Networks with Tree Topology
Hyungkeun Lee
School of Computer Information Engineering, Kwangwoon University, Seoul, South Korea

09:20 - 09:40am: Assessing Deterrence Options for Cyber Weapons
Elizabeth E. Wanic, Neil C. Rowe
CS Department, U.S. Naval Postgraduate School, Monterey, California, USA

09:40 - 10:00am: Digital Forensic Process Model for Information System and Network Security Management
Ifeoma Ugochi Ohaeri, Bukohwo M. Esiefarienhe
Department of Computer Science, North-West University, South Africa

10:00 - 10:20am: Web Honeypots for Spies
Blake T. Henderson, Sean F. McKenna, Neil C. Rowe
IS Department, U.S. Naval Postgraduate School, Monterey, California, USA;
CS Department, U.S. Naval Postgraduate School, Monterey, California, USA

10:20 - 10:40am: Data Visualization in Cybersecurity
Syed Fahad Nadeem, Ching-Yu Huang
School of Computer Science, Kean University, Union, New Jersey, USA

SESSION 20C-ISAI: SYMPOSIUM ON ARTIFICIAL INTELLIGENCE (CSCI-ISAI)

Co-Chairs: Dr. Ki Jung Lee* and Prof. Ron Coleman
*University of Cincinnati, Ohio, USA;
Marist College, USA

**December 14, 2018 (Friday); 10:40am - 12:40pm
(LOCATION: Galleria C)**

10:40 - 11:00am: Meaningful Distance for Multivariate Clustering
Alireza Naghizadeh, Dimitris N. Metaxas
Department of CS, Rutgers University, CBIM, Piscataway Township, New Jersey, USA

- 11:00 - 11:20am: Adversarial Text Generation for Google's Perspective API
Edwin Jain, Stephan Brown, Jeffrey Chen, Erin Neaton,
Mohammad Baidas, Ziqian Dong, Huaning Gu, N. Sertac Artan
Department of Computer Science, Tufts University,
Medford, Massachusetts, USA;
College of Engineering and Computing Sciences, New York
Institute of Technology, New York, USA;
Department of EE, University of California, Berkeley,
California, USA;
Department of Biopsychology, University of Michigan,
Ann Arbor, Michigan, USA
- 11:20 - 11:40am: AI Based Flight Control for Autonomous UAV Swarms
Janusz Kusy, M. Umit Uyar, Kelvin Ma, Jun Jie Wu,
Weimin Ruan, Dilip K. Guha, Giorgio Bertoli, and
Jeffrey Boksiner
NYC College of Technology, City University of New York,
New York, USA;
The City College of New York, City University of
New York, New York, USA;
I2WD, US Army RDECOM CERDEC, Aberdeen Proving Ground,
Aberdeen, Maryland, USA
- 11:40a - 12:00p: Dynamic Scenario Adaption for Simulation Training
Robert E. Wray, Charles Newton, Randolph Jones
Soar Technology, Inc., Ann Arbor, Michigan, USA
- 12:00 - 12:20pm: Expediting Training Using Information Theory-Based
Patch Ordering Algorithm
Henok Ghebrechristos, Gita Alaghband
Department of Engineering and Computer Science,
University of Colorado-Denver, Colorado, USA
- 12:20 - 12:40pm: A Machine Learning Approach for Identifying Soccer
Moves Using an Accelerometer Sensor
Omar Alobaid, Lakshmith Ramaswamy, Khaled Rasheed
Department of Computer Science, University of Georgia,
Athens, Georgia, USA

LUNCH (On Your Own): ISAI Participants: 12:40pm - 01:20pm
ISNA Participants: 12:20pm - 01:00pm
ISOT Participants: 12:20pm - 01:00pm

SESSION 21C-ISNA-ISOT: (Overlap Scope)

**SYMPOSIUM ON SOCIAL NETWORK ANALYSIS, SOCIAL MEDIA, & MINING
(CSCI-ISNA) +
SYMPOSIUM ON INTERNET OF THINGS & INTERNET OF EVERYTHING
(CSCI-ISOT)**
Chair: Dr. Feng-Jen Yang
Department of Computer Science, Florida Polytechnic
University, Lakeland, Florida, USA
December 14, 2018 (Friday); 01:00pm - 03:00pm
(LOCATION: Galleria C)

- 01:00 - 01:20pm: Analysis of Malicious URLs on Twitter
Yutaro Kokubun, Akihito Nakamura
GEOCODE, Shinjyuku, Tokyo, Japan;
Computer Science Division, University of Aizu,
Aizu-Wakamatsu, Fukushima, Japan

- 01:20 - 01:40pm: The Scourge of Online Deception in Social Networks
Esma Aimeur, Hicham Hage, Sabrine Amri
Department of Computer Science and Operations Research
(DIRO), University of Montreal, Canada;
Faculty of Natural and Applied Sciences,
Notre Dame University, Labanon
- 01:40 - 02:00pm: A Survey on Internet of Things Security Issues and
Applications
Veena Katam, Trevor Maco, Pouyan Ahmadi, Khondkar Islam
George Mason University, USA;
Virginia Tech, USA
- 02:00 - 02:20pm: IoT Architecture Based SDN for Security: A Review
Esam Aloufi, Ibrahim Alrashdi, Mohamed A. Zohdy
Department of Computer Science and Engineering,
Oakland University, Rochester, Michigan, USA
- 02:20 - 02:40pm: IoT Controlled Screw-Type 3D Food Printer Using Single
Line Design Technique
Namsoo P. Kim, Brandon Cepeda, Jihye Kim, Sangjin Kim,
and Hyunjin Kim
Department of Metallurgical Materials and Biomedical
Engineering (MMBME), The University of Texas at El Paso,
Texas, USA;
Center for Printable Materials Certification (CPMC),
The University of Texas at El Paso, Texas, USA;
Department of Mathematical Sciences, The University of
Texas at El Paso, Texas, USA
- 02:40 - 03:00pm: Enrichment of Ontology Instances Using Linked Data and
Supplemental String Data
Dong-Jae Kim, Dongman Lee, Myungchul Kim, Soon-Ju Hyun
School of Computing, Korea Advanced Institute of Science
and Technology (KAIST), Republic of Korea
- 03:00 - 03:40pm: **POSTER SESSIONS 2-CSCI**
December 14, 2018 (Friday)
(LOCATION: Lotus Ballroom 1)
Refreshments will be available.
List of poster papers appears at the end of December 14's schedule.
- SESSION 22C-ISSC: SYMPOSIUM ON SMART CITIES & SMART MOBILITY (CSCI-ISSC)**
Co-Chairs: Prof. Damian Valles* and Fangyao Liu**
***EE, Texas State University, USA;**
****University of Nebraska at Omaha, Nebraska, USA**
December 14, 2018 (Friday); 03:40pm - 06:20pm
(LOCATION: Galleria C)
- 03:40 - 04:00pm: Blockchain-based NAT Management for Smart Mobility
Yunchan Jung, Marnel Peradilla, Ronnel Agulto
The Catholic University of Korea, South Korea;
De La Salle University, Manila, Philippines
- 04:00 - 04:20pm: AESV Integration of IMU and Implementation of Interleaved
Data Acquisition and Transmission Method
Armando Pinales, Damian Valles
Ingram School of Engineering, Texas State University,
San Marcos, Texas, USA

- 04:20 - 04:40pm: Sensitivity Analysis of Building Energy Demand for Downscaled Climate Scenarios
Roberto San Jose, Juan L. Perez, Libia Perez, and Rosa M. Gonzalez-Barras
Technical University of Madrid (UPM), Madrid, Spain;
University of Madrid (UCM), Madrid, Spain
- 04:40 - 05:00pm: Exploiting Semantic Trajectories using HMMs and BIM for Worker Safety in Dynamic Environments
Muhammad Arslan, Christophe Cruz, Dominique Ginjac
University of Bourgogne Franche-Comte, Dijon, France
- 05:00 - 05:20pm: Combining LIDAR, Passive Infrared, and Markov Chain Prediction for Flexible, Portable Occupancy Monitoring
Varick L. Erickson
Computer Science, California State University East Bay, California, USA
- 05:20 - 05:40pm: A Group Mutual Exclusion for Intersection Traffic Control of Autonomous Vehicle
Sung Hoon Park, Yeong Mok Kim
Department of Computer Engineering, Chungbuk National University, Chungbuk, Korea
- 05:40 - 06:00pm: Smart-Grid Assets Inspections - Enabling the Smart Cities Infrastructure
Alexandre B. Barreto, Ricardo A. Tavares, Paulo Souza, Milton Abrunhosa, Alexandre Dominice, and Jose Dorlando De Souza Junior
Energias Eficiencia Energetica, Sao Jose dos Campos, Brazil; EDP Brazil, Mogi das Cruzes, Brazil
- 06:00 - 06:20pm: The INCIPICT Project and the 5G Trial: a Living Lab for the City of L'Aquila
Fabio Franchi, Fabio Graziosi, Andrea Marotta, and Claudia Rinaldi
Center of Excellence DEWS, University of L'Aquila, Italy
- 07:00 - 09:00pm: **CONFERENCE RECEPTION DINNER / SOCIAL**
December 14, 2018 (Friday); 07:00 - 09:00pm
(LOCATION: Egyptian Ballroom)

LIST OF PAPERS IN POSTER SESSIONS 2-CSCI

03:00 - 03:40pm: December 14, 2018 (Friday)
(LOCATION: Lotus Ballroom 1)
Refreshments will be available.

0. Secure Pairwise Key Establishments for Flying Ad Hoc Networks
Gicheol Wang, Byoung-Sun Lee, Jae Young Ahn
Autonomous Unmanned Vehicle Research Division, Electronics & Telecommunications Research Institute (ETRI), Korea
0. Design of Voice to Text Conversion and Management Program based on Google Cloud Speech API
Jungyoon Choi, Haeyoung Gill, Soobin Ou, Yoojeong Song, and Jongwoo Lee
Department of IT Engineering, Sookmyung Women's University, Seoul, South Korea

- 0. CNN-based Classification of Amyloid PET Image in Patients with Normal, MCI and AD
Hyeon Kang, Jang-Sik Park, Sung Wook Ha, Do-Young Kang
Department of Nuclear Medicine, Dong-A University Hospital, Dong-A University College of Medicine, Busan, Korea;
Inst. of Convergence Bio-Health, Dong-A University, Korea;
Department of EE, Kyungsung University, Busan, Korea;
Sarada Company Institute, Busan, Korea
- 0. Architecture of Object Recognition to Implement in Hardware
So-Young Kwon, Young-Hyung Kim, Yong-Hwan Lee, and Myung-Joon Kim
Department of EE, Kumoh National Inst. of Tech., Korea;
Department of IT Convergence, Kumoh National Institute of Technology, Gumi, Korea;
School of EE, Kumoh National Institute of Technology, Korea
- 0. Design of Real-time Hardware for Edge Detection
Chang-Yong Lee, Young-Hyung Kim, Yong-Hwan Lee
Department of EE, Kumoh National Inst. of Tech., Korea;
Department of IT Convergence, Kumoh National Institute of Technology, Gumi, Korea;
School of EE, Kumoh National Inst. of Tech., Korea
- 0. Fine-Tuning of Pre-Trained Deep Learning Models with Extreme Learning Machine
Tagrid Alshalali, Darsana Josyula
Department of CS, Bowie State University, Maryland, USA;
Department of IS, Princess Nourah Bint Abdulrahman University, Riyadh, Saudi Arabia
- 0. Development of Wireless System for ECG Healthcare Monitoring
Jaehyo Jung, Siho Shin, Youn Tae Kim
IT Fusion Technology Research Center, Department of IT Fusion Technology, Chosun University, Gwangju, South Korea
- 0. Kangarucare: A Homecare System for Enhancing Medicine Adherence
Irene Fidone, Riccardo Cavadini, Fabiola Casasopra, Marco D. Santambrogio, and Chen-Hsiang Yu
Dipartimento di Elettronica, Informazione e Bioingegneria, Politecnico di Milano, Italy;
Department of Computer Science and Networking, Wentworth Institute of Technology, Boston, Massachusetts, USA
- 0. Reconstruction of Skeletal Muscle Architecture from DT-MRI Sequences
Anna Brinkmann, Conrad Fifelski, Angelika Meier, Rebecca Diekmann, and Andreas Hein
Carl von Ossietzky University, Oldenburg, Germany
- 0. Security and Privacy of Electronic Health Records Sharing Using Hyperledger Fabric
Tagrid Alshalali, Kenneth M'Bale, Darsana Josyula
Department of CS, Bowie State University, Maryland, USA;
Department of IS, Princess Nourah Bint Abdulrahman University, Riyadh, Saudi Arabia
- 0. An Insight into Android Side-Channel Attacks
Ali Alqazzaz, Ibrahim Alrashdi, Raed Alharthi, Esam Aloufi, and Mohamed A. Zohdy
School of Engineering and Computer Science, Oakland University, Rochester, Michigan, USA
- 0. ...

DECEMBER 15, 2018

THERE ARE THREE SETS OF CONCURRENT SESSIONS ON December 15, 2018; SCHEDULED IN CONFERENCE ROOMS: Galleria A, Galleria B, and Galleria C with Poster Session in Lotus Ballroom 1.

-----> SESSIONS SCHEDULED IN CONFERENCE ROOM Galleria A - DECEMBER 15 <-----

SESSION 23A-ISED: SYMPOSIUM ON EDUCATION - CS & CE (CSCI-ISED)

Co-Chairs: Fabricio Herpich* and Dr. Vijayarangan Natarajan**

*Federal University of Rio Grande do Sul, Brazil

**Tata Consultancy Services Ltd (TCS), India

December 15, 2018 (Saturday); 08:20am - 10:40am

(LOCATION: Galleria A)

- 08:20 - 08:40am: Augmented Reality Game in Geography: An Orientation Activity to Elementary Education
Fabricio Herpich, Felipe Becker Nunes, and Liane Margarida Rockenbach Tarouco
Programa de Pos-Graduacao em Informatica na Educacao, Universidade Federal do Rio Grande do Sul (UFRGS), Brazil
- 08:40 - 09:00am: A Systematic Literature Review of Indicators for the Understanding of Interactions in Virtual Learning Environments
Fredy Gavilanes-Sagnay, Edison Loza-Aguirre, Diego Riofrio-Luzcando, and Marco Segura-Morales
Escuela Politecnica Nacional, Ecuador; International University SEK, Ecuador
- 09:00 - 09:20am: User Interface Design Considerations for Next Generation Learning Management Systems
Ken D. Nguyen, Muhammad Asadur Rahman
Department of Computer Science & IT, Clayton State University, Morrow, Georgia, USA
- 09:20 - 09:40am: An Experience Report on Running a Pre-College Computer Science Summer Program
Jaime Raigoza
Computer Science Department, California State University, Chico, California, USA
- 09:40 - 10:00am: Two-player Games for Learning Real-time Model Checking
Mitchell L. Neilsen
Department of Computer Science, Kansas State University, Manhattan, Kansas, USA
- 10:00 - 10:20am: Mobile Augmented Reality Impact in Student Engagement: An Analysis of the Focused Attention Dimension
Fabricio Herpich, Renan L. M. Guarese, Amaury T. Cassola, and Liane M. R. Tarouco
Programa de Pos-Graduacao em Informatica na Educacao, Universidade Federal do Rio Grande do Sul (UFRGS), Brazil
- 10:20 - 10:40am: ADL: Algorithmic Design Language
Byron A. Jeff, Ken Nguyen
Department of Computer Science and Information Technology, Clayton State University, Morrow, Georgia, USA

SESSION 24A-ISPC: SYMPOSIUM ON SIGNAL & IMAGE PROCESSING, COMPUTER VISION & PATTERN RECOGNITION (CSCI-ISPC)

Co-Chairs: Prof. Jie Yan* and Nenad Mijatovic**

*Bowie State University, USA;

**Florida Institute of Technology, USA

December 15, 2018 (Saturday); 10:40am - 12:20pm

(LOCATION: Galleria A)

- 10:40 - 11:00am: A Survey of Convolutional Neural Networks Based Solutions for Smart Parking Systems
Andres Estebanez, Praveen Meduri
Department of Computer Engineering, California State University, Sacramento, California, USA;
Department of Electrical and Electronics Engineering, California State University, Sacramento, California, USA
- 11:00 - 11:20am: A Majorization-minimization Algorithm for Estimating the Regularized Wavelet-based Density-difference
Nenad Mijatovic, Rana Haber, Anthony O. Smith, and Adrian M. Peter
Florida Institute of Technology, Melbourne, Florida, USA
- 11:20 - 11:40am: Recognizing Call Numbers for Library Books: The Problem and Issues
Hanh Pham, Andre Dvorak, Miguel Perez
Computer Science Department, State University Of New York, New Paltz, New York, USA
- 11:40a - 12:00p: Multi Sensor Performance Driven Data Fusion for Sign Language Synthesis
Ruth Agada, Tunde Ballack, Jie Yan
Bowie State University, Maryland, USA
- 12:00 - 12:20pm: FREE SLOT
- 12:20 - 01:00pm: LUNCH (On Your Own)

SESSION 25A-ISPC: SYMPOSIUM ON SIGNAL & IMAGE PROCESSING, COMPUTER VISION & PATTERN RECOGNITION (CSCI-ISPC)

Chair: Dr. Thang Nhut Nguyen

California State University Long Beach, USA

December 15, 2018 (Saturday); 01:00pm - 03:00pm

(LOCATION: Galleria A)

- 01:00 - 01:20pm: Explainable Image Caption Generator Using Attention and Bayesian Inference
Seung-Ho Han, Ho-Jin Choi
School of Computing, KAIST, Daejeon, South Korea
- 01:20 - 01:40pm: Review of Methods for the Detection of Pedestrians in Video Images
Juan Alberto Antonio Velazquez, Marcelo Romero Huertas, Roberto Alejo Eleuterio, and Erika Lopez Gonzalez
Universidad Autonoma del Estado de Mexico, Mexico;
Instituto Tecnologico de Toluca, Mexico;
Tecnologico de Estudios Superiores de Jocotitlan, Mexico
- 01:40 - 02:00pm: Spatial Markov Chains Implemented in GIS
Edgar Jardon, Eduardo Jimenez, Marcelo Romero
Universidad Autonoma del Estado de Mexico, Mexico;
El Colegio Mexiquense A.C., Zicantepec, Mexico

- 02:00 - 02:20pm: Comparison of Two Image Enhancement Techniques: Histogram Equalization and Gamma Method
Abhimanyu Sailesh, Naima Naheed
Blythewood High School, Blythewood, South Carolina, USA;
Computer Science, Physics and Engineering Department,
Benedict College, Columbia, South Carolina, USA
- 02:20 - 02:40pm: Palmprint Based Human Recognition in Unconstrained Environment
Geetika Arora, C. Jinshong Hwang, Sanchit Hira,
Kamlesh Tiwari, and Phalguni Gupta
Department of CSIS, Birla Institute of Technology and
Science, Rajasthan, India;
Department of Computer Science, Texas State University,
San Marcos, Texas, USA;
National Institute TTR, Salt Lake City, Kolkata, India
- 02:40 - 03:00pm: A High Performance CPU-GPU Algorithm for Change Detection in Satellite Images using Singular Values and Data Mining Techniques
Quoc-Nam Tran
Department of Computer Science, Southeastern Louisiana
University, Hammond, Louisiana, USA
- 03:00 - 03:40pm: **POSTER SESSIONS 3-CSCI**
December 15, 2018 (Saturday)
(LOCATION: Lotus Ballroom 1)
Refreshments will be available.
List of poster papers appears at the end of December 15's schedule.
- SESSION 26A-ISOT-ISSC: (Overlap Scope)**
SYMPOSIUM ON INTERNET OF THINGS & INTERNET OF EVERYTHING (CSCI-ISOT) +
SYMPOSIUM ON SMART CITIES & SMART MOBILITY (CSCI-ISSC)
Co-Chairs: Prof. Xiaokun Yang* and Prof. Vivek Pallipuram**
*University of Houston Clear Lake, Texas, USA;
**University of the Pacific, California, USA
December 15, 2018 (Saturday); 03:40pm - 06:00pm
(LOCATION: Galleria A)
- 03:40 - 04:00pm: A Security System Built with Mobile and IoT Technologies
Phyu Han, Glenn Price, Leonidas Deligiannidis, and
Chen-Hsiang Yu
Department of Computer Science and Networking,
Wentworth Institute of Technology, Massachusetts, USA
- 04:00 - 04:20pm: Smart City Ranking Reliability Analysis
Fangyao Liu, Yong Shi, Zhengxin Chen
Department of Information Systems and Quantitative
Analysis, University of Nebraska at Omaha, Nebraska, USA;
Department of Computer Science, University of Nebraska at
Omaha, Nebraska, USA
- 04:20 - 04:40pm: Internet of Things Home Healthcare: The Feasibility of Elderly Activity Monitoring
Luke Power, Lisa Jackson, Sarah Dunnett
Department of Aeronautical and Automotive Engineering,
Loughborough University, United Kingdom, UK

- 04:40 - 05:00pm: Implementation of GUI for OpenThread
Jitendra Gopaluni, Ishaq Unwala, Jiang Lu, Xiaokun Yang
Computer Engineering, University of Houston Clear Lake,
Houston, Texas, USA
- 05:00 - 05:20pm: FREE SLOT
- 05:20 - 05:40pm: FREE SLOT
- 05:40 - 06:00pm: FREE SLOT
- 06:00 - 06:20pm: **Closing Remarks (LOCATION: Galleria A)**
- 06:20 - 08:00pm: *Any Late Papers and/or Informal Participant-driven Panel Discussions*

-----> *SESSIONS SCHEDULED IN CONFERENCE ROOM Galleria B - DECEMBER 15* <-----

- SESSION 27B-ISHI: SYMPOSIUM ON HEALTH INFORMATICS & MEDICAL SYSTEMS
(CSCI-ISHI)
Chair: TBA
December 15, 2018 (Saturday); 08:20am - 11:40am
(LOCATION: Galleria B)**
- 08:20 - 08:40am: FREE SLOT
- 08:40 - 09:00am: FREE SLOT
- 09:00 - 09:20am: Serious Games for Hand Therapy
Dirk Reichardt, Ebraheem Abdelhafez, Yasmine Abdulfattah
Department of Computer Science, DHBW Stuttgart,
Stuttgart, Germany;
Media Engineering and Technology, German University in
Cairo, Egypt
- 09:20 - 09:40am: Agent-Based Modeling of a Network of Emergency Departments
in Urban Environments
Elhabib Moustaid, Romain Richard, Sebastiaan Meijer
Biomedical Engineering and Health Systems, Royal Institute
of Technology KTH, Stockholm, Sweden
- 09:40 - 10:00am: Interactive Dimensionality Reduction for Improving Patient
Adherence in Remote Health Monitoring
Apostolos Kalatzis, Mohammad Pourhomayoun
Department of Computer Science,
California State University, Los Angeles, California, USA
- 10:00 - 10:20am: Secure Telemedicine System
Hyun-A Park
Department of Medical Science, KyungDong University,
Kangwon-do, South Korea
- 10:20 - 10:40am: **BREAK (Lotus Ballroom 1)**

- 10:40 - 11:00am: Landmark-less Registration of Craniomaxillofacial Images Acquired from 3D Photography and CBCT with Disturbance-Region Removal
Shu-Yen Wan, Che-Yao Chang, Lun-Jou Lo
Dept. of Info. Management, Chang Gung University, Taiwan;
Graduate Institute of Business & Management, Chang Gung University, Taiwan; Craniofacial Research Center, Chang Gung Memorial Hospital, Taiwan
- 11:00 - 11:20am: A Proposal for Postpartum support based on Natural Language Generation Model
Joao Luis Zeni Montenegro, Cristiano Andre da Costa, Rodrigo Da Rosa Righi, Alex Roehrs, Elson Romeu Farias
Software Innovation Laboratory - SOFTWARELAB, Applied Computing Graduate Program. Universidade do Vale do Rio dos Sinos, Sao Leopoldo, Brazil
- 11:20 - 11:40am: Sensing, Smart and Sustainable Products to Support Health and Well-being in Communities
Arturo Molina, Jhonattan Miranda, Pedro Ponce, Julieta Noguez, Jose M. Molina, and Edgar O. Lopez
School of Engineering and Sciences, Tecnologico de Monterrey, Mexico City, Mexico
- SESSION 28B-ISCW: SYMPOSIUM ON CYBER WARFARE, CYBER DEFENSE, & CYBER SECURITY (CSCI-ISCW)**
Co-Chairs: Prof. Dr. Karl Christoph Ruland* and Prof. Charlie Obimbo**
*Chair, Data Communications Systems, University of Siegen, Germany;
**School of CS, University of Guelph, Canada
December 15, 2018 (Saturday); 11:40am - 03:00pm
(LOCATION: Galleria B)
- 11:40a - 12:00p: Towards an Influence Model for Cybersecurity and Information Warfare
Jeremy Straub, Terry Traylor
Department of Computer Science, North Dakota State University, Fargo, North Dakota, USA;
United States Marine Corps, Fargo, North Dakota, USA
- 12:00 - 12:20pm: A Proposal for an Improved Distributed Architecture for OpenPGP's Web of Trust
Daniel Maldonado-Ruiz, Edison Loza-Aguirre, Jenny Torres
Departamento de Informatica y Ciencias de la Computacion Escuela Politecnica Nacional, Quito-Ecuador, Ecuador
- 12:20 - 01:00pm: LUNCH (On Your Own)**
- 01:00 - 01:20pm: User Authentication Method for Computer-based Online Testing by Analysis of Keystroke Timing at the Input of a Family Name
Masanori Nakakuni, Hiroshi Dozono
Information Technology Center, Fukuoka University, Fukuoka, Japan;
Faculty of Science and Engineering, Saga University, Saga, Japan
- 01:20 - 01:40pm: Insider Threats Detection using CNN-LSTM Model
Ahmed Saadi, Zaid Al-Ibadi, Yan Tong, Csilla Farkas
Department of Computer Science & Engineering, University of South Carolina, South Carolina, USA

- 01:40 - 02:00pm: Cognitive Security Tasks using Big Data Tools
Roberto Andrade, Jenny Torres, Luis Tello-Oquendo
Escuela Politecnica Nacional, Quito, Ecuador;
Universidad Nacional de Chimborazo, Riobamba, Ecuador
- 02:00 - 02:20pm: Analysis of Vulnerabilities of Web Browser Extensions
Charlie Obimbo, Yong Zhou, Randy Nguyen
School of Computer Science, University of Guelph,
Guelph, ON, Canada
- 02:20 - 02:40pm: Internet Worms and the Weakest Link: Human Error
Charlie Obimbo, Avery Speller, Katherine Myers,
Andrew Burke, and Matthew Blatz
School of Computer Science, University of Guelph,
Guelph, ON, Canada
- 02:40 - 03:00pm: FREE SLOT
- 03:00 - 03:40pm: **POSTER SESSIONS 3-CSCI**
December 15, 2018 (Saturday)
(LOCATION: Lotus Ballroom 1)
Refreshments will be available.
List of poster papers appears at the end of December 15's schedule.
- SESSION 29B-ISCW-ISM: (Overlap Scope)**
SYMPOSIUM ON CYBER WARFARE, CYBER DEFENSE, & CYBER
SECURITY (CSCI-ISCW) +
SYMPOSIUM ON MOBILE COMPUTING, WIRELESS NETWORKS, &
SECURITY (CSCI-ISM)
Chair: Prof. Dr. Karl Christoph Ruland
Chair, Data Communications Systems,
University of Siegen, Germany
December 15, 2018 (Saturday); 03:40pm - 06:00pm
(LOCATION: Galleria B)
- 03:40 - 04:00pm: Robust Infrastructure Architecture Improves the
Performance and Responsiveness of Cyber Analytics
Darla Sligh
Computer Information Security, University of Maryland
University College, Largo, Maryland, USA
- 04:00 - 04:20pm: Campus Network Security: Threats, Analysis & Strategies
Payman Khani, Mehrdad Sharbaf, Salar Faraji
California State University Dominguez Hills, CA, USA;
Infotech International Company
- 04:20 - 04:40pm: Mobile Crowdsensing from Sensor Devices Using Bluetooth
Low Energy (BLE)
Yosuke Tsuchiya, Norihiro Ishikawa
Aoyamagakuin University, Tokyo, Japan;
Komazawa University, Tokyo, Japan
- 04:40 - 05:00pm: Multihop Ad Hoc Networks for Disaster Response Scenarios
C. Jinshong Hwang, Ashwani Kush, Arun Kumar Yadav
Texas State University, Sam Marcos, Texas, USA;
Kurukshetra University, India
- 05:00 - 05:20pm: Path-Selection Method Based on the Available Bandwidth
of Interfaces
Daiki Ishida, Daiki Nobayashi, Takeshi Ikenaga
Department of Electrical and Electronic Engineering,
Kyushu Institute of Technology, Fukuoka, Japan

05:20 - 05:40pm: FREE SLOT

05:40 - 06:00pm: FREE SLOT

06:00 - 06:20pm: Closing Remarks (LOCATION: Galleria A)

06:20 - 08:00pm: *Any Late Papers and/or Informal Participant-driven Panel Discussions*

-----> SESSIONS SCHEDULED IN CONFERENCE ROOM Galleria C - DECEMBER 15 <-----

SESSION 30C-ISAI: SYMPOSIUM ON ARTIFICIAL INTELLIGENCE (CSCI-ISAI)

Chair: Zhipeng Huang

Purdue University Northwest, Indiana, USA

December 15, 2018 (Saturday); 08:20am - 11:20am

(LOCATION: Galleria C)

08:20 - 08:40am: Optimizing Index of News Articles by Table Based
Version of K Nearest Neighbors
Duke Taeho Jo
School of Game, Hongik University, Sejong, South Korea

08:40 - 09:00am: Detection of North Atlantic Right Whales with a Hybrid
System of CNN and Dictionary Learning
Ali K. Ibrahim, Hanqi Zhuang, Nurgun Erdol, and
Ali Muhamed Ali
Electrical Engineering and Computer Science,
Florida Atlantic University, Boca Raton, Florida, USA

09:00 - 09:20am: A Fully Biological Perspective on AI-assisted Decision
Making
Thang Nhut Nguyen
Information Systems, California State University
Long Beach, California, USA

09:20 - 09:40am: A Proposed Method to Improve Highway Construction Quality
Using Machine Learning
Vignesh Saravanan, Mohammad Pourhomayoun, Mehran Mazari
Department of Computer Science, California State
University Los Angeles, California, USA;
Department of Civil Engineering, California State
University Los Angeles, California, USA

09:40 - 10:00am: Towards a Simulation Platform for Generation of Synthetic
Videos for Human Activity Recognition
Gary Plunkett, Wesley Deneke, Sam Dixon, Robert Harley
Computer Science Department, Western Washington
University, Bellingham, Washington, USA

10:00 - 10:20am: Table Based K Nearest Neighbor For Word Categorization
in News Articles
Duke Taeho Jo
School of Game, Hongik University, Sejong, South Korea

10:20 - 10:40am: BREAK (Lotus Ballroom 1)

10:40 - 11:00am: Using Table Based AHC Algorithm for Clustering Words in Domain on Current Affairs
Duke Taeho Jo
School of Game, Hongik University, Sejong, South Korea

11:00 - 11:20am: Keyword Extraction in News Articles using Table Based K Nearest Neighbors
Duke Taeho Jo
School of Game, Hongik University, Sejong, South Korea

SESSION 31C-ISOT-ISBD: (Overlap Scope)

SYMPOSIUM ON INTERNET OF THINGS & INTERNET OF EVERYTHING (CSCI-ISOT) +

SYMPOSIUM ON BIG DATA AND DATA SCIENCE (CSCI-ISBD)

**Chair: Dr. Antonio Capodieci
Architectures Lab (GSA Lab), Dept of Innovation Engineering, University of Salento, Italy**

December 15, 2018 (Saturday); 11:20am - 03:00pm

(LOCATION: Galleria C)

11:20 - 11:40am: Experimental Performance Evaluation of the Collisions in LoRa Communications
Yuya Ishida, Daiki Nobayashi, Takeshi Ikenaga
Department of Electrical and Electronic Engineering,
Kyushu Institute of Technology, Fukuoka, Japan

11:40a - 12:00p: Solar Powered Raspberry Pi-Based Cellular Modem Integrated Real-time Houston Toad Calls Detection System Design using Neural Network Trained Model
Abdullah Al Bashit, Damian Valles
Ingram School of Engineering, Texas State University,
San Marcos, Texas, USA

12:00 - 12:20pm: FREE SLOT

12:20 - 01:00pm: LUNCH (On Your Own)

SESSION 31C-ISOT-ISBD: Continued ... (Overlap Scope)

SYMPOSIUM ON INTERNET OF THINGS & INTERNET OF EVERYTHING (CSCI-ISOT) +

SYMPOSIUM ON BIG DATA AND DATA SCIENCE (CSCI-ISBD)

**Chair: Dr. Antonio Capodieci
Architectures Lab (GSA Lab), Dept of Innovation Engineering, University of Salento, Italy**

December 15, 2018 (Saturday); 11:20am - 03:00pm

(LOCATION: Galleria C)

01:00 - 01:20pm: Towards Dynamic On-Demand Fog Computing Formation Based on Containerization Technology
Hani Sami, Azzam Mourad
Department of Computer Science and Mathematics,
Lebanese American University, Lebanon

01:20 - 01:40pm: Ambient Assisted Living for Elderly People Using Smart Personal Assistant
Antonio Capodieci, Luca Mainetti, Paolo Panarese
Department of Innovation Engineering, Università del Salento, Lecce, Italy

- 01:40 - 02:00pm: Tourism and Heritage Routes Including Visitants Profile Adaptation and Context Awareness
Tania Tanzin Hoque, Luis Ferreira, Luiz Faria, Constantino Martins, Rodrigo Mesquita, Luis Conceicao, Goreti Marreiros, and Carlos Ramos
GECAD - Research Group on Engineering and Intelligent Computing for Innovation and Development, Polytechnic of Porto, Portugal
- 02:00 - 02:20pm: Two-factor Authentication LRP-AKE, Revisited
SeongHan Shin
National Institute of Advanced Industrial Science and Technology (AIST), Tokyo, Japan
- 02:20 - 02:40pm: Towards a Lightweight Policy-Based Privacy Enforcing Approach for IoT
Mohamad Chehab, Azzam Mourad
Department of Computer Science and Mathematics, Lebanese American University, Lebanon
- 02:40 - 03:00pm: A Novel Approach: Airline Delay Prediction Using Machine Learning
Swaminathan Meenakshisundaram, Shubham Sinha, Gautham Balasubramanian, and Natarajan Vijayarangan
Tata Consultancy Services Limited (TCS) Innovation Labs, India; Indian Institute of Technology - Madras, India
- 03:00 - 03:40pm: **POSTER SESSIONS 3-CSCI**
December 15, 2018 (Saturday)
(LOCATION: Lotus Ballroom 1)
Refreshments will be available.
List of poster papers appears at the end of December 15's schedule.
- SESSION 32C-ISBD: SYMPOSIUM ON BIG DATA AND DATA SCIENCE (CSCI-ISBD)**
Chair: Prof. Sangjin Kim
University of Texas at El Paso, USA
December 15, 2018 (Saturday); 03:40pm - 06:00pm
(LOCATION: Galleria C)
- 03:40 - 04:00pm: Application and Adoption of Big Data Technologies in SMEs
Lila Rajabion
Department of IT, College of Business, University of South Florida, Sarasota-Manatee, Florida, USA
- 04:00 - 04:20pm: Data-enabled Computational Multiscale Method in Materials Science and Engineering
Shaoping Xiao, Amaury Lendasse, Renjie Hu
Department of Mechanical Engineering, University of Iowa, Iowa City, Iowa, USA;
Department of Industrial and System Engineering, University of Iowa, Iowa City, Iowa, USA;
Information and Logistics Technology Department, University of Houston, Houston, Texas, USA

- 04:20 - 04:40pm: Research Collaboration Recommendation for Universities based on Data Science
Neil Hernandez-Gress, Hector G. Ceballos, and Nathalie Galeano
Associated ViceRector for Research, Tecnologico de Monterrey, Monterrey, Mexico;
Research Data Science, Tecnologico de Monterrey, Monterrey, Mexico;
Research Intelligence, Tecnologico de Monterrey, Monterrey, Mexico
- 04:40 - 05:00pm: A Framework for Subscribing to Open Data by Organizations within the Southern Africa Development Community (SADC)
Barnabas N. Gatsheni, Kassim M. Mwitondi
Department of Applied Information Systems, University of Johannesburg, South Africa;
Faculty of Arts, Computing, Engineering and Sciences, Sheffield Hallam University, United Kingdom
- 05:00 - 05:20pm: Impact of Data Reduction Techniques on Classification
Reham Alamro, Abdou Youssef
School of Engineering and Applied Science,
The George Washington University, Washington, DC, USA
- 05:20 - 05:40pm: Developing HPCC based COPD Readmission Risk Analysis Platform
Piyush Jain, Ankur Agarwal, Ravi Behara, and Christopher Baechle
Department of CEE & CS, Florida Atlantic University, Boca Raton, Florida, USA;
Department of IT and Operations Management, Florida Atlantic University, Boca Raton, Florida, USA;
Department of Advanced Technology, Indian River State College, Fort Pierce, Florida, USA
- 05:40 - 06:00pm: To Read or To Do? That's The Task: Using Transfer Learning to Detect the Intent of an Email
Zaid Alibadi, Jose M. Vidal
Computer Science and Engineering Department, University of South Carolina, Columbia, South Carolina, USA
- 06:00 - 06:20pm: **Closing Remarks (LOCATION: Galleria A)**
- 06:20 - 08:00pm: *Any Late Papers and/or Informal Participant-driven Panel Discussions*

LIST OF PAPERS IN POSTER SESSIONS 3-CSCI

03:00 - 03:40pm: December 15, 2018 (Saturday)

(LOCATION: Lotus Ballroom 1)

Refreshments will be available.

- 0. Gamification of Undergraduate Computer Science
Data Structures
Brandon P. Beckwith, Dewan Tanvir Ahmed
Department of Computer Science, University of North
Carolina at Charlotte, North Carolina, USA
- 0. Cross Platform Configurable ERP Framework
Petr Capek, Erik Kral, Alena Kostalova, Roman Senkerik
Faculty of Applied Informatics, Tomas Bata University
in Zlin, Czech Republic
- 0. A New Proposal of Smart Lighting System Based on Radar
and Camera Sensors for Smart City
Seungeon Song, Sangdong Kim, Young Seok Jin, Dong Ha Lee,
and Jong Hun Lee
Research Institute of Convergence, DGIST, South Korea
- 0. Re-routing Costs Evaluation for the Inflight Drone
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