

# ICICS'20 TECHNICAL PROGRAM

The 11<sup>th</sup> International Conference on Information & Communication Systems

April 7<sup>th</sup> – 9<sup>th</sup> 2020, Irbid, Jordan



## Tuesday, April 7<sup>th</sup>

10:00	<b>Conference Opening</b>	
10:00-11:00	<p><b>Keynote Speech1:</b></p> <p><b>Resource Allocation and Scheduling of Real-Time Applications in the Cloud and in the Fog</b></p> <p><i>Prof. Helen Karatza</i></p> <p><b>Chair: Muhannad Quwaider</b></p>	<b>Channel-1</b>
11:00-11:20	<b>Break</b>	
11:20-12:40	<p><b>Session 1: Data Science and Its Applications (1)</b></p> <p>Chair: Qussai Yaseen</p>	<b>Channel-1</b>
12:40-13:00	<b>Break</b>	
13:00-14:20	<p><b>Session 2: Data Science and Its Applications (2)</b></p> <p>Chair: Qussai Yaseen</p>	<b>Channel-1</b>
14:20-14:40	<b>Break</b>	
14:40-16:40	<p><b>Session 3: Security, privacy, and digital forensics</b></p> <p>Chair: Ahmed Shatnawi</p>	

		Channel-1
	<b>End Channel-1</b>	
<b>11:20-12:40</b>	<b>Session 4: Networking and Mobile Computing</b> Chair: Mohammad Al-shurman	Channel-2
<b>12:40-13:00</b>	<b>Break</b>	
<b>13:00-14:20</b>	<b>Session 5: Networking and Mobile Computing and Software</b> Chair: Ziad Al-Sharif	Channel-2
<b>14:20-14:40</b>	<b>Break</b>	
<b>14:40-16:00</b>	<b>Session 6: Multimedia, Computer Vision and Image Processing</b> Chairs: Mohammad Alsmirat	Channel-2
	<b>End Channel-2</b>	

## Wednesday, April 8<sup>th</sup>

<b>10:00-11:00</b>	<p style="text-align: center;"><b>Keynote Speech2:</b></p> <p style="text-align: center;"><i>Quest for machine intelligence: From estimation to statistics and machine learning</i></p> <p style="text-align: center;"><i>Prof. Pavel Loskot</i></p> <p style="text-align: center;"><b>Chair: Mohammad Banat</b></p>	Channel-2
<b>11:00-11:20</b>	<b>Break</b>	
<b>11:20-12:40</b>	<b>Session 1: AI and Deep Learning (1)</b> Chair: Omar Alzoubi	Channel-1
<b>12:40-13:00</b>	<b>Break</b>	
<b>13:00-14:20</b>	<b>Session 2: AI and Deep Learning (2)</b> Chair: Lu'ay Alawneh	

		<b>Channel-1</b>
<b>14:20-14:40</b>	<b>Break</b>	
<b>14:40-16:40</b>	<b>Session 3: AI and Deep Learning (3)</b> Chair: Omar Alzoubi	<b>Channel-1</b>
	<b>End Channel-1</b>	
<b>11:20-12:40</b>	<b>Session 4: Communication Systems and Signal Processing (1)</b> Chair: Mohammad Banat	<b>Channel-2</b>
<b>12:40-13:00</b>	<b>Break</b>	
<b>13:00-14:20</b>	<b>Session 5: Communication Systems and Signal Processing (2)</b> Chair: Mohammad Banat	<b>Channel-2</b>
<b>14:20-14:40</b>	<b>Break</b>	
<b>14:40-16:00</b>	<b>Session 6: Cloud and High Performance Computing</b> Chair: Anas Bsoul	<b>Channel-2</b>
	<b>End Channel-2</b>	

## Thursday, April 9<sup>th</sup>

<b>10:00-11:00</b>	<b>Keynote Speech3:</b>  <i>Get Ready for an Autonomous Data-Driven Future</i>  Prof. Mutaz Al-Debei Chair: Ahmad Al-Aiad	<b>Channel-1</b>
<b>11:00-11:20</b>	<b>Break</b>	
<b>11:20-13:00</b>	<b>Session 1: Information Systems and Health Informatics (1)</b>	

	Chair: Ahmad Al-Aiad	Channel-1
13:00-13:20	<b>Break</b>	
13:20-15:00	Session 2: <b>Information Systems and Health Informatics (2)</b> Chair: Ahmad Al-Aiad	Channel-1
15:00-15:20	<b>Break</b>	
15:20-16:40	Session 3: <b>AI and Deep Learning (4)</b> Chair: Omar Alzoubi	Channel-1
	<b>End Channel-1</b>	
11:20-12:40	Session 4: <b>Internet of Things (1)</b> Chair: Muneer Bani Yaseen	Channel-2
12:40-13:00	<b>Break</b>	
13:00-14:20	Session 5: <b>Internet of Things (2)</b> Chair: Wail Mardini	Channel-2
	<b>End Channel-2</b>	

## Detailed Program

1 <sup>st</sup> DAY	Tuesday, April 7 <sup>th</sup>
10:00	Conference Opening
10:00-11:00	<p><b>Keynote Speech1:</b></p> <p><b>Resource Allocation and Scheduling of Real-Time Applications in the Cloud and in the Fog</b></p> <p><i>Prof. Helen Karatza</i></p> <p><b>Chair: Muhannad Quwaider</b></p>
11:00-11:20	<b>Break</b>
11:20-12:40	<p><b>Session 1: Data Science and Its Applications (1)</b></p> <p>Chair: Qussai Yaseen</p>
11:20-11:40	<p><b>5:</b> Boosting Methods for Predicting Firemen Interventions  <b>Selene Cerna*</b>, <b>Christophe Guyeux</b>, <b>Héber H. Arcolezi</b> and <b>Guillaume Royer</b></p>
11:40-12:00	<p><b>32:</b> Employing Deep Learning Methods for Predicting Helpful Reviews  <b>Abdaraheem Alsmadi*</b>, <b>Shadi Alzu'Bi</b>, <b>Bilal Hawashin</b>, <b>Mahmoud Al-Ayyoub</b> and <b>Yaser Jararweh</b></p>
12:00-12:20	<p><b>51:</b> SQL, NewSQL, and NOSQL Databases: A Comparative Survey  <b>Tariq Khasawneh*</b>, <b>Mahmoud Al Sahlee</b> and <b>Ali Safia</b></p>
12:20-12:40	<p><b>71:</b> An Approach to Improve Data Quality from Big Data Aspect by Sensitive Cost and Time  <b>Banan Mohammad</b>, <b>Wael Alzyadat*</b>, <b>Mohammad Al-Fayoumi</b>, <b>Ruba El Hawi</b> and <b>Aysh Alhroob</b></p>
12:40-13:00	<b>Break</b>
13:00-14:20	<p><b>Session 2: Data Science and Its Applications (2)</b></p> <p>Chair: Qussai Yaseen</p>
13:00-13:20	<p><b>81:</b> Building Cognitive Profiles of Learners Using EEG  <b>Mohamed Elkerdawy</b>, <b>Mohamed Elhalaby</b>, <b>Afnan Hassan</b>, <b>Mohamed Maher</b>, <b>Doaa Shawky*</b> and <b>Ashraf Badawi</b></p>
13:20-13:40	<p><b>84:</b> Classification on Web Application Requests  <b>Samar Gharaibeh</b>, <b>Shatha Melhem</b> and <b>Hassan Najadat*</b></p>
13:40-14:00	<p><b>105:</b> A Gene Prediction Function for Type 2 Diabetes Mellitus using Logistic Regression  <b>Hala Alshamlan</b></p>

Channel-1

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14:00-14:20	<b>112:</b> A Pictorial Performance Comparison of Spatial Indexes <b>Esam Al-Nsour*, Azzam Sleit and Mohammad Alshraideh</b>	
<b>14:20-14:40</b>	<b>Break</b>	
<b>14:40-16:40</b>	<b>Session 3: Security, privacy, and digital forensics</b> Chair: <b>Ahmed Shatnawi</b>	
		<b>Channel-1</b>
14:40-15:00	<b>4:</b> Secure Voting System Using Distributed Ledger Technology <b>Asem Abuelhija, Aiah Abudouleh, Baraah Abumuhsen and Fahed Awad*</b>	
15:00-15:20	<b>12:</b> Digital Forensics and Analysis of Deepfake Videos <b>Muosa Jafar*, Mohammad Ababneh, Mohammed Al-Zoube and Ammar Elhassan</b>	
15:20-15:40	<b>47:</b> Deanonimization of Litecoin Through Transaction-Linkage Attacks <b>Zongyang Zhang*, Jiayuan Yin, Yizhong Liu and Jianwei Liu</b>	
15:40-16:00	<b>75:</b> Drone Forensics: A Detailed Analysis of Emerging DJI Models <b>Maryam Yousef* and Farkhund Iqbal</b>	
16:00-16:20	<b>76:</b> State of the Art in Digital Forensics for Small Scale Digital Devices <b>Maryam Yousef*, Haifa Al Hosani, Shaima Al Shouq and Farkhund Iqbal</b>	
16:20-16:40	<b>121:</b> A Post-Mortem Forensic Approach for the Kik Messenger on Android <b>Ahmad Al-Rawashdeh, Ziad Al-Sharif* and Mohammed Al-Saleh</b>	
	<b>End Channel-1</b>	
<b>11:20-12:40</b>	<b>Session 4: Networking and Mobile Computing</b> Chair: <b>Mohammad Al-shurman</b>	
		<b>Channel-2</b>
11:20-11:40	<b>46:</b> Intelligent Methods for Accurately Detecting Phishing Websites <b>Almaha Abuzurairq*, Mouhammd Alkasassbeh and Mohammad Almseidin</b>	
11:40-12:00	<b>77:</b> 5G mmWave Indoor Location Identification Using Beamforming and RSSI <b>Omar Alhory*, Amran Shoushrah, Moath Alshunnaq, Husam Alsuri and Fahed Awad</b>	
12:00-12:20	<b>90:</b> An Upward Compatible Ethernet Device Driver for Bare PC Applications <b>Faris Almansour*, Ramesh Karne, Alexander Wijesinha, Rasha Almajed and Hamdan Alabsi</b>	
12:20-12:40	<b>93:</b> LEACH Protocol Enhancement for Increasing WSN Lifetime <b>Seham Nasr* and Muhannad Quwaider</b>	
<b>12:40-13:00</b>	<b>Break</b>	
<b>13:00-14:20</b>	<b>Session 5: Networking and Mobile Computing and Software</b> Chair: <b>Ziad Al-Sharif</b>	
		<b>Channel-2</b>
13:00-13:20	<b>119:</b> Geometric-Based Localization for Wireless Sensor Networks <b>Alaa Altarazi, Nailah Al-Madi and Fahed Awad*</b>	
13:20-13:40	<b>124:</b> Slice Selection In 5G Networks: Novel Approach For Accessing Multiple Slices Simultaneously	

	<b>Mohammad Shurman*, Jumanah Rawashdeh and Aya Jaradat</b>
13:40-14:00	<b>11:</b> A Fuzzy Incremental and Semantic Trending Topic Detection in Social Feeds <b>Mona Abou-Of</b>
14:00-14:20	<b>131:</b> Evaluation of Accessibility and Usability of Higher Education Institutions' Websites of Jordan <b>Maram Baroudi, Mohammad Alia* and Abdalla Marashdih</b>
<b>14:20-14:40</b>	<b>Break</b>
<b>14:40-16:00</b>	<b>Session 6: Multimedia, Computer Vision and Image Processing</b> Chairs: <b>Mohammad Alsmirat</b> <b>Channel-2</b>
14:40-15:00	<b>2:</b> A Novel High Capacity Data Hiding Algorithm using Salt and Pepper Noise <b>Abdel Rahman Idrais*, Salah Harb, M. Omair Ahmad and M.N.S. Swamy</b>
15:00-15:20	<b>23:</b> Lightweight Indoor Modeling Based on Vertical Planes and Lines <b>Yin Zou, Lidong Chen and Jie Jiang*</b>
15:20-15:40	<b>63:</b> KIDSTAR: Augmented Reality to Measure Imagination Using Dynamic Visualisation <b>Neven Elsayed</b>
15:40-16:00	<b>106:</b> A review of recent progress in deep learning-based methods for MRI brain tumor segmentation <b>Sarah Chihati* and Djamel Gaceb</b>
	<b>End Channel-2</b>

2 <sup>nd</sup> DAY	Wednesday, April 8 <sup>th</sup>	
Page - 8 - of 12  <b>10:00-11:00</b>	<b>Keynote Speech2:</b> <i>Quest for machine intelligence: From estimation to statistics and machine learning</i> Prof. Pavel Loskot <b>Chair: Mohammad Banat</b> <span style="float: right;"><b>Channel-2</b></span>	
<b>11:00-11:20</b>	<b>Break</b>	
<b>11:20-12:40</b>	<b>Session 1: AI and Deep Learning (1)</b> Chair: Omar Alzoubi <span style="float: right;"><b>Channel-1</b></span>	
11:20-11:40	<b>1:</b> Paraphrasing Identification Techniques in English and Arabic Texts <b>Marwah Alian* and Arafat Awajan</b>	
11:40-12:00	<b>29:</b> Towards a Direct Mental Based Decision Making: Electroencephalography (EEG) Case Study <b>Yazeed Hasan, Motaz Al-Hami* and Subhieh El-Salhi</b>	
12:00-12:20	<b>33:</b> Neural Machine Translation from Jordanian Dialect to Modern Standard Arabic <b>Roqayah Al-Ibrahim and Rehab Duwairi*</b>	
12:20-12:40	<b>40:</b> Arabic Sentiment Analysis Based on Salp Swarm Algorithm with S-shaped Transfer Functions <b>Abdullah Alzaqebah*, Bushra Smadi and Bassam Hammo</b>	
<b>12:40-13:00</b>	<b>Break</b>	
<b>13:00-14:20</b>	<b>Session 2: AI and Deep Learning (2)</b> Chair: Luay Alawneh <span style="float: right;"><b>Channel-1</b></span>	
13:00-13:20	<b>61:</b> Evaluation of Arabic to English Machine Translation Systems <b>Jezia Zakraoui, Moutaz Saleh*, Somaya Al-Maadeed and Jihad Mohamad Alja'am</b>	
13:20-13:40	<b>62:</b> Whats Trending? An Efficient Trending Research Topics Extractor and Recommender <b>Shadi Alzubi*, Bilal Hawashin, Ala Mughaid and Yaser Jararweh</b>	
13:40-14:00	<b>66:</b> Brain Tumor Detection Using Artificial Convolutional Neural Networks <b>Suhib Irsheidat and Rehab Duwairi*</b>	
14:00-14:20	<b>69:</b> Credit Card Fraud Detection based on Machine and Deep Learning <b>Hassan Najadat*, Ola Altit, Ayah Abu Aqouleh and Mutaz Younes</b>	
<b>14:20-14:40</b>	<b>Break</b>	
<b>14:40-16:40</b>	<b>Session 3: AI and Deep Learning (3)</b> Chair: Omar Alzoubi <span style="float: right;"><b>Channel-1</b></span>	



14:40-15:00	<b>73:</b> Solving Multiple Traveling Salesmen Problem using Discrete Pigeon Inspired Optimizer <b>Hadeel Alazzam, Abdulsalam Alsmady and Wail Mardini*</b>
15:00-15:20	<b>80:</b> A Deep Learning Approach for Classifying Emotions from Physiological Data <b>Omar Alzoubi*, Buthina Almakhadmeh, Saja Tawalbeh, Muneer Bani Yassien and Ismail Hmeidi</b>
15:20-15:40	<b>83:</b> A Convolutional Neural Network Model to Detect Illegitimate URLs <b>Nabeel Al-Milli and Bassam Hammo*</b>
15:40-16:00	<b>88:</b> EmoDet2: Emotion Detection in English Textual Dialogue using BERT and BiLSTM Models <b>Hani Al-Omari, Malak Abdullah* and Samira Shaikh</b>
16:00-16:20	<b>111:</b> A long short-term memory deep learning framework for explainable recommendation <b>Hafed Zarzour, Yaser Jararweh, Mahmoud Hammad* and Mohammed Al-Smadi</b>
16:20-16:40	<b>113:</b> An effective model-based trust collaborative filtering for explainable recommendations <b>Hafed Zarzour, Yaser Jararweh and Ziad Al-Sharif*</b>
	<b>End Channel-1</b>
<b>11:20-12:40</b>	<b>Session 4: Communication Systems and Signal Processing (1)</b> Chair: <b>Mohammad Banat</b> <b>Channel-2</b>
11:20-11:40	<b>9:</b> Analysis of the Influence of the Channel Model on the Optimum Switching Points in an Adaptive FEC System in a Nakagami Fading Channel <b>Elvira Diogo* and Jose Brito</b>
11:40-12:00	<b>18:</b> Compact UWB Bowtie Antenna with Triple Rejection Bands <b>Ali Salim, Yanal Faouri* and Saleh Baqaleb</b>
12:00-12:20	<b>19:</b> Multiband Meander UWB Bowtie Antenna with Six Rejection Bands <b>Ali Salim*, Saleh Baqaleb and Yanal Faouri</b>
12:20-12:40	<b>58:</b> Review on LEACH Protocol <b>Noor Qubbaj*, Anas Abu Taleb and Walid Salameh</b>
<b>12:40-13:00</b>	<b>Break</b>
<b>13:00-14:20</b>	<b>Session 5: Communication Systems and Signal Processing (2)</b> Chair: <b>Mohammad Banat</b> <b>Channel-2</b>
13:00-13:20	<b>59:</b> Outage Analysis of Relay Assisted Cooperative Non-Orthogonal Multiple Access systems Over Nakagami-m Fading <b>Sari Khatalin* and Hadeel Miqdadi</b>
13:20-13:40	<b>85:</b> The Effect of Complementary Split Rings on the Performance of On-body Patch Antenna <b>Rula Alrawashdeh* and Murad Alhiyari</b>
13:40-14:00	<b>102:</b> A New Scaler for the Expanded 4-Moduli Set $2^k-1, 2^k+1, 2^{2k}+1, 2^{2k}$ <b>Ahmad Hiasat</b>

14:00-14:20	<b>48:</b> IoT Parking Apps with Car Plate Recognition for Smart City using Node Red <b>Mohd Nazri*, Muhammad Alam, Hannah Sofian and Aznida Abu Bakar</b>
<b>14:20-14:40</b>	<b>Break</b>
<b>14:40-16:00</b>	<b>Session 6: Cloud and High Performance Computing</b> Chair: <b>Anas Bsoul</b> <b>Channel-2</b>
14:40-15:00	<b>56:</b> RAPID HIGH-LEVEL FPGA RESOURCE ESTIMATION FOR A NOVEL HETEROGENEOUS PLATFORM SCHEDULING SCHEME <b>Ahmad Alzoubi* and Tatas Konstantinos</b>
15:00-15:20	<b>70:</b> Benchmarking Microsoft Azure Virtual Machines for the use of HPC applications <b>Rawan Aljamal*, Ali El-Mousa and Fahed Jubair</b>
15:20-15:40	<b>104:</b> A One-Cycle Asynchronous FIFO Queue Buffer Circuit <b>Saleh Abdel-Hafeez* and Muhannad Quwaider</b>
15:40-16:00	<b>127:</b> Scheduling a Job Mix of Bag-of-Tasks and Bag-of-Task-Chains on Distributed Resources <b>Georgios Stavrinos and Helen Karatza*</b>
	<b>End Channel-2</b>

<b>3<sup>rd</sup> DAY</b>	<b>Thursday, April 9<sup>th</sup></b>
<b>10:00-11:00</b>	<b>Keynote Speech3:</b>  <i>Get Ready for an Autonomous Data-Driven Future</i>  <i>Prof. Mutaz Al-Debei</i> <b>Chair: Ahmad Al-Aiad</b> <b>Channel-1</b>
<b>11:00-11:20</b>	<b>Break</b>
<b>11:20-13:00</b>	<b>Session 1: Information Systems and Health Informatics (1)</b> Chair: <b>Ahmad Al-Aiad</b> <b>Channel-1</b>
11:20-11:40	<b>20:</b> Analyzing Social Media Opinions Using Data Analytics <b>Hassan Najadat*, Amal Alzu'Bi, Farah Shatnawi, Saif Rawashdeh and Walaa Eyadat</b>
11:40-12:00	<b>22:</b> Why Companies in Jordan Should adopt e-Business Solutions? <b>Abdallah Albatineh and Abdallah Qusef*</b>

12:00-12:20	<b>24:</b> Overview of Positron Emission Tomography (PET) for Brain Functions Degeneration Classification <b>Sanaa Abu Alasal, Emran Al Bashabsheh and Hassan Najadat*</b>
12:20-12:40	<b>28:</b> An Energy Efficient Strategy for Assignment of Electric Vehicles to Charging Stations in Urban Environments <b>Mohammad Aljaidi*, Nauman Aslam, Xiaomin Chen, Omprakash Kaiwartya and Muhammad Khalid</b>
12:40-13:00	<b>36:</b> Text mining in radiology reports (Methodologies and algorithms) and how it effects on workflow and supports decision making in clinical practice (Systematic review) <b>Ahmad Alaiad* and Tala Elshqeirat</b>
<b>13:00-13:20</b>	<b>Break</b>
<b>13:20-15:00</b>	<b>Session 2: Information Systems and Health Informatics (2)</b> Chair: <b>Ahmad Al-Aiad</b> <b>Channel-1</b>
13:20-13:40	<b>44:</b> The impact of Deep learning algorithms with MRI Systematic review <b>Ahmad Alaiad and Omara Tawfiq</b>
13:40-14:00	<b>54:</b> The Use of Big Data Analytics in Medical Images: a Survey <b>Ibtihal Jalabneh, Mohammed Shatnawi* and Muneer Bani Yassien</b>
14:00-14:20	<b>74:</b> STUDENT STRUGGLING FACTOR (SSF) <b>Ashraf Alsmadi, Wail Mardini* and Yaser Khamayseh</b>
14:20-14:40	<b>96:</b> Predictive Model for Reducing Customers Migration from banks: Based on machine learning classification algorithms <b>Khalid Alkhatib* and Sayel Abualigah</b>
14:40-15:00	<b>101:</b> A Framework for Crowd-Sourced Exercise Data Collection and Processing <b>Natheer Khasawneh, Christoph Schulte and Mohammad Fraiwan*</b>
<b>15:00-15:20</b>	<b>Break</b>
<b>15:20-16:40</b>	<b>Session 3: AI and Deep Learning (4)</b> Chair: <b>Omar Alzoubi</b> <b>Channel-1</b>
15:20-15:40	<b>99:</b> Breast Cancer and Anxiety: A Relationship Study <b>Amer Al-Badarneh, Arwa Okaidat* and Aya Hmedat</b>
15:40-16:00	<b>116:</b> Machine Learning with Oversampling and Undersampling Techniques: Overview Study and Experimental Results <b>Roweida Mohammed, Jumanah Rawashdeh and Malak Abdullah*</b>
16:00-16:20	<b>118:</b> Efficient Multi-Swarm Binary Harris Hawks Optimization as a Feature Selection Approach for Software Fault Prediction <b>Thaer Thaher* and Nabil Arman</b>
16:20-16:40	<b>125:</b> Deer in The Headlights: Short Term Planning via Reinforcement Learning Algorithms for Autonomous Vehicles <b>Lyth Hishmeh* and Fahed Awad</b>
16:40-17:00	<b>132:</b> Measuring and Enhancing the Performance of Undergraduate Student Using Machine Learning Tools <b>Safaa Alhusban, Mohammed Shatnawi*, Muneer Bani Yasin and Ismail Hmeidi</b>
	<b>End Channel-1</b>
<b>11:20-12:40</b>	<b>Session 4: Internet of Things (1)</b>

	<b>Chair: Muneer Bani Yaseen</b>	<b>Channel-2</b>
11:20-11:40	<b>31:</b> Internet of Things & Cloud Computing Integration An Internet of Things as a Service approach <b>Maison Othman and Ali El-Mousa*</b>	
11:40-12:00	<b>68:</b> Efficient LuxMeter Design Using TM4C123 Microcontroller with Motion Detection Application <b>Qasem Abu Al-Haija* and Manar Samad</b>	
12:00-12:20	<b>72:</b> Authorization Model for IoT Healthcare Systems: Case Study <b>Mais Tawalbeh*, Muhannad Quwaider and Lo'ai Tawalbeh</b>	
12:20-12:40	<b>79:</b> Cloud Computing Role in Internet of Things: Business Community Survey <b>Muneer Bani Yassein*, Ismail Hmeidi, Abdalraheem Alsmadi and Mohammed Shatnawi</b>	
<b>12:40-13:00</b>	<b>Break</b>	
<b>13:00-14:20</b>	<b>Session 5: Internet of Things (2)</b> <b>Chair: Wail Mardini</b>	<b>Channel-2</b>
13:00-13:20	<b>92:</b> MQTTSec Based on Context-Aware Cryptographic Selection Algorithm (CASA) for Resource-Constrained IoT Devices <b>Mohammad Massad* and Baha' Alsaify</b>	
13:20-13:40	<b>95:</b> A Hybrid and Efficient Algorithm for Routing in Wireless Sensor Networks <b>Arifah Alhaj Ali, Wail Mardini, Qusai Abuein* and Mazen Khair</b>	
13:40-14:00	<b>109:</b> Blockchain and Smart Contract for IoT <b>Mohammad Al-Shurman*, Abedalrahman Obeidat and Saif Shurman</b>	
14:00-14:20	<b>128:</b> Security Challenges and Strategies for the IoT in Cloud Computing <b>Irfan Mohiuddin* and Ahmad Almogren</b>	
14:20-14:40	<b>129:</b> Challenges and Techniques on Constrained Application Protocol (CoAP) for Energy-Efficient <b>Muneer Bani Yassein*, Ismail Hmeidi, Omar Meqdadi, Fatimah Alghazo, Bayan Odat, Omar Alzoubi and Ayat Smairat</b>	
	<b>End Channel-2</b>	