

IEEE IWC MC 2017
Technical Program at a Glance
Valencia, SPAIN, June 26th — 30th, 2017

DATE	TIME	ROOM			
June 26, 2017 (Monday) TUTORIALS		LAS ARENAS			
	9:00-12:00	T1: Security in 4G & 5G Mobile Wireless Networks By: Prof. Yi Qian, University of Nebraska-Lincoln, USA			
	12:00-13:30	LUNCH BREAK			
	14:00-17:00	T2: Full-duplex Communications for 5G Networks By: Prof. Octavia A. Dobre & Dr. Animesh Yadav, Memorial University, Canada			
	19:00-20:00	WELCOME RECEPTION			
June 27, 2017 (Tuesday) SESSIONS		MALVARROSA	LAS ARENAS	SALER	TURIA
	9:00-9:30	WELCOME & OPENING			
	9:30-10:30	KEYNOTE 1: Prof. Sherman Shen, University of Waterloo, Ontario, Canada TITLE: Vehicular Communications Networks & the Impact of Mobility on Its Performance & Applications			
	10:45-11:15	Coffee Break			
	11:15-13:00	TM-1	TM-2	TM-3	TM-4
	13:00-14:00	LUNCH BREAK			
	13:30-15:30	TA-1	TA-2	TA-3	TA-4
	15:30-16:00	Coffee Break			
	16:00-18:00	TA-5	TA-6	TA-7	TA-8
		NIGHT OUT (On your Own)			
June 28, 2017 (Wednesday) SESSIONS	9:30-10:30	KEYNOTE 2: Prof. Harald Haas, Professor of Mobile Communications, LiFi R&D Centre, University of Edinburgh, UK TITLE: LiFi Attocell Networking – Taking the Small Cell Concept to a New Level			
	10:45-11:15	Coffee Break			
	11:15-13:00	WM-1	WM-2	WM-3	WM-4
	13:00-14:00	LUNCH BREAK			
	13:30-15:30	WA-1	WA-2	WA-3	WA-4
	15:30-16:00	Coffee Break			
	16:00-18:00	WA-5	WA-6	WA-7	WA-8
	19:00-21:00	DINNER BANQUET			
June 29, 2017 (Thursday) SESSIONS	9:30-10:30	KEYNOTE 3: Prof. Mohamed-Slim Alouini, KAUST, SA TITLE: Paving the Way Towards 5G Wireless Communication Networks			
	10:45-11:15	Coffee Break			
	11:15-13:00	ThM-1	ThM-2	ThM-3	ThM-4
	13:00-14:00	LUNCH BREAK			
	13:30-15:30	ThA-1	ThA-2	ThA-3	ThA-4
	15:30-14:00	Coffee Break			
	16:00-18:00	ThA-5	ThA-6	ThA-7	ThA-8
	NIGHT OUT (On your Own)				
June 30, 2017 (Friday) SESSIONS	8:300-10:30	FrM-1	FrM-2	FrM-3	FrM-4
	10:45-11:15	Coffee Break			
	11:15-13:00	FrM-5	FrM-6	FrM-7	FrM-8
	13:00-14:00	LUNCH BREAK			
	13:30-15:30	FrA-1	FrA-2	FrA-3	FrA-4
	15:30-14:00	Coffee Break			
	16:00-18:00	FrA-5	FrA-6	FrA-7	FrA-8

IWCMC 2017 Sponsors & Supporters

*The Executive and Organizing Committees of IWCMC 2017 Conference
greatly appreciate the IEEE technical Sponsorship
As well as the technical Sponsorship of IEEE Croatia Section*

Technical Sponsors: IEEE and IEEE Spain Section



Technical Sponsor: IEEE Spain Section: <http://www.ieeespain.org/>



Co-Organizer:

- Polytechnic University of Valencia, Spain: <https://www.upv.es/index-en.html>



TECHNICAL PROGRAM
IEEE IWCMC 2017
Valencia, SPAIN, June 26th — 30th, 2017

Monday, June 26th, 2017

Registration — (8:00 - 15:00)

Room: Open Hall

Tutorial 1 — (9:00 - 12:00)

Room: LAS ARENAS

- **Speakers:** Prof. Yi Qian, University of Nebraska-Lincoln, USA
- **Title:** Security in 4G & 5G Mobile Wireless Networks
- **Chair:** Jaime Lloret Mauri, Polytechnic University of Valencia, Spain

LUNCH BREAK

12:00 – 13:30

Tutorial 2 — (14:00 - 17:00)

Room: LAS ARENAS

- **Speaker:** Prof. Octavia A. Dobre & Dr. Animesh Yadav, Memorial University, Canada
- **Title:** Full-duplex Communications for 5G Networks
- **Chair:** Narcis Cardona, Polytechnic University of Valencia, Spain

Monday Afternoon Sessions (MA) — (13:30 - 15:30)

- **Session Title:** Multimedia (Multimedia Symp.)
- **Session Chair:** Miguel Garcia-Pineda, University of Valencia, Spain

MA-1: Room: SALER

1570339052: Variable-Threshold Buffer Based Adaptation for DASH Mobile Video Streaming, Rabee Mustapha Abuteir, Anne Fladenmuller and Olivier Fourmaux (UPMC Sorbonne Universités, France); Mostafa Ammar (Georgia Institute of Technology, USA)

1570333714: Do Current Domestic Gigabit Wireless Technologies Fulfill User Requirements for Ultra High Definition Videos? Miguel Garcia-Pineda; Santiago Felici-Castell; Jaume Segura-Garcia (University of Valencia, Spain)

1570338010: Adaptive Low-Delay Video Streaming in Heterogeneous Wireless Networks Using MPRTP, Ekaterina Pakulova (Southern Federal University, Russia); Konstantin Miller; Adam Wolisz (TUB, Germany)

1570338366: Joint Admission Control and Routing Via Neuro-Dynamic Programming for Streaming Video over SDN, Kunjie Zhu (University of Science and Technology of China, P.R. China); Yongyi Ran (University of Massachusetts Lowell, USA); Enzhong Yang and Jian Yang (University of Science and Technology of China, P.R. China)

1570338367: Adaptive Scalable video Transmission based on Large Deviation Theory in Energy Harvesting Aided Wireless Systems, Weizhe Cai, Jinsen Xie, Jian Yang and Hong-Sheng Xi (Univ. of Science and Technology of China, P.R. China)

1570341981: QoE Prediction for IPTV Based On BP Adaboost Neural Network, Yun Gao, Xin Wei, Wenqin Zhuang, Ruo Chen Huang and Mengwen Diao (Nanjing University of Posts and Telecommunications, P.R. China)

1570342263: Novel Robust Decoding algorithm-aware channel condition for Video Streaming (RDVS), Olfa Ben Rhaiem (UQAM, Canada); Rawya Sbiti (ENIS, Tunisia); Lamia Chaari Fourati (Institut supérieur d'informatique et multimédia de Sfax, Tunisia)

- | | |
|---|--------------------------------|
| ➤ Session Title: Recent Advances in Theoretical Systems (E-5G Workshop) | MA-2: Room: TURIA |
| ➤ Session Chair: Junaid Qadir, Information Technology University, Lahore, Pakistan | SESSION STARTS AT 12:30 |

Invited talk 1: Prof. M. Slim Alouini, KAUST, Saudi Arabia

Title: High-speed Underwater Wireless Optical Communication: Potential, Challenges, and Possible Solutions

Invited talk 2: Prof. Mahesh K. Marina, The University of Edinburgh, UK

Title: Towards a Future Multi-Service Mobile Network Architecture

1570333515: Rate-Energy Tradeoff in Simultaneous Wireless Information and Power Transfer over Rayleigh Block Fading Channel, Qi Gu and Gongpu Wang; Rongfei Fan; Dian Fan and Zhangdui Zhong (Beijing Jiaotong University, P.R. China)

1570338418: Throughput Maximization for Wireless Powered Communication, Qi Gu and Gongpu Wang; Rongfei Fan; Dian Fan and Zhangdui Zhong (Beijing Jiaotong University, P.R. China)

1570338466: Concurrent Association in Heterogeneous Networks with Underlay D2D Communication, Alaa Awad Abdellatif and Amr Mohamed (Qatar University, Qatar); Carla-Fabiana Chiasserini (Politecnico di Torino, Italy)

1570342688: Performance Analysis of Decoupled Cell Association in Multi-Tier Hybrid Networks using Real Blockage Environments, Osama Bhatti (School of Electrical Engineering and Computer Science, Pakistan); Haris Suhail; Uzair Akbar; Syed Ali Hassan (National University of Sciences and Technology, Pakistan); Haris Bin Pervaiz (University of Surrey, UK); Leila Musavian (University of Essex, UK); Qiang Ni (Lancaster University, UK)

Coffee Break — (15:30 - 16:00)

Monday Afternoon Sessions (MA) — (16:00 - 18:00)

- | | |
|---|--------------------------|
| ➤ Session Title: Multimedia Applications (Multimedia Symp.) | MA-3: Room: SALER |
| ➤ Session Chair: Hamid Sharif, University of Nebraska-Lincoln, USA | |

1570343319: Adaptive Bitrate Video Delivery using HTTP/2 over MPTCP Architecture, Brian Hayes (Georgia Institute of Technology, USA); Yusun Chang (Kennesaw State University & The Georgia Institute of Technology, USA); George Riley (Georgia Institute of Technology, USA)

1570341743: Robust Estimation Based Crowd Sensing Enhancement for iBeacon Map Construction, Yingying Guo and Yan Sun (Beijing University of Posts and Telecommunications, P.R. China); Tin-Yu Wu (National Ilan University, Taiwan)

1570341528: Quality of Experience for video streaming: A contemporary Survey, Md. Faisal Murad Hossain and Mahasweta Sarkar (San Diego State University, USA); Syed Hassan Ahmed (Kyungpook National University, Korea)

1570333902: Understanding the Patterns behind Purchasing Capability: A Case Study of Smartphone Consumers, Chen Zhou, Jiang Hao, Jing Wu, Jianguo Zhou and Shuwen Yi (Wuhan University, P.R. China)

1570342324: A Review of Workspace Challenges and Wearable Solutions in Railroads and Construction, Subharthi Banerjee, Michael Hempel and Hamid Sharif (University of Nebraska-Lincoln, USA)

1570340942: Joint Routing/Encoding-Power for Network Lifetime Maximization in Wireless Video Sensor Networks, Nesrine Khernane, Jean-François Couchot and Ahmed Mostefaoui (University of Bourgogne-Franche-Comté)

1570338353: ML based QoE enhancement in SDN context Video Streaming Case, Asma Ben Letaifa; Maher Gzam, Mouna Skhiri (SupCom, Tunisia)

- | | |
|--|--------------------------|
| ➤ Session Title: Emerging Practical Systems (E-5G Workshop) | MA-4: Room: TURIA |
| ➤ Session Chair: Daniel Camps, i2CAT, Spain | |

Invited talk 3: Dr. Daniel Camps, i2CAT, Spain

Title: 5G-XHaul: A wireless-optical transport network with SDN control for converged fronthaul and backhaul services in 5G

Invited talk 4: Prof. Junaid Qadir, Information Technology University, Lahore, Pakistan

Title: 5G Enabled Health: The Promise of Big Data, AI, and Communication for Healthcare

1570338446: Addressing the eduroam inter-domain mobility problem through virtual Aps, Silvia Surroca (Universitat Politecnica de Catalunya & i2CAT Foundation, Spain); Daniel Camps (i2CAT, Spain); Ilker Demirkol (Universitat Politecnica de Catalunya, Spain)

1570346058: Continuous High-Accuracy Radio Positioning of Cars in Ultra-dense 5G Networks, Mike Koivisto and Aki Hakkarainen (Tampere University of Technology, Finland); Mario Costa (Huawei, Finland); Jukka Talvitie (Tampere University of Technology, Finland); Kari Heiska (Huawei, Finland); Kari Leppanen (Huawei, Finland); Mikko Valkama (Tampere University of Technology, Finland)

1570338411: Towards A Secure Network Architecture for Smart Grids in 5G Era, Firooz Saghezchi; Georgios Mantas; José Ribeiro (Instituto de Telecomunicações, Portugal); MS Al-Rawi (Universidade de Aveiro, Portugal); Shahid Mumtaz and Jonathan Rodriguez (Instituto de Telecomunicações, Portugal)

1570341844: Designing an energy efficient UAV tracking algorithm, Mouna Elloumi (University of Toulouse & University of Manouba, CRISTAL-ENSI, Tunisia); Benoit Escrig (Université de Toulouse & IRIT, France); Riadh Dhaou (University of Toulouse, France); Hanen Idoudi (University of Manouba, Tunisia); Leila Azouz Saidane (ENSI, Univ. of Manouba, Tunisia)

WELCOME RECEPTION

19:00 – 20:00

TECHNICAL PROGRAM

IEEE IWCMC 2017

Valencia, SPAIN, June 26th — 30th, 2017
Tuesday, June 27th, 2017

Registration — (8:00 - 15:00)

Room: Open Hall

Opening Session — (9:00 - 9:30)

Room: MALVARROSA

Speaker: Jaime Lloret Mauri & Narcis Cardona, Polytechnic University of Valencia, Spain

KEYNOTE 1 — (9:30 - 10:30)

Room: MALVARROSA

- **Speaker:** Prof. Sherman Shen, University of Waterloo, Ontario, Canada
- **Title:** Vehicular Communications Networks and the Impact of Mobility on Its Performance and Applications
- **Chair:** Jaime Lloret Mauri, Polytechnic University of Valencia, Spain

Coffee Break — (10:45 - 11:15)

Tuesday Morning Sessions (TM) — (11:15 13:00)

- **Session Title:** INVITED PAPERS **TM-1: Room:** MALVARROSA
- **Session Chair:** Sherman Shen, University of Waterloo, Canada

1570341904: Distributed Energy and Resource Management for Full-Duplex Dense Small Cells for 5G, Animesh Yadav; Octavia A. Dobre (Memorial University, Canada); Nirwan Ansari (New Jersey Institute of Technology, USA)

1570358149: Progressive Hybrid Greyfield Wireless Access Virtualization: Graph-Optimized Dynamic Utility Tradeoffs between Cloud, Fog, and Legacy RANs, Slim Zaidi (University of Quebec, INRS-EMT, Canada); Mourad Azzakhmam (ETS, Canada); Sofiene Affes (INRS-EMT, Canada); Charles Despins (ETS, University of Quebec, Canada); Keyvan Zarifi and Peiyang Zhu (Huawei Technologies, Canada)

1570355657: Location Privacy Preserving Protocols in Database-Enabled Cognitive Radio Networks, Taieb Znati; Daniel Petrov (University of Pittsburgh, USA)

1570347690: Mitigating False Negative Intruder Decisions in WSN-based Smart Grid Monitoring, Safa Otoum; Burak Kantarci; Hussein T. Mouftah (University of Ottawa, Canada)

1570347991: Vehicular Cloud Network: A New Challenge for Resource Management Based Systems, Rodolfo Meneguette (Instituto Federal de Educação, Brazil); Azzedine Boukerche (University of Ottawa, Canada)

1570351655: A Wireless Sensor Platform for Industrial Non-hermetic Metallic Enclosures, Mohamed Adel Ibrahim, Galal Hassan and Hossam S. Hassanein (Queen's University, Canada); Khaled Obaia (Oil and Energy, Canada)

- **Session Title:** D2D (Wireless Networking Symp.) **TM-2: Room:** LAS ARENAS
- **Session Chair:** Laura Garcia, Universidad Politecnica de Valencia, Spain

1570341977: Proactive Caching for Producer Mobility Management in Named Data Networks, Hesham Farahat, Hossam S. Hassanein (Queen's University, Canada)

1570341656: A Novel Adaptive Transmission Algorithm for Device-to-Device Direct Discovery, Aziza Ben Mosbah (NIST; Télécom SudParis, USA); David Griffith (NIST, USA); Richard Rouil (National Institute of Standards and Technology, USA)

1570333720: Cooperative D2D Communication in Downlink Cellular Networks with Energy Harvesting Capability, Mohamed Seif Eldin Mohamed (Nile University, Egypt); Karim G Seddik (American University in Cairo, Egypt); Mohammed Nafie (Cairo University & Nile University, Egypt); Amr El-Keyi (Carleton University, Canada)

1570338852: Cooperative D2D Discovery Approach For Public Safety Based On Spreading Technique, Linda Jedidi (Esprit, Tunisia); Meriem Chekir (ESPRIT School of Engineering, Tunisia); Fatma Louati (ESPRIT, Tunisia); Rahma Bouraoui (Engineering College of Communication of Tunis, Sup'Com & COSIM Reaserch Lab, Tunisia); Hichem Besbes (Ecole Supérieure de Communications de Tunis, Sup'Com, University of Carthage, TUNISIA, Tunisia)

1570341936: Modeling D2D Handover Management in 5G Cellular Networks, Kaouthar Ouali (National Engineering School of Tunis (ENIT), Tunisia); Meriem Kassar (ENIT, Tunisia); Thi Mai Trang Nguyen (UPMC Sorbonne Universités; LIP6, France); Kaouthar Sethom (Ecole Nationale des Ingenieurs de Carthage, Tunisia); Brigitte Kervella (LIP6, France)
1570341984: A Design of D2D-pairing Scheme on Voronoi Diagram, Chunpeng Liu (INSTITUTE UNIVERSITY OF HAERBIN, P.R. China); Chenguang He, Weixiao Meng and Shuai Han (Harbin Institute of Technology, P.R. China)
1570341827: Mobility-Assisted Device to Device Communications For Content Transmission, Muhammad Waqas (Tsinghua University Beijing, P.R. China); Ming Zeng (University of Electronic Science and Technology of China, P.R. China); Yong Li (Tsinghua University, P.R. China)

➤ Session Title: Channel Estimation (Comm. & Signal Processing Symp.)	TM-3: Room: SALER
➤ Session Chair: Fumiyuki Adachi, Tohoku University, Japan	

1570343307: MIMO Channel Estimation for Time-Division Duplex Distributed Antenna Cooperative Transmission, Fumiyuki Adachi, Amnart Boonkajay; Yuta Seki; Tomoyuki Saito (Tohoku University, Japan)
1570332458: On the Performance Evaluation of Blind System Identification in Presence of Side Information, Qadri Mayyala (KFUPM, Saudi Arabia); Karim Abed-Meraim (Polytech'Orléans & University of Sharjah, UAE, France); Azzedine Zerguine (KFUPM, Saudi Arabia)
1570333494: Further Investigations on the Performance Bounds of MIMO-OFDM Channel Estimation, Abdelhamid Ladaycia; Anissa Mokraoui (Université Paris 13, Sorbone Paris Cité & Institut Galilée, L2TI, France); Karim Abed-Meraim (Polytech'Orléans & University of Sharjah, UAE, France); Adel Belouchrani (Ecole Nationale Polytechnique, Algeria)
1570333667: Efficient OFDM Reference Signal Design for Multi-Layer Transmission, Jianming Wu (Fujitsu, Japan)
1570341802: A low complexity channel estimation scheme for Massive MIMO systems, Afonso Ferreira, Guilherme Gaspar and Paulo Montezuma (FCT-UNL, Portugal); Rui Dinis (Instituto de Telecomunicacoes & FCT-UNL, Portugal); Rodolfo Oliveira (Nova University of Lisbon, Instituto de Telecomunicações, Portugal)
1570342551: Superimposed Training-based Channel Estimation for Visible Light Communications, Juan Carlos Estrada-Jimenez; Borja Genovés Guzmán; Maria Julia Fernandez-Getino Garcia and Víctor P. Gil Jiménez (University Carlos III of Madrid, Spain)

➤ Session Title: Security in WSN	TM-4: Room: TURIA
➤ Session Chair: Yi Qian, University of Nebraska - Lincoln, USA	

1570337341: Jammer Detection Algorithm for Wideband Radios using Spectral Correlation and Neural Networks, Tassadaq Nawaz (University of Genova, Italy); Damian Campo (University of Genova, Italy); Muhammad Ozair Mughal (University of Genova, Italy); Lucio Marcenaro (Università degli Studi di Genova, Italy); Carlo S Regazzoni (University of Genova, Italy)
1570351979: A Novel Privacy technique for augmented reality cloud gaming based on image authentication, Rahma Gharsallaoui; Mohamed Hamdi (University of Carthage, Tunisia); Tai-Hoon Kim (Sungshin W University, Korea)
1570333821: Beamforming and Power Allocation for Physical-Layer Security in Hybrid RF/VLC Wireless Networks, Mohamed Marzban (Cairo University, Egypt); Mohamed Kashef (Texas A&M University at Qatar, Qatar); Mohamed M. Abdallah (HBKU, Qatar); Mohamed Khairy (Cairo Univ, Egypt)
1570339795: 6LoWPAN multi-layered security protocol based on IEEE 802.15.4 security features, Ghada Glissa (University of Tunis El Manar, Tunisia); Aref Meddeb (National School of Engineering, University of Sousse, Tunisia)
1570338848: A Trust-based Secured Performant Funnel Mobile Service Discovery and Exposure Model, Walid El Ayeb (Higher School of Communication of Tunis, Tunisia); Zied Choukair (Mediatron SupCom, Tunisia)
1570338428: An Intrusion Detection System for Selective Forwarding Attack in IPv6-based Mobile WSNs, Fatma Gara (ENIT, Tunisia); Leila Ben Saad (University of Agder, Norway); Rahma Ben Ayed (ENIT, Tunisia)
1570341573: Adaptive encryption for real time mobile multimedia services, Nouha Samet (SUP'COM, Tunisia); Asma Ben Letaiifa (MEDIATRON, Tunisia); Mohamed Hamdi (Sup'Com, Tunisia); Sami Tabbane (Sup Telecom, Tunisia)

LUNCH BREAK	13:00 – 14:00
--------------------	----------------------

Tuesday Afternoon Sessions (TA) — (13:30 - 15:30)

➤ Session Title: Modulation & Signal Processing (Com. & Signal Proc. Symp.)	TA-1: Room: MALVARROSA
➤ Session Chair: Sofiene Affes, INRS-EMT, Canada	

1570333774: A Low-complexity Front-end Concept for CPM Demodulation in the Presence of Strong ACI, Vito Dantona (Universität der Bundeswehr München, Germany); Berthold Lankl (University of Federal Armed Forces Munich, Germany)
1570333805: Self-Interference Cancellation Using Time-Domain Phase Noise Estimation in OFDM Full-Duplex Systems,

Heba Shehata and Tamer Khattab (Qatar University, Qatar)

1570338599: A Quantized Channel Approach based Single Antenna Interference Cancellation Scheme, Huiyu Ye, Kazuhiko Fukawa and Yuyuan Chang (Tokyo Institute of Technology, Japan)

1570343162: Multiple Carrier Frequency Offsets Estimation in Cooperative Networks: An Experimental Study, Akber Raza, Amna Aziz, Syed Muhammad Ali Qasim Naqvi and Syed Ali Hassan (National University of Sciences and Technology, Pakistan); Ali A Nasir (KFUPM, Saudi Arabia)

1570349189: Anomaly Resilient Node Placement Approach for Pipelines Monitoring, Abdullatif Albaseer; Uthman Baroudi (KFUPM, Dhahran, Saudi Arabia)

1570338241: Multicast Spatial Reuse Scheduling over Millimeter-Wave Networks, Wei Feng and Yong Li (Tsinghua University, P.R. China); Yong Niu (State Key Laboratory of Rail Traffic Control and Safety, Beijing Jiaotong University, P.R. China); Li Su and Depeng Jin (Tsinghua University, P.R. China)

- | | |
|--|--------------------------------------|
| <p>➤ Session Title: Resource Allocation (Wireless Networking Symp.)</p> <p>➤ Session Chair: Haidar Safa & Wassim El-Hajj, American University of Beirut, Lebanon</p> | <p>TA-2: Room: LAS ARENAS</p> |
|--|--------------------------------------|

1570343196: Downlink Scheduling in LTE: Challenges, Improvement, and Analysis, Mohamad Omar Kayali, Zeinab Shmeiss, Haidar Safa and Wassim El-Hajj (American University of Beirut, Lebanon)

1570341951: Transmit Power Mitigation in Cooperative Green Communication, Lamis Amamou (ENIT, SUPCOM, Tunisia); Maissa Boujelben (Sup'Com/Esprit, Tunisia); Hichem Besbes (Ecole Supérieure de Communications de Tunis, Sup'Com, University of Carthage, TUNISIA, Tunisia)

1570338272: Resource Allocation in Spectrum-Sharing Cloud Based Integrated Terrestrial-Satellite Network, Xiangming Zhu; Chunxiao Jiang; Wei Feng and Linling Kuang (Tsinghua University, P.R. China); Zhu Han (University of Houston, USA); Jianhua Lu (Tsinghua University, P.R. China)

1570333092: Multimedia Multicast Beamforming in Integrated Terrestrial-Satellite Networks, Chunxiao Jiang; Xiangming Zhu and Linling Kuang (Tsinghua University, P.R. China); Yi Qian (University of Nebraska - Lincoln, USA); Jianhua Lu (Tsinghua University, P.R. China)

1570337277: Cooperative Spectrum Sharing Based on Contract Theory with Optimal Bandwidth and Power Allocation, Chenxin He, Weidang Lu, Hong Peng and Zhijiang Xu (Zhejiang University of Technology, P.R. China); Xin Liu (Dalian University of Technology, P.R. China)

1570333681: Sum Rate Optimization for SWIPT System Based on Zero-forcing Beamforming and Time Switching, Lin Ma, Yun Wang and Yubin Xu (Harbin Institute of Technology, P.R. China)

1570350606: An Energy Efficient and Density control Clustering Algorithm for wireless sensor network, Meriem Meddah (National Engineering School of Tunis, Tunisia); Rim Haddad (Ecole Nationale d'Ingenieur de Tunis, Tunisia); Tahar Ezzedine (Tunis El Manar University, Tunisia)

- | | |
|---|---------------------------------|
| <p>➤ Session Title: Network/Vehicular Security (Security Symposium)</p> <p>➤ Session Chair: Hossam S. Hassanein, Queen's University, Canada</p> | <p>TA-3: Room: SALER</p> |
|---|---------------------------------|

1570345417: STAC-Protocol: Secure and Trust Anonymous Communication Protocol for IoT, Sarra Jebri and Mohamed Abid (University of Gabes, Tunisia); Ammar Bouallegue (National School of Engineers of Tunis, Tunisia)

1570344762: Application of Neural Networks for Decision Making and Evaluation of Trust in Ad-hoc Networks, Yelena Trofimova, Alexandru Mihnea Moucha and Pavel Tvrdik (Czech Technical University in Prague, Czech Republic)

1570333679: A Framework for Security on Demand, Zhiyuan Hu (Nokia Shanghai Bell Co., Ltd., P.R. China); Yueming Yin (Nokia Shanghai Bell Co. Ltd.)

1570338322: On Correlating Network Traffic for Cyber Threat Intelligence: A Bloom Filter Approach, Adil Atifi; Elias Bou-Harb (Florida Atlantic University, USA)

1570343267: A New Biometric-based Security Framework for Cloud Storage, Ihsen Nakouri (National Engineering School of Tunis, Tunisia); Mohamed Hamdi (University of Carthage, Tunisia); Tai-Hoon Kim (Sungshin W University, Korea)

1570341373: In-Vehicle Cooperative Driver Information Systems, Lotfi Abdi (ENIT, Tunisia); Aref Meddeb (National School of Engineering, University of Sousse, Tunisia)

1570333530: PELE: Power Efficient Legitimate Eavesdropping via Jamming in UAV Communications, Xiaoming Wang (Donghua University); Kai Li (CISTER Research Unit & The Singapore University of Technology and Design, Singapore); Salil Kanhere (University of New South Wales, Australia); Demin Li; Xiaolu Zhang (Donghua, P.R. China); Eduardo Tovar (ISEP-IPP, Portugal)

- **Session Title:** IoT 1 (IoT Symposium)
➤ **Session Chair:** Jose M. Jimenez, Universidad Politecnica de Valencia, Spain

TA-4: Room: TURIA

- 1570333511:** On Practical Device-to-Device Communication: A Measurement Driven Study, Abderrahmen Mtibaa (New Mexico State U, USA); Ahmed Emam; Aliaa Essameldin; Sannan Tariq; Khaled Harras (Carnegie Mellon University, USA)
1570333807: Strong Security and Privacy in a 5G Deterministic Radio Access Network for the Industrial-Tactile Internet of Things, Ted Szymanski (McMaster University, Canada)
1570333879: Protection of IoT Transaction Using ID-KEM Based on Three-Pass Protocol Countermeasure, Hajer Boujezza (CRISTAL Lab., Tunisia); Hella Kaffel-Ben Ayed (University of Tunis El Manar & University of Manouba, Tunisia)
1570333880: An IDMS approach towards privacy and new requirements in IOT, Hella Kaffel-Ben Ayed (University of Tunis El Manar & University of Manouba, Tunisia); Hajer Boujezza (CRISTAL Lab., Tunisia).
1570338450: A Secure Data Storage Based on Revocation Game-Theoretic Approaches in Cloud Computing Environments, Maha Jebalia; Asma Ben Letaifa; Mohamed Hamdi; Sami Tabbane (SUP'COM, Tunisia)
1570344999: A Hybrid IoT Traffic Generator for Mobile Network Performance Assessment, Wei-Hung Hsu (National Central University, Taiwan); Qihui Li (Chongqing University, P.R. China); Xue-Hai Han and Chih-Wei Huang (National Central University, Taiwan)
1570337997: GA-Based Scheme for Fair Joint Channel Allocation and Power Control for Underlying D2D Multicast Communications, Monia Hamdi (Gabes University, Tunisia); Di Yuan (Linköping University, Sweden)

Coffee Break — (15:30 - 16:00)

Tuesday Afternoon Sessions (TA) — (16:00 - 18:00)

- **Session Title:** Vehic. Models and Designs (Vehicular Symp.)
➤ **Session Chair:** Andres Tomas, Universidad Politecnica de Valencia, Spain

TA-5: Room: MALVARROSA

- 1570333519:** On the Impact of Urban Intersection Characteristics in Vehicular to Vehicular (V2V) Communications, Seilendria Ardityarama Hadiwardoyo; Andres Tomas; Enrique Hernández-Orallo; Carlos T. Calafate; Juan-Carlos Cano; Pietro Manzoni (Universitat Politècnica de València, Spain)
1570332715: Avoiding Car-Pedestrian Collisions Using a VANET to Cellular Communication Framework, Hassan A. Artail, Kareem Khalifeh and Mohammad Yahfoufi (American University of Beirut, Lebanon)
1570340789: A Line-of-Sight Probability Model for VANETs, Christina Stadler (AUDI AG, Germany); David Eckhoff (TUM CREATE, Singapore); Reinhard German (University of Erlangen, Germany); Thomas Gruber (AUDI AG, Germany)
1570338916: Demonstration of A Real-Time Vehicular Visible Light Communication System with Timing Recovery, Haifeng Luan, Xianqing Jin, Weijie Liu, Meiyu Jin and Zhengyuan Xu (University of Science and Technology of China, P.R. China)
1570346802: Evaluation of Message Dissemination Methods in VANETs using a Cooperative Traffic Efficiency Application, Oscar Silvio Marques de Almeida Gama (University of Minho, Portugal); Maria João M. R. da C. Nicolau and Antonio D. Costa (Universidade do Minho & Centro ALGORITMI, Portugal); Alexandre Santos (University of Minho & Centro Algoritmi, Portugal); Joaquim H Macedo (University of Minho, Portugal); Bruno Dias (Universidade do Minho, Portugal)
1570342339: Congestion control techniques in VANETs: A Survey, Mustapha Taleb; Salah Merniz (University of Constantine, Algeria); Saad Harous (UAE University, United Arab Emirates (UAE))
1570338976: Intersection-based Distance and Traffic-Aware Routing (IDTAR) Protocol for Smart Vehicular Communication, Abdelmutilib Ahmed; Abdullah Gani, Siti Hafizah Ab Hamid and Suleman Khan (School of Information Technology, Monash University, Malaysia); Nadra Guizani (Purdue University, USA)

- **Session Title:** High-Density Networks (Wireless Networking Symp.)
➤ **Session Chair:** Jose F. Monserrat, Universitat Politècnica de València, Spain

TA-6: Room: LAS ARENAS

- 1570338888:** SENSEFUL: an SDN-based Joint Access and Backhaul Coordination for Dense Wi-Fi Small Cells, Eduard Garcia-Villegas and David Sesto-Castilla (Technical University of Catalonia (UPC), Spain); Sven Zehl and Anatolij Zubov (Technische Universität Berlin, Germany); August Betzler (I2cat, Spain); Daniel Camps-Mur (i2CAT Foundation, Spain)
1570344794: Toward Dimensioning Cooperative High-Density Wireless Networks, Wael Cherif; Fethi Filali (QMIC, Qatar); Sanaa Sharafeddine (Lebanese American University, Lebanon); Zaher Dawy (American University of Beirut, Lebanon)
1570341459: Client-Network Collaborative Load Balancing Mechanism for WLAN Based on SDN and 802.11u, Xiaokang Sang, Qian Wu and Hewu Li (Tsinghua University, P.R. China)
1570338613: Self-Configurable Coordinated Scheduling for Ultra-Dense Small Cell Deployments, Sonia Gimenez; David Martín-Sacristán; Daniel Calabuig; Jose F Monserrat (Universitat Politècnica de València, Spain)
1570338820: LTE Frequency One Re-use Factor: Would It Be An Efficient Solution For The Unlicensed Bands? A Stochastic

Geometry Analysis, Abdel-karim Ajami, Hassan A. Artail (American University of Beirut, Lebanon)

1570341947: Mobility impact on EDCA, Boulila Narjes and Leila Azzouz Saidane (ENSI, Tunisia)

1570340572: Design of Improved Probability Neural Network Classifiers for Medical Decision Making with the Aid of Genetic Optimization Algorithm, Dan Wang (Tianjin University of Science & Technology, P.R. China); Shaohua Wan and Yin Zhang (Zhongnan University of Economics and Law, P.R. China); Nadra Guizani (Purdue University, USA)

➤ **Session Title:** IoT 2 (IoT Symposium)

TA-7: Room: SALER

➤ **Session Chair:** Phone Lin, National Taiwan University & Shun-Ren Yang, National Tsing Hua University, Taiwan

1570338715: M2M Communications over LTE - Evaluating Energy Consumption Models, James Birchall, Kevin A Morris and Mark Beach (University of Bristol, United Kingdom)

1570341526: Feasibility of Societal Model for Securing Internet of Things, Hiroshi Tsunoda (Tohoku Institute of Technology, Japan); Glenn M. Keeni (Cyber Solutions Inc., Japan)

1570341258: A Survey on NB-IoT Downlink Scheduling: Issues and Potential Solutions, Rubbens Boisguene, Sheng-Chia Tseng and Chih-Wei Huang (National Central University, Taiwan); Phone Lin (National Taiwan University, Taiwan)

1570338869: A Framework for Hotspot Support using Wi-Fi direct based Device-to-Device Links, Mouaad El Alami and Nabil Benamar (Moulay Ismail University, Morocco); Mohamed Younis (University of Maryland Baltimore County, USA); Ahmed Amer Shahin (University of Maryland Baltimore County, USA & Zagazig University, Egypt)

1570341939: Federating Public and Private Intelligent Services for IoT Applications, Chi-Sheng Shih and Ching-Chi Chuang (National Taiwan University, Taiwan); Hsin-Yuan Yeh (Academia Sinica, Taiwan)

1570338532: Mobile Edge Computing-Enabled Channel-Aware Video Streaming for 4G LTE, Chen-Chi Wang, Zih-Ning Lin and Shun-Ren Yang (NTHU, Taiwan); Phone Lin (National Taiwan University, Taiwan)

1570338657: Tamper-Resistant Code Using Optimal ROP Gadgets for IoT Devices, Chittaranjan Hota; Rajesh Shrivastava and Shivangi Shipra (BITS, Pilani, Hyderabad, India)

➤ **Session Title:** MIMO (Comm. & Signal Processing Symp.)

TA-8: Room: TURIA

➤ **Session Chair:** Alberto Gonzalez, Universidad Politecnica de Valencia, Spain

1570333789: Block Diagonalization aided Precoding algorithm for Large MU-MIMO Systems, M. Angeles Simarro; Fernando Domene; Francisco-Jose Martinez-Zaldivar; Alberto Gonzalez (Universidad Politecnica de Valencia, Spain)

1570341402: SIR based SSC over correlated kappa-mu fading channels, Stefan Panić; Caslav Stefanovic; Hranislav Milosevic (Faculty of Natural Sciences and Mathematics, University of Pristina, Serbia)

1570342212: Aligning DL Paths for Scalable CSI Feedback in FDD Massive MIMO, Xiliang Luo, Penghao Cai and Xiaoyu Zhang (ShanghaiTech University, P.R. China); Cong Shen (University of Science and Technology of China, P.R. China); Hua Qian (Shanghai Advanced Research Institute, Chinese Academy of Sciences, P.R. China)

1570350247: Frugal Calibration of Mutual Coupling in Large Scale Antenna Array, Xin Xie and Yuxuan Xu; Hanyu Zhu (ShanghaiTech University, P.R. China); Qing Ling (University of Science and Technology of China, P.R. China); Xiong Wang and Xiliang Luo (ShanghaiTech University, P.R. China)

1570332846: MIMO Hardware Simulator Design for Time-Varying 802.15.7 VLC Outdoor Automotive Crossroad V2V and V2I Channels, Bachir Habib (USEK, Lebanon)

1570333700: Data Dissemination using Instantly Decodable Binary Codes in Fog-Radio Access Networks, Ahmed Douik (Caltech, USA); Sameh Sorour (University of Idaho, USA)

1570338192: Doubly Selective Channel Estimation for MIMO Systems Based on Structured Compressive Sensing, Xu Ma and Fang Yang; Sicong Liu; Jian Song (Tsinghua University, P.R. China); Zhu Han (University of Houston, USA)

NIGHT OUT (On Your Own)

TECHNICAL PROGRAM
IEEE IWCMC 2017
Valencia, SPAIN, June 26th — 30th, 2017

Wednesday, June 28th, 2017

Registration — (8:00 - 15:00)

Room: Open Hall

KEYNOTE 2 — (9:30 - 10:30)

Room: MALVARROSA

- **Speaker:** Prof. Harald Haas, Professor of Mobile Communications, LiFi R&D Centre, University of Edinburgh, UK
- **Title:** LiFi Attocell Networking—Taking the Small Cell Concept to a New Level
- **Chair:** Zouheir Rezki, University of Idaho, USA

Coffee Break — (10:45 - 11:15)

Wednesday Morning Sessions (WM) — (11:15 - 13:00)

- **Session Title:** Transmission Techniques (WON Symposium)
- **Session Chair:** Zouheir Rezki, University of Idaho, USA

WM-1: Room: MALVARROSA

Keynote: Paving the Way Towards 5G Wireless Communication Networks

Mohamed-Slim Alouini, King Abdullah University of Science and Technology (KAUST)

1570338052: Volterra-based Nonlinear Equalization for Nonlinearity Mitigation in Organic VLC, Xiangyu Li and Hanjie Chen; Shangbin; Qian Gao; Chen Gong; Zhengyuan Xu (University of Science and Technology of China, P.R. China)

1570338677: Demonstration of A Low Complexity ARM-based Indoor VLC Transceiver under Strong Interference, Chao Liu, Xianqing Jin, Wenwei Zhu, Meiyu Jin and Zhengyuan Xu (University of Science and Technology of China, P.R. China)

1570332754: Overcoming Alignment Delay in RF+FSO Networks, Michael Atakora and Harsha Chenji (Ohio Univ., USA)

- **Session Title:** NG Signaling, Positioning, Spectrum, &Antennas (NGSN Symp.)
- **Session Chair:** Yong Niu, Beijing Jiaotong University, Beijing, China

WM-2: Room: LAS ARENAS

1570343534: Low Complexity and Near-Optimal Beam Selection for Millimeter Wave MIMO Systems, Yong Niu (State Key Laboratory of Rail Traffic Control and Safety, China); Ziqi Feng; Yong Li (Tsinghua University, China); Zhangdui Zhong (Beijing Jiaotong University, China); Dapeng Oliver Wu (University of Florida, USA)

1570341863: Quantifying Secondary Spectrum Whitespace Opportunity Distributions, Pierce Rixon; Michael Heimlich (Macquarie University, Australia)

1570342202: Comparison of Stationarity Regions for Wireless Channels From 2 GHz to 30 GHz, Yi Tan; Chengxiang Wang (Heriot-Watt University, UK); Jasper Nielsen (Aalborg University, Denmark); Gert Pedersen (Aalborg University, Denmark)

1570342209: Optical Wireless Communication based Two Receiver Indoor Positioning Algorithm, Manisha Ajmani; Tuleen Boutaleb; Sinan Sinanovic (Glasgow Caledonian University, UK)

1570337054: A Broadband Dual-Polarized Base Station Antenna Element for European Digital Dividend, CDMA800 and GSM900 Applications, Yejun He; Wei Tian (Shenzhen University, China)

1570338608: Efficient Embedded Signaling Scheme for Nodes Identification using Block Coding with Blind Phase Estimation in Relay Systems, Mariem Ayedi (SUP'COM, Tunisia); Noura Sellami (Ecole Nationale d'Ingenieurs de Sfax; Tunisia); Moahmed Siala (SUP'COM, Tunisia)

1570343154: Cooperative Robust Geometric Positioning Algorithm in Wireless Networks, Kaouther Hedhly and Mohamed Laaraiedh (Higher School of Communications of Tunis, University of Carthage, Tunisia); Fatma Abdelkefi (SUPCOM), Tunisia; Mohamed Siala (Sup'Com, Tunisia); Bernard Uguen; Nicolas Amiot (Université Rennes 1 - IETR, France)

- **Session Title:** Heterogeneous Mechanisms in WSN-1 (WSNs Symp.)
➤ **Session Chair:** Hassan Artail, American University of Beirut, Lebanon

WM-3: Room: SALER

- 1570340010:** Relation between Functional Complexity, Scalability and Energy Efficiency in WSNs, Merim Dzaferagic; Nicholas J. Kaminski; Irene Macaluso (Trinity College Dublin, Ireland); Nicola Marchetti (CTVR Trinity College, Ireland)
1570342272: Maintaining a permanent connectivity between nodes of an air-to-ground communication network, Dorin Rautu (IRIT/ENSEEIH, University of Toulouse, France); Riadh Dhaou (IRIT/ENSEEIH, University of Toulouse, France); Emmanuel Chaput (IRIT-ENSEEIH, France)
1570332667: Performance of outlier detection techniques based classification in Wireless Sensor Networks, Oussama Ghorbel (CES Research Unit, National School of Engineers of Sfax, Tunisia)
1570341182: Energy Efficient Filtering Techniques for Data Aggregation in Sensor Networks, Hassan Harb (Lebanese University, Lebanon); Abdallah Makhoul (University of Franche-Comté, France); Samar Tawbi (Lebanese university, Lebanon); Oussama Zahwe (AUCE, Lebanon)
1570341394: Classification data using Outlier Detection method in Wireless Sensor Networks, Oussama Ghorbel (CES Research Unit, National School of Engineers of Sfax, Tunisia)
1570341769: ETX-based Relay Selection Coalition Game for Wireless Sensor Networks, Evangelos Spyrou; Dimitri Mitrakos (Aristotle University of Thessaloniki, Greece)

- **Session Title:** System Security (Security Symposium)
➤ **Session Chairs:** Leocadio G. Casado, University of Almeria, Spain

WM-4: Room: TURIA

- 1570342256:** On Mitigating Pollution and Free-Riding Attacks by Shamir's Secret Sharing in Fully Connected P2P Systems, Cristóbal Medina-López (University of Almeria, Spain); Vicente G. Ruiz (University of Almeria, Spain); Leocadio G. Casado (University of Almeria, Spain)
1570341663: A lightweight protocol for privacy preserving division, Spyros Boukoros; Nikolaos Karvelas; Stefan Katzenbeisser (TU-Darmstadt, Germany)
1570333523: An Authenticated Key Agreement Protocol for Cross-Domain Based on Heterogeneous Signcryption Scheme, Caifen Wang; Chao Liu; Shufen Niu, Li Chen and Xu Wang (Northwest Normal University, P.R. China)
1570335354: A Trust Secure Funnel based Mobile Service Discovery and Exposure Model, Walid El Ayeb (Higher School of Communication of Tunis, Tunisia); Zied Choukair (Mediatron SupCom, Tunisia)
1570333610: ABR: A new efficient attribute based revocation on access control system, Imine Youcef; Abdelmadjid Bouabdallah; Ahmed Lounis (University de Technology de Compiègne, France)
1570338250: Attack Behavioural Analysis and Secure Access for Wireless Access Point (AP) in Open System Authentication, Shudong Liu and Yonglei Liu; Zhigang Jin (Tianjin University, P.R. China)
1570342163: A trust management system based on communities of interest for the social Internet of things, Oumaima Ben Abderrahim; Mohamed Elhoucine Elhdhili and Leila Azouz Saidane (ENSI, Tunisia)

LUNCH BREAK

13:00 – 14:00

Wednesday Afternoon Sessions (WA) — (13:30 - 15:30)

- **Session Title:** Routing Protocols for WSN (WSNs Symposium)
➤ **Session Chair:** Haidar Safa & Wassim El-Hajj, American University of Beirut, Lebanon

WA-1: Room: MALVARROSA

- 1570343099:** Enhancing Routing Protocol for Low Power and Lossy Networks, John Abied Hatem; Haidar Safa; Wassim El-Hajj (American University of Beirut, Lebanon)
1570347971: CEED: Computationally Efficient, Dynamic Distributed Algorithm of Sensor-based Big Data, Mohammed S. Al-kahtani (Prince Sattam bin Abdulaziz University, Saudi Arabia); Lutful Karim (Seneca College of Applied Arts and Technology, Canada); Jalal N Almhana (Universite De Moncton, Canada)
1570333867: Cross-layer Based Routing Protocol for Wireless Sensor Networks using a fuzzy logic module, Asma Messaoudi (University of Tunis el Manar, Tunisia); Rabiaa Elkamel (University of Carthage, Tunisia); Abdelhamid Helali (ISIMM, Tunisia); Ridha R. Bouallegue, B. (Ecole Supérieure des Communications de Tunis, Tunisia)
1570338455: A Range-based Opportunistic Routing Protocol for Wireless Sensor Networks, Hajer Benfradj (Innov'COM, Tunisia); Rajoua Anane (Laboratory of Acoustics at University of Maine, LAUM & Innovation of Communication, Innov'com, Sup'com, University of Carthage Tunisia, France)
1570338457: Comparative Study of Opportunistic Routing in Wireless Sensor Networks, Hajer Benfradj (Innov'COM, Tunisia); Rajoua Anane (Laboratory of Acoustics at University of Maine, LAUM & Innovation of Communication, Innov'com, Sup'com, University of Carthage Tunisia, France)

1570342133: Improving the Performance of the Cross-Layer Wake-Up Routing Protocol T-ROME, Timo Kumberg; Mojtaba Moharrami; Christian Schindelbauer (University of Freiburg, Germany); Leonhard Reindl (IMTEK - Institute for Microsystem Technology, Germany)

1570351764: Lifetime Maximization via Hole Alleviation in heterogeneous wireless sensor networks, Muhammad Awais; Saba Gul; Junaid Shabbir Abbasi (COMSATS Institute of Information Technology, Pakistan); Muhammad Imran (King Saud University, Saudi Arabia); Kashif Nasr; Nadeem Javaid (COMSATS Institute of IT, Pakistan)

- | |
|--|
| <p>➤ Session Title: Net. Coding and Millimeter Wave (Wireless Networking Symp.) WA-2: Room: LAS ARENAS</p> <p>➤ Session Chair: Octavia Dobre, Memorial University, Canada</p> |
|--|

1570342143: Constraint-Aware Multi-Path Intra-Flow Network Coding in Wireless Mesh Networks, Paul-Louis Ageneau and Nadia Boukhatem (Telecom ParisTech, France); Mario Gerla (University of California at Los Angeles, USA)

1570342180: Bounded Network Coding Redundancy for Multi-Layer Video Streaming, Hana Baccouch (Télécom ParisTech, France); Paul-Louis Ageneau (Telecom ParisTech, France); Nicolas Tizon (Institut Telecom, France); Nadia Boukhatem (Telecom ParisTech, France); Thi Mai Trang Nguyen (UPMC Sorbonne Universités; LIP6, France)

1570343130: A Joint Random Linear Network Coding and Compute-and-Forward in Multi-source Multi-relay Networks, Rithea Ngeth; Brian Michael Kurkoski; Yuto Lim; Yasuo Tan (JAIST, Japan)

1570338562: A Normalization Model for Analyzing Multi-Tier Millimeter Wave Cellular Networks, Siqing Xiong (Huazhong University of Science and Technology, P.R. China); Lijun Wang (Wuhan University & Wenhua College, P.R. China); Kyung Sup Kwak (Inha University, Korea); Zhiqian Bai (Shandong University, P.R. China); Jiang Wang (Shanghai Research Center for Wireless Communication, P.R. China); Qiang Li and Tao Han (Huazhong University of Science and Technology, P.R. China)

1570341982: QoE Prediction on Imbalanced IPTV data based on Multi-layer Neural Network, Chaoping Lv, Ruochen Huang, Wenqin Zhuang, Xin Wei and Qiuxia Bao (Nanjing University of Posts and Telecommunications, P.R. China)

1570340959: MoG-Based Outage Probability Analysis of EGC and MRC Diversity Combining Schemes in Composite Fading-Shadowing MIMO Channels, Abdelhafid Elharoussi (Institut National des Posts et Télécommunications, Morocco); Mustapha Benjillali and Abdelaziz Soulimani (INPT, Morocco)

1570340136: Analysis of Shielding of Metallic Rectangular Waveguide using New Implementation of the MoM-GEC Method based on Wave Concept, Ahmed Nouainia (Faculty of Science of Tunis, Tunisia); Taoufik Aguilu (ENIT, Tunisia)

- | |
|---|
| <p>➤ Session Title: Antennas & Performance Analysis (Comm. & Signal Processing Symp.) WA-3: Room: SALER</p> <p>➤ Session Chair: Miran Taha, Universidad Politecnica de Valencia, Spain</p> |
|---|

1570342245: A Compact CPW-Fed Hexagonal Antenna with a New Fractal Shaped Slot for UWB Communications, Youcef Braham Chaouche (University of Mohamed Elbachir Elibrahimi, Algeria); Farid Bouttout (University of Bordj Bou Arreridj, Algeria); Idris Messaoudene (Ecole Nationale Supérieure d'Informatique, Algeria); Lionel Pichon (SUPELEC, France); Massinissa Belazzoug (Université de Bordj Bou Arreridj, Algeria); Farouk Chetouah (Université Ferhat Abbas, Algeria)

1570342086: Dual-band Pre-fractal Antenna Multi-objective Optimization Design, Imen Khadhraoui (ENIT, Tunisia); Taha Ben Salah (ENISo, Tunisia); Taoufik Aguilu (ENIT, Tunisia)

1570338647: Miniaturized Wideband Printed Rectangular Monopole Antenna for X- and Ku-Bands, Farouk Chetouah (Université Ferhat Abbas, Algeria); Nacerdine Bouzit (Laboratoire Instrumentation Scientifique, Algeria); Idris Messaoudene (Ecole Nationale Supérieure d'Informatique, Algeria); Salih Aidel; Massinissa Belazzoug (Université de Bordj Bou Arreridj, Algeria); Youcef Braham Chaouche (University of Mohamed Elbachir Elibrahimi, Algeria)

1570342259: Circular Array Synthesis Using Taguchi Algorithm for Reliable IEEE 802.11 MIMO Applications, Elies Ghayoula (EL Manar University, Tunisia); Ridha Ghayoula, Jean-Yves Chouinard (Laval University, Canada); Amor Smida (Faculty of Sciences Tunis, Tunisia); Ammar Bouallegue (National School of Engineers of Tunis, Tunisia)

1570342319: Asymptotic Analysis of Underwater Communication System subject to κ - μ Shadowed Fading Channel, Elmehdi Illi (University Mohamed V, Morocco); Faissal El Bouanani (ENSIAS, Mohammed V University in Rabat, Morocco); Fouad Ayoub (CRMEF Kenitra, Morocco)

1570338643: Annular Dielectric Resonator Loaded with Strip Loop Antenna for Tri-band Applications, Farouk Chetouah (Université Ferhat Abbas, Algeria); Nacerdine Bouzit (Laboratoire Instrumentation Scientifique, Algeria); Idris Messaoudene (Ecole Nationale Supérieure d'Informatique, Algeria); Salih Aidel; Massinissa Belazzoug (Université de Bordj Bou Arreridj, Algeria); Youcef Braham Chaouche (University Of Mohamed Elbachir Elibrahimi, Algeria)

1570342297: Efficient Design of Wireless Anisotropic Circuits, Mohamed Lamine Tounsi (USTHB University, Algeria); Mustapha Yagoub (University of Ottawa, Canada)

- **Session Title:** OFDM – Multiple Access - Positioning I (WON Symposium) **WA-4: Room:** TURIA
- **Session Chairs:** Zhengyuan (Daniel) Xu, University of Science and Technology of China

1570341729: A Threshold-based Multiple Optical Signal Selection Scheme for WDM FSO Systems, Sung Sik Nam (Korea University, Korea); Mohamed-Slim Alouini (KAUST, Saudi Arabia); Young-Chai Ko (Korea University, Korea); Sung Ho Cho (Hanyang University, Korea)

1570341897: Joint Equalization and Synchronization for Carrierless Amplitude and Phase Modulation in Visible Light Communication, Kabiru Oluwaseun Akande (University of Edinburgh, UK); Paul Anthony Haigh (University College London, UK); Wasiu O. Popoola (University of Edinburgh, UK)

1570342204: Design of improved IR protocol for LED indoor positioning system, Olaoluwa Rotimi Popoola; Wasiu O. Popoola (University of Edinburgh, UK); Roberto Ramirez-Iniguez; Sinan Sinanovic (Glasgow Caledonian University, UK)

1570338402: Hybrid Obesity Monitoring Model using Sensors and Community Engagement, Saad Harous and Mohamed Adel Serhani (UAE University, UAE); Mohamed Elmenshawy (Concordia University, Canada); Abdelghani Benharref (University of Wollongong, Australia)

1570339444: Visible Light Communications with Hybrid OFDM-PTM, Zabih Ghassemlooy (Northumbria University, United Kingdom); Saeed Olyaei (Shahid Rajaee Teacher Training University; Nano-Photonics and Optoelectronics Research Laboratory, Iran); Farzane Ebrahimi (Shahid Rajaee Teacher Training University, Iran); Sujan Rajbhandari (Coventry University, United Kingdom); Xuan Tang (Quanzhou Institute of Equipment Manufacturing of Chinese Academy of Sciences, P.R. China); Stanislav Zvanovec (Czech Technical University in Prague, Czech Republic)

1570338571: Indoor Positioning System Based on Visible Light Communication with Gray-Coded Identification, Junnan Gao, Fang Yang and Xu Ma (Tsinghua University, P.R. China)

1570338732: Improved VLC-Based Indoor Positioning System Using a Simple Regression Approach with Conventional RSS Techniques, Sherine Shawky, Mohamed A. El-Shimy and Ziad A. El-Sahn (Alexandria University, Egypt); Mohamed Rizk (University of Alexandria, Egypt); Moustafa Hussein Aly (Arab Academy for Science, Egypt)

Coffee Break — (15:30 - 16:00)

Wednesday Afternoon Sessions (WA) — (16:00 - 18:00)

- **Session Title:** OFDM – Multiple Access - Positioning II (WON Symposium) **WA-5: Room:** MALVARROSA
- **Session Chair:** Zhengyuan (Daniel) Xu, University of Science and Technology of China

Keynote: LiFi Attocell Networking–Taking the Small Cell Concept to a New Level

Prof. Harald Haas, Professor, University of Edinburgh, UK

1570341956: Demonstration of a Covert Camera-Screen Communication System, Jie Wang, Wei Huang and Zhengyuan Xu (University of Science and Technology of China, P.R. China)

1570343449: Undersampled Differential Phase Shift On-Off Keying for Optical Camera Communications with Phase Error Detection, Niu Liu; Julian Cheng (University of British Columbia, Canada); Jonathan F Holzman (University of British Columbia (UBC) Okanagan, Canada)

1570341902: Millimeter Wave Cell Search for Initial Access: Analysis, Design, and Implementation, Sana Habib; Syed Ali Hassan (National University of Sciences and Technology, Pakistan); Ali A Nasir (KFUPM, Saudi Arabia); Hani Mehrpouyan (Boise State University, USA)

- **Session Title:** Internet of Things (Wireless Networking Symposium) **WA-6: Room:** LAS ARENAS
- **Session Chair:** Cheng Li, Memorial University of Newfoundland, Canada

1570347689: Trusted Third Party for Service Management in Vehicular Clouds, Moayad Aloqaily (Carleton University, Canada); Burak Kantarci and Hussein T. Mouftah (University of Ottawa, Canada)

1570338903: Analysis the Energy Consumption of Three Wireless Vehicle Transmission Model in Shadow-Fading Environment, Chenguang He, Kaiyu Zhang, Shuai Han and Weixiao Meng (Harbin Institute of Technology, P.R. China); Cheng Li (Memorial University of Newfoundland, Canada)

1570337531: On the Throughput of Cognitive Radio MIMO Systems Assisted with UAV Relays, Lokman Sboui (KAUST, Saudi Arabia); Hakim Ghazzai (QMIC, Qatar); Zouheir Rezki (University of Idaho, USA); Mohamed-Slim Alouini (KAUST, Saudi Arabia)

1570333806: On the impact of inter-UAV communications interference in the 2.4 GHz band, Francisco Fabra and Carlos T. Calafate (Universidad Politécnic de Valencia, Spain); Juan-Carlos Cano (Universidad Politecnica de Valencia, Spain); Pietro Manzoni (Universitat Politècnica de València, Spain)

1570346430: An hybrid and proactive architecture based on SDN for Internet of Things, Djamila Bendouda (Research Laboratory in Industrial Computing and Networks (LRIIR), Algeria); Abderrezak Rachedi (University Paris-Est Marne-la-Vallée, France); Haffaf Hafid (University of Oran, Algeria)

1570342154: A Migration-enhanced Edge Computing Support for Mobile Services in Hostile Environments, Paolo Bellavista, Michele Solimando and Alessandro Zanni (University of Bologna, Italy)

1570336289: SDN-based Throughput Allocation in Wireless Networks for Heterogeneous Adaptive Video Streaming Applications, Miran Taha; Laura Garcia; Jose M. Jimenez; Jaime Lloret (Polytechnic University of Valencia, Spain)

➤ **Session Title:** Clustering Mechanisms for WSNs (WSNs Symposium)

WA-7: Room: SALER

➤ **Session Chair:** Sameh Sorour, University of Idaho, USA

1570333383: An Optimized Cluster-Based WSN Design for Latency-Critical Applications, Mounib Khanafer (AUK, Kuwait); Irfan S. Al-Anbagi (University of Regina, Canada); Hussein T. Mouftah (University of Ottawa, Canada)

1570338305: DC-LEACH: A Duty-Cycle Based Clustering Protocol for Energy Harvesting WSNs, Mohammed S. Bahbahani; Emad Alsusa (University of Manchester, United Kingdom)

1570333518: Adaptive Distributed Hierarchical Sensing Algorithm for Reduction of Wireless Sensor Network Cluster-Heads Energy Consumption, Gal Oren (Ben-Gurion University of the Negev, Nuclear Research Center - Negev, Israel); Leonid Barenboim (The Open University of Israel, Israel); Harel Levin (The Open University of Israel, Nuclear Research Center-Negev, Israel)

1570335946: Clustering Approach Using Node Mobility in Wireless Sensor Networks, Fatma BelAbed (National Engineering School of Tunis, Tunisia); Ridha R. Bouallegue, B. (Ecole Supérieure des Communications de Tunis, Tunisia)

1570338576: Fuzzy Cluster Head Election Algorithm based on LEACH protocol for Wireless Sensor Networks, Wided Abidi; Tahar Ezzedine (National Engineering School of Tunis (ENIT), Tunisia)

1570342189: A Novel Sensing Matrix for Cluster Structured Sparse Signals, Hamid Nouasria; Mohamed Et-tolba (INPT, Morocco)

1570338586: Assessment of Multi-UAVs Tracking for Data Gathering, Mustapha Bekhti; Michele Garraffa; Nadjib Achir; Khaled Boussetta; Lucas Létocart (University of Paris 13, France)

➤ **Session Title:** Vehic. Performance Eval. & Management (Veh. Comm. Symp.)

WA-8: Room: TURIA

➤ **Session Chair:** Lorena Parra, Universidad Politecnica de Valencia, Spain

1570338791: Dynamic Pricing Model for EV Charging-Discharging Service Based on Cloud Computing Scheduling, Djibir Abd Eldjalil Chekired (University of Technology of Troyes, France); Dhaou Said (University of Ottawa, Canada); Lyes Khoukhi (University of Technology of Troyes, France); Hussein Mouftah (University of Ottawa, Canada)

1570341742: Cooperative BSM Architecture to Improve Transportation Safety in VANETs, Hamza Ijaz Abbasi, Razvan Voicu, John A. Copeland (Georgia Institute of Technology, USA); Yusun Chang (Kennesaw State University, USA)

1570341358: Inter-Vehicle Video Communications over Vehicular Ad Hoc Networks, Lotfi Abdi (ENIT, Tunisia); Aref Meddeb (University of Sousse, Tunisia)

1570343168: Performance Evaluation of a TDMA-based Multi-hop Communication Scheme for Reliable Delivery of Warning Messages in Vehicular Networks, Mohamed Hadded (TELECOM SudParis, France); Paul Muhlethaler (INRIA, France); Anis Laouiti (TELECOM SudParis, France)

1570331924: An Infrastructure Based Congestion Detection and Avoidance Scheme for VANETs, Hesham Elsayed and Gokulnath Thandavarayan (UAEU, UAE); Sharmi Sankar (Ibri College of Applied Sciences, Oman); Ishtiaque Mahmood (CASE, Islamabad, Pakistan)

1570342120: Mobility-aware multimedia data transfer using Multipath TCP in Vehicular Network, Zhu Danyang, Changqiao Xu, Jiuren Qin, Zan Zhou and Jianfeng Guan (Beijing University of Posts and Telecommunications, P.R. China)

DINNER BANQUET

19:00 – 21:00

TECHNICAL PROGRAM
IEEE IWCMC 2017
Valencia, SPAIN, June 26th — 30th, 2017

Thursday, June 29th, 2017

Registration — (8:00 - 15:00)

Room: Open Hall

KEYNOTE 3 — (9:30 - 10:30)

Room: MALVARROSA

- **Speaker:** Prof. Mohamed-Slim Alouini, KAUST, SA
- **Title:** Paving the Way Towards 5G Wireless Communication Networks
- **Chair:** Narcis Cardona, Polytechnic University of Valencia, Spain

Coffee Break — (10:45 - 11:15)

Thursday Morning Sessions (ThM) — (11:15 - 13:00)

- **Session Title:** Cloud/Fog Networking and Computing (NGSN Symp.) **ThM-1: Room: MALVARROSA**
- **Session Chair:** Jo Minho & Jooncheri Ho (Korea University & Samsung Electronics, Korea)

1570335064: Selective Offloading to WiFi Devices for 5G Mobile Users by Fog Computing, Jo Minho (Korea University, Korea); Jooncheri Ho (Korea University & Samsung Electronics, Korea); Jing Zhang (Huazhong University of Science and Technology, China)

1570333856: Towards the deployment of a fully centralized Cloud-RAN Architecture, Veronica Quintuna; Fabrice M. Guillemin (Orange Labs, France)

1570342257: Extended Study towards Performance Improvement of Cloud-RAN, Maha Fathy (Pharos University, Egypt); Bassem Mahmoud Mokhtar (Alexandria University, Egypt); Mohammed Abdou (City of Scientific Research and Technology Applications, Egypt); Mohamed Rizk (Alexandria University)

1570349081: Multi-State Prediction: A VOM based User Behavior Pattern in Cognitive Internet, Neng Zhang; Jianfeng Guan and Changqiao Xu (Beijing University of Posts and Telecommunications, P.R. China)

1570341838: A Novel Adaptive Streaming Approach for Cloud-based Mobile Video Games, Rahma Gharsallaoui; Mohamed Hamdi (University of Carthage, Tunisia); Tai-Hoon Kim (Sungshin University, Korea)

1570333864: A transparent code offloading technique for Android devices, Rômulo de Oliveira; Mateus Machry; Nicolas Shirmer; Tiago Ferreto (PUCRS, Brazil)

1570347233: Adaptive Power Ranges and Associations for Self-Healing in Multiple Types of Wi-Fi Networks, Frank Yeong-Sung Lin and Ming-Chi Tsai (National Taiwan University, Taiwan); Yean-Fu Wen (National Taipei University, Taiwan); Chiu-Han Hsiao (National Taiwan University, Taiwan)

- **Session Title:** Machine Learning (Wireless Networking Symp.) **ThM-2: Room: LAS ARENAS**
- **Session Chair:** Ala Al-Fuqaha, Western Michigan University, USA

1570339239: Fault Prediction for Proactive Self-Healing Cellular Networks, Yash Kumar (Booker T. Washington High School, USA); Hasan Farooq and Ali Imran (University of Oklahoma, USA)

1570341843: On the Implementation of Channel Selection for LTE in Unlicensed Bands using Q-learning and Game Theory algorithms, Anna Castañe; Jordi Pérez-Romero; Oriol Sallent (Universitat Politècnica de Catalunya, Spain)

1570351311: Using MapReduce and Hierarchical Entropy Analysis to Speed-Up the Detection of Covert Timing Channels, Omar Darwish and Ala Al-Fuqaha (Western Michigan University, USA); Ghassen Ben Brahim (PMU, Saudi Arabia); Muhammad Awais Javed (COMSATS Institute of Information Technology Islamabad, Pakistan)

1570342552: Proactive and Hybrid Wireless Network Access Strategy for Vehicle Cloud Networks: An Evolutionary Game Approach, Tesnim Mekki (University of Sfax & National School of Engineers of Sfax, Tunisia); Issam Jabri (Ecole Nationale d'Ingénieurs de Gabès, Tunisia); Abderrezak Rachedi (University Paris-Est Marne-la-Vallée, France); Maher Ben Jemaa (University of Sfax, Tunisia)

1570343283: Incentive Reward for Efficient WiFi Offloading using Q-Learning Approach, Emna Fakhfakh; Soumaya Hamouda (Sup'Com, Tunisia)

1570339147: When Machine Learning Meets Compressive Sampling for Wideband Spectrum Sensing, Bassem Khalfi, Adem Zaid and Bechir Hamdaoui (Oregon State University, USA)

1570347548: A congestion Control Approach based on Dynamic ACB of Differentiated M2M Services in 5G/HetNet, Kaouther Taleb Ali, Sonia Ben Rejeb and Zied Choukair (Sup'com, Tunisia)

- | | |
|---|---------------------------|
| ➤ Session Title: Localization in WSNs (WSNs Symp.) | ThM-3: Room: SALER |
| ➤ Session Chair: Ramachandran Venkatesan, Memorial University, New Foundland, Canada | |

1570333324: Localization of Binary Motion Sensors in House, Nathavuth Kitbutrawat; Hirozumi Yamaguchi; Teruo Higashino (Osaka University, Japan)

1570338349: Area-based Vs. Multilateration Localization: A Comparative Study of Estimated Position Error, Nouredine Lasla (CERIST, Algeria); Abdelmalik Bachir (Biskra University, Algeria); Mohamed Younis (University of Maryland Baltimore County, USA)

1570338454: SVM-Based Indoor Localization in Wireless Sensor Networks, Amira Chriki (Hatem Bettahar IResCoMath Research Unit, Tunisia); Haifa Touati (ENSI, Cristal, Tunisia); Hichem Snoussi (University of Technology of Troyes, France)

1570344777: Exploiting machine learning strategies and RSSI for localization in wireless sensor networks: A survey, Hanen Ahmadi (Université de Tunis El Manar, Tunisia)

1570351763: Coverage hole alleviative geographic routing robust against location error, Ahmad Raza; Babar Ali; Farwa Ahmad; Saiful Islam (COMSATS Institute of IT, Islamabad, Pakistan); Muhammad Imran (King Saud University, Saudi Arabia); Nadeem Javaid (COMSATS Institute of IT, Pakistan)

1570333294: Localization of Damage using Wireless Sensor Networks for Tunnel Health Monitoring, Amira Zrelli (Tunis El Manar University, Tunisia); Tahar Ezzedine (ENIT, Tunisia)

1570342353: Distributed Cell Scheduling for Multichannel IoT MAC Protocols, Ahlem Hannachi; Abdelmalik Bachir (Biskra University, Algeria)

- | | |
|--|---------------------------|
| ➤ Session Title: Performance Analysis (WON Symposium) | ThM-4: Room: TURIA |
| ➤ Session Chairs: Zouheir Rezki, University of Idaho, USA | |

1570343014: BER Analysis of Multi-hop Heterodyne FSO Systems with Fixed Gain Relays Over General Malaga Turbulence Channels, Wael Alheadary; Ki-Hong Park and Mohamed-Slim Alouini (KAUST, Saudi Arabia)

1570341384: On the Performance of Two-Way Multiuser Mixed RF/FSO Relay Networks with Opportunistic Scheduling & Asymmetric Channel Gains, Yasser F. Al-Eryani; Anas M. Salhab; Salam A. Zummo (KFUPM, Saudi Arabia); Mohamed-Slim Alouini (KAUST, Saudi Arabia)

1570342006: Precise Outage Analysis of Mixed RF/Unified-FSO DF Relaying with HD and 2 IM-DD Channel Models, Omer Al-Ebraheemy; Anas M. Salhab (KFUPM, Saudi Arabia); Anas Chaaban (KAUST, Saudi Arabia); Salam A. Zummo (KFUPM, Saudi Arabia); Mohamed-Slim Alouini (KAUST, Saudi Arabia)

1570336001: Optical OFDM for Visible Light Communications, Zhaocheng Wang and Tianqi Mao (Tsinghua University, P.R. China); Qi Wang (University of Southampton, UK)

1570341634: A new Variable Error Metric Adaptive Beamforming Algorithm for Smart Antenna Systems, Vincenzo Inzillo; Floriano De Rango (University of Calabria, Italy); Alfonso Ariza Quintana (University of Malaga, Spain)

LUNCH BREAK

13:00 – 14:00

Thursday Afternoon Sessions (ThA) — (13:30 - 15:30)

- | | |
|--|--------------------------------|
| ➤ Session Title: MAC and Scheduling Protocols for WSNs (WSNs Symp.) | ThA-1: Room: MALVARROSA |
| ➤ Session Chair: Renato de Moraes, Federal University of Pernambuco, Brazil | |

1570338750: Impact of Multiple Access Technique on Wireless Structural Control, Hamza Soury (University of Illinois at Chicago, USA); Thao H. T. Truong; Lauren Linderman (University of Minnesota, USA); Besma Smida (University of Illinois at Chicago, USA)

1570335360: Development and characterization of a Robust Differential Wake-up Receiver for Wireless Sensor Networks, Jorge Saez (University of Freiburg, Germany); Leonhard Reindl (IMTEK - Institute for Microsystem Technology, Germany); Timo Kumberg (University of Freiburg, Germany)

1570342314: Improving the Energy Efficiency for a WBSN based on a Coordinate Duty Cycle and Network Coding, Hisham Alshaheen; Haifa Takruri (University of Salford, United Kingdom)

1570341988: Biologically Inspired Self-Organization and Node-Level Interference Mitigation Amongst Multiple Coexisting Wireless Body Area Networks, Samaneh Movassaghi (Australian National University and CSIRO Data61, Australia); Behnam Maleki (University of Technology Sydney, Australia); David Smith (CSIRO Data 61 & Australian National University,

Australia); Mehran Abolhasan (University of Technology Sydney, Australia)

1570342098: MAC protocols for Wireless Body Area Networks: An overview, Bethaina Touijer (LRIT-CNRST URAC 29, Mohammed V University in Rabat, Morocco); Yann Ben Maissa (INPT, Morocco); Salma Mouline (LRIT-CNRST URAC 29, Mohammed V University in Rabat, Morocco)

1570342100: On Improving the Saturation Performance of IEEE802.15.6-based MAC Protocols in Wireless Body Area Networks, Sarvin Sadra; Mehran Abolhasan (University of Technology Sydney, Australia)

1570342592: Explicit Non-Congestion Notification: A New AQM Approach for TCP Networks, Luciano Sup (University of Brasilia, Brazil); Renato M. de Moraes (Federal University of Pernambuco, Brazil); Adolfo Bauchspiess (University of Brasilia, Brazil)

➤ Session Title: Heterogeneous Networks (Wireless Networking Symp.)	ThA-2: Room: LAS ARENAS
➤ Session Chair: Jelena Mišić and Vojislav B. Mišić, Ryerson University, Canada	

1570338857: A Many-to-Many Matching Game in Ultra-dense LTE HetNets, Mariame Amine; Abdellaziz Walid; Abdellatif Kobbane (ENSIAS, Mohammed V University of Rabat, Morocco); Soumaya Cherkaoui (Université de Sherbrooke, Canada)

1570332672: Energy Efficiency Optimization for Non-overlay Planning of Heterogeneous Cellular Networks, Mahmut Demirtas and Alkan Soysal (Bahcesehir University, Turkey)

1570344245: Dynamic Dwell Timer for Vertical Handover in VLC-WLAN Heterogeneous Networks, Ruiqi Liu and Chao Zhang (Tsinghua University, P.R. China)

1570341868: Joint User Association and Power Minimization for a Two-Tier HetNet with Interference Coordination and QoS Guarantees, Jihene Ben Abderrazak (Assistant at ESPRIT, Tunisia); Hichem Besbes (Ecole Supérieure de Communications de Tunis, Sup'Com, University of Carthage, TUNISIA, Tunisia)

1570342332: A Linear Programming Approach to Joint Scheduling of Real-Time and Non Real-Time Services in OFDMA-based Systems, Y. Boujelben (ENET'COM, Tunisia); A. Ghandri (ISIMG, Tunisia); K. Mnif (Sfax University, Tunisia)

1570341677: An Energy-Efficient Technique for MANETs Distributed Monitoring, Chaker abdelaziz Kerrache (Université Amar Thelidji de Laghouat, Algeria); Andrea Lupia and Floriano De Rango (University of Calabria, Italy); Carlos T. Calafate; Juan-Carlos Cano; Pietro Manzoni (Universitat Politècnica de València, Spain)

1570342360: EGIP: An Efficient Group Identification Protocol In Roaming Network, Lei Wang; Xiujie Zhang; Aiqing Zhang, Baoyu Zheng, Quan Zhou (Nanjing University of Posts and Telecommunications, P.R. China)

➤ Session Title: Smart Cities (Smart Cities Symp.)	ThA-3: Room: SALER
➤ Session Chair: Ala Al-Fuqaha & Ajay Gupta, Western Michigan University, USA	

1570341948: Parameters Optimization of Deep Learning Models using Particle Swarm Optimization, Basheer Qolomany, Majdi Maabreh, Ala Al-Fuqaha, Ajay Gupta (Western Michigan Univ., USA); Driss Benhaddou (University of Houston, USA)

1570331897: Angular Wall Loss Model and Extended Building Penetration Model for Outdoor to Indoor Propagation, Muhammad Usman Sheikh (Tampere University of Technology, Finland); Kimmo Hiltunen (Ericsson, Finland); Jukka Lempiäinen (Tampere University of Technology, Finland)

1570333728: Online Scheduling Scheme for Smart Electric Vehicle Charging Infrastructure, Farag Sallabi; Khaled Shuaib (UAE University, UAE); Mahmoud Alahmad (University of Nebraska - Lincoln, USA)

1570338009: User traces analysis based on crowdsourced data, Elena Simona Lohan and Pedro Figueiredo Silva (Tampere University of Technology, Finland)

1570338819: Finding Most Reliable Paths for Software Defined Networks, Ali Malik (University of Portsmouth, UK)

1570338860: A game-theoretic approach for non-overlapping communities detection, F. Mourchid; A. Kobbane (ENSIAS, Mohammed V Univ. of Rabat, Morocco); J. Ben-Othman (U. of Paris 13, France); M. El Koutbi (ENSIAS, Morocco)

1570338863: Impact of Server placement on Routing Performance in Network Virtualization, Achref El Amri; Aref Meddeb (ENISO, University of Sousse, France)

➤ Session Title: Physical Layer Security (Security Symposium)	ThA-4: Room: TURIA
➤ Session Chairs: Daniel Benevides da Costa, Federal University of Ceara (UFC), Brazil	

1570341888: PHY-SEC: Secret Key Exchange and Authentication via Random Spatial Modulation and Phase Shifting, Hasan Taha; Emad Alsusa (University of Manchester, United Kingdom)

1570349760: Secure Communication via Untrusted Switchable Decode-and-Forward Relay, Haji Muhammad Furqan Ahmed Madni (Istanbul Medipol University & School of Engineering and Natural Science Electrical, Electronics and Cyber Systems, Turkey); Jihad Hamamreh (Istanbul Medipol Univ., Turkey); Huseyin Arslan (U. of South Florida, USA)

1570349767: Secure Pre-coding and Post-coding for OFDM Systems along with Hardware Implementation, Jihad Hamamreh (Istanbul Medipol U., Turkey); Haji Muhammad Furqan Ahmed Madni (Istanbul Medipol U. & School of Engineering and Natural Science Electrical, Turkey); Huseyin Arslan (U. of South Florida, USA)

1570338730: Joint Effect of Jamming and Noise in Wiretap Channels with Multiple Antennas, Yosbel Ortega (Federal University of Ceará, Brazil); Prabhat Kumar Upadhyay (Indian Institute of Technology Indore, India); Daniel Benevides da Costa (Federal University of Ceara (UFC), Brazil); Petros S. Bithas and Athanasios G. Kanatas (University of Piraeus, Greece); Ugo Dias and Rafael Timoteo de Sousa Junior (University of Brasilia, Brazil)

1570338372: Energy consumption comparison for mobile video streaming encryption algorithm, N. Samet (SUP'COM, Tunisia); A. Ben Letaïfa (MEDIATRON, Tunisia); M. Hamdi (Sup'Com, Tunisia); S. Tabbane (Sup Telecom, Tunisia)

1570342534: Improvements to Smart Energy Profile Security, Imen Aouini and Lamia Benazzouz (CRISTAL, Tunisia)

1570341286: A New approach of Authentication in Graphical Systems using ASCII submission of values, Devansh Gupta (The Institution of Engineers, India)

Coffee Break — (15:30 - 16:00)

Thursday Afternoon Sessions (ThA) — (16:00 - 18:00)

- | | |
|--|--------------------------------|
| ➤ Session Title: QoE/QoS in Networking (QoS Workshop) | ThA-5: Room: MALVARROSA |
| ➤ Session Chair: Abderrezak Rachedi, Université Paris-Est, France | |

1570344486: Performance Analysis of the Quality of Service-aware Networking Scheme for Smart Internet of Things Gateways, Anderson Augusto Simiscuka, Marija Bezbradica and Gabriel-Miro Muntean (Dublin City University, Ireland)

1570342095: A VoIP focused frame aggregation in wireless local area networks: features and performance characteristics, Kawther Hassine (Sup'Com, Tunisia); Mounir Frikha (High School of Communication in Tunis, Tunisia)

1570343789: Adaptive QoE Monitoring architecture In SDN networks Video Streaming services Case, Asma Ben Letaifa (SupCom, Tunisia)

1570344161: Opportunistic Dual Metric scheduling based on Quality of service and Power Control for LTE Uplink Network, Fatma Loussaief; Hend Marouane; Hend Koubaa; Faouzi Zarai (Sfax University, Tunisia)

1570343654: Machine Learning based QoE Prediction in SDN networks, Abar Tasnim; Sadok El Asmi; Asma Ben Letaifa (SupCom, Tunisia)

1570344775: Objective and subjective measurement QoE in SDN networks, Abar Tasnim; Asma Ben Letaifa; Sadok El Asmi (Sup'Com, Tunisia)

1570349116: QoS Enhancement Based On Resource Allocation in Wireless Networks, Hekma Chaari (LETI, Tunisia); Kais Mnif; Faouzi Zarai (Sfax University, Tunisia)

- | | |
|---|--------------------------------|
| ➤ Session Title: Wireless Access Networks (Wireless Networking Symp.) | ThA-6: Room: LAS ARENAS |
| ➤ Session Chair: Shuai Han, Harbin Institute of Technology, P.R. China | |

1570338164: Link-gain based power control mechanism for Wireless Sensor Networks, Ismail Bennis; Marwane Ayaida and Michel Herbin (University of Reims Champagne-Ardenne, France); Frédéric Blanchard (University of Reims, France)

1570341917: Inter-piconet communications in cognitive personal area networks with prioritized exchange of synchronization information, Md Mizanur Rahman, Jelena Mišić and Vojislav B. Mišić (Ryerson University, Canada)

1570338764: Digital Predistortion of a Full-Duplex Radio-over-Fiber Mobile Fronthaul Link with Feedback Loop, Carlos Mateo, Jesus Clemente, Paloma Garcia, Pedro Carro, Jesús de Mingo and Iñigo Salinas (University of Zaragoza, Spain)

1570338762: A multicast rate adaptation algorithm over IEEE 802.11aa GCR Block Ack scheme, Kaouthar Mansour (ENIT, Tunisia); Issam Jabri (Ecole Nationale d'Ingénieurs de Gabès, Tunisia); Tahar Ezzedine (Tunis El Manar University, Tunisia)

1570338378: A Cooperation-Driven ICN-based Caching Scheme for Mobile Content Chunk Delivery at RAN, Xu Zhang (Xi'an University of Technology, P.R. China); Yue Cao (Northumbria University, United Kingdom)

1570341860: An Efficient Channel Estimation Scheme of Non-orthogonal Multiple Access System in 5G Wireless Networks, Xin Bian; Rongfang Song (NJUPT, P.R. China); Mingqi Li (SARI, CAS, P.R. China); Yun Rui (Shanghai Advanced Research Institute, Chinese Academy of Sciences, P.R. China)

1570342331: A battery level aware vertical handover decision making in multi-access wireless networks, Mouad Mansouri; Charkaoui Leghris (University of Casablanca, Morocco)

➤ **Session Title:** Heterogeneous Network Mechanisms-2 (WSNs Symposium)

ThA-7: Room: SALER

➤ **Session Chair:** Jaume Segura-Garcia, University of Valencia, Spain

1570341676: Energy Consumption in Software Defined Networks to Provide Service for Mobile Users, David Sarabia-Jácome (Universidad Politécnica de Valencia, Spain); Abert Rego (Universidad Politécnica de Valencia, Spain); Sandra Sendra (Universidad de Granada, Spain); Jaime Lloret (Universidad Politecnica de Valencia, Spain)

1570342345: RPL Enhancement using a new Objective Function based on combined metrics, Hanane Lamaazi and Nabil Benamar (Moulay Ismail University, Morocco)

1570343850: A Proactive Approach toward Privacy Risk Assessment for Android Apps Permissions, Asma Hamed (CRISTAL Lab. National School of Computer Science University of Manouba, & Esprit School of Engineering, Tunisia); Hella Kaffel-Ben Ayed (University of Tunis El Manar & University of Manouba, Tunisia); Dorra Machfar (Faculty of Science of Tunis University of Tunis El Manar, Tunisia)

1570338868: Applying DTN Routing for Reservation-Driven EV Charging Management in Smart Cities, Yue Cao (Northumbria U., UK); Xu Zhang (Xi'an U. of Technology, P.R. China); Ran Wang (Nanjing U. of Aeronautics and Astronautics, P.R. China); Linyu Peng (Waseda U., Japan); Nauman Aslam and Xiaomin Chen (Northumbria U., UK)

1570343558: A Street-Centric QoS-OLSR Protocol for Urban Vehicular Ad Hoc Networks, Maha Kadadha; Hadi Otrok; Hassan Barada; Mahmoud Al-Qutayri; Yousof Al-Hammadi (Khalifa University, UAE)

1570338809: Performance analysis of a buffer-aided incremental relaying in cooperative wireless networks, Hina Nasir (International Islamic University, Islamabad, Pakistan); Nadeem Javaid (COMSATS Institute of IT, Pakistan); Waseem Raza (UET, Taxila, Pakistan); Muhammad Imran (KSU, Saudi Arabia); Mohsen Guizani (University of Idaho, USA)

1570338812: Buffer size and link quality based cooperative relay selection in wireless networks, Waseem Raza (UET, Taxila, Pakistan); Hina Nasir (International Islamic University, Islamabad, Pakistan); Nadeem Javaid (COMSATS Institute of IT, Pakistan); Muhammad Imran (KSU, Saudi Arabia); Mohsen Guizani (University of Idaho, USA)

➤ **Session Title:** M-Health (eHealth Symposium)

ThA-8: Room: TURIA

➤ **Session Chair:** Amr Mohamed, Qatar University, Qatar

1570341583: A Review of Security Challenges, Attacks and Resolutions for Wireless Medical Devices, Heena Rathore; Amr Mohamed and Abdulla K Al-Ali (Qatar U., Qatar); Xiaojiang Du (Temple U., USA); Mohsen Guizani (U. of Idaho, USA)

1570341209: On The Shortcoming Of DTN Solutions in Rural mHealth Applications, Ahmed Emam (Carnegie Mellon U., USA); Abderrahmen Mtibaa (New Mexico State U., USA); Khaled A. Harras (Carnegie Mellon U., USA); Amr Mohamed (Qatar U., Qatar)

1570338568: Deep learning approach for adaptive EEG compression in energy-aware mHealth system, Ahmed Ben Saïd, Amr Mohamed and Tarek M. Elfouly (Qatar University, Qatar)

1570333046: Inhomogeneity reduction for near field acquisition in high resolution MRI systems, Pablo Padilla; Juan Valenzuela-Valdés (Universidad de Granada, Spain); Jose L Padilla (University of Granada, Spain)

1570338901: Unobtrusive Mobile Approach to Patient Location and Orientation Recognition for Elderly Care Homes, George Oguntala, Raed Abd-Alhameed, Stephen M R Jones and Jim M. Noras (University of Bradford, United Kingdom)

1570338924: A Comparative Study of MAC Protocols in Brain-Computer Interface (BCI) Applications, Jinendar Lalwani Kumar, Mahasweta Sarkar and Sidhant Mohanty (San Diego State University, USA); Syed Hassan Ahmed (Kyungpook National University, Korea)

1570341872: Passive Wireless Sensing for Unsupervised Human Activity Recognition in Healthcare, Wenda Li and Yangdi Xu (University of Bristol, United Kingdom); Bo Tan (Coventry University, UK); Robert J Piechocki (University of Bristol, UK)

DINNER (On your Own)

TECHNICAL PROGRAM
IEEE IWCMC 2017
Valencia, SPAIN, June 26th — 30th, 2017

Friday, June 30th, 2017

Friday Morning Sessions (FRM) — (08:30 - 10:30)

- | | |
|---|---------------------------------------|
| <p>➤ Session Title: Routing and Localization (Wireless Networking Symp.)</p> <p>➤ Session Chair: Francisco Barcelo-Arroyo, Technical University of Catalonia, Spain</p> | <p>FRM-1: Room: MALVARROSA</p> |
|---|---------------------------------------|

1570341643: Impact of Unreliable Positioning in Location-based Routing Protocols for MANETs, Israel Martin-Escalona (Technical University of Catalonia, Spain); Fabio Perrone (Politecnico di Torino, Italy); Enrica Zola; Francisco Barcelo-Arroyo (Technical University of Catalonia, Spain)

1570343306: Scalable Energy Efficient Routing in Multi-Layer Femtocell Networks, Jun Zhang; Houda Labiod (Telecom ParisTech, France); Seif eddine Hammami; Hossam Afifi (Télécom SudParis, France)

1570338615: A Comparison of Bayesian Localization Methods in the Presence of Outliers, Nunzia Giorgia Ferrara (Finnish Geospatial Research Institute, Finland); Henk Wymeersch (Chalmers University of Technology, Sweden); Elena Simona Lohan and Jari Nurmi (Tampere University of Technology, Finland)

1570338700: Messages propagation Control in Delay Tolerant Networks under Epidemic routing protocol, Ahmed El Ouadrhiri; Mohamed El Kamili; Imane Rahmouni (LIMS, FSDM, Sidi Mohamed Ben Abdallah University, Morocco)

1570344809: Smart PDR integration for ubiquitous pedestrian navigation service, Wiem Fekih Hassen (ENSI, Tunisia), Faiza Najjar (ENSI, Tunisia), Lionel Brunie (INSA de Lyon, France), Harald Kosch (University of Passau, Germany), Yahya Slimani (ISAMM, Tunisia)

1570348268: Virtual Coordination Protocol Towards Ultra Dense Heterogeneous Networks, Afef Bohli (National Engineering School of Tunis, Tunisia)

1570340171: Algorithm for Prediction of Negative Links using Sentimental Analysis in Social Networks, Debasis Das (BITS Pilani Goa Campus, India); Pushkar Sharma (NIIT University, India)

- | | |
|---|---------------------------------------|
| <p>➤ Session Title: Coding (Comm. & Signal Processing Symp.)</p> <p>➤ Session Chair: Yujun He, Shenzhen University, China</p> | <p>FRM-2: Room: LAS ARENAS</p> |
|---|---------------------------------------|

1570342048: A Physical-Layer Network Coding Aware Distributed Scheduling Policy, Raphael Naves and Gentian Jakllari (University of Toulouse, France); Hicham Khalife and Vania Conan (Thales Communications & Security, France); André-Luc Beylot (University of Toulouse, France)

1570349439: Bidirectional Relaying Protocol & Power Allocation Scheme for Cognitive Buffer-Aided DF Relay Networks, Yasser F. Al-Eryani; Anas M. Salhab; Salam A. Zummo and Azzedine Zerguine (KFUPM, Saudi Arabia)

1570333018: Graph-based Joint Source Channel LDPC Decoding for Cooperative Communication with Error-corrupted Relay Observations, Marwa Ben Abdesslem (National Engineering School of Tunis, Tunisia); Zribi Amin (Higher Institute of Communication Technology & Telecom Bretagne, Tunisia); Tad Matsumoto (Japan Advanced Institute of Science and Technology, Japan); Ammar Bouallegue (National School of Engineers of Tunis, Tunisia)

1570333682: Efficient Construction of Polar Codes, Wei Wang; Liping Li (Anhui University, P.R. China)

1570345094: Channel Coding for NOMA Schemes with A JD or SIC Receiver, Yushu Zhang, Kewu Peng, Jian Song and Yaqi Sun (Tsinghua University, P.R. China)

1570350150: Measurements and Modeling of Human Blockage Effects for Multiple Millimeter Wave Bands, Wenzhe Qi and Jie Huang; Jian Sun (Shandong University, P.R. China); Yi Tan and Chengxiang Wang (Heriot-Watt University, United Kingdom); Ge Xiaohu (Huazhong University of Science & Technology, P.R. China)

1570342338: On the Evaluation and Analysis of the Data Rate of an OFDM-Based Two-Way Relaying PLC System, S. Ezzine; F. Abdelkefi (ENIT, Tunisia); J. P. Cancas; V. Meghdadi (U. Limoges, FR); A. Bouallegue (Mediatron, Tunisia)

- | | |
|---|----------------------------------|
| <p>➤ Session Title: WSNs Applications (WSNs Symp.)</p> <p>➤ Session Chair: Davide Brunelli, University of Trento, Italy</p> | <p>FRM-3: Room: SALER</p> |
|---|----------------------------------|

1570337501: Toward Avoiding Energy Holes in UnderWater Acoustic Sensor Networks, Chaima Zidi (King Abdulaziz University & LIPADE Laboratory, University of Paris Descartes, France); Fatma Bouabdallah (King Abdulaziz University, Saudi Arabia); Raouf Boutaba (University of Waterloo, Canada); Ahmed Mehaoua (University of Paris Descartes, France)

1570338688: Enhancing Bluetooth Low Energy with wake-up radios for IoT applications, Davide Giovanelli; Bojan Milosevic (Fondazione Bruno Kessler, Italy); Davide Brunelli (University of Trento, Italy); Elisabetta Farella (Fondazione Bruno Kessler & DEI - University of Bologna, Italy)

1570338296: Covering a 3D Flat Surface with Autonomous and Mobile Wireless Sensor Nodes, Nadia Boufares (ENSI, Tunisia); Pascale Minet (INRIA, France); Ines Khoufi (INRIA, France); Leila Azzouz Saidane (Lab CRISTAL- ENSI, University Manouba, Tunisia)

1570351755: Balanced energy efficient rectangular routing protocol for underwater wireless sensor networks, Junaid Shabbir Abbasi; Nadeem Javaid (COMSATS Institute of IT, Pakistan); Muhammad Imran (KSU, Saudi Arabia); Saiful Islam (COMSATS Institute of IT, Pakistan); Najmul Hassan (Mohammad Ali Jinnah University Islamabad Pakistan, Pakistan); Kashif Nasr (COMSATS Institute of Information Technology, Pakistan)

1570351759: SMPC: Singular division of Multipath Power Control tree based routing protocol for Underwater Wireless Sensor Networks, Muhammad Sajid; Saba Gul; Kamran Khan; Ayesha Khan (COMSATS Institute of Information Technology, wah cantt, Pakistan); Muhammad Imran (KSU, Saudi Arabia); Nadeem Javaid (COMSATS Institute of IT, Pakistan)

1570351761: Logical Sub-Region with Sink Mobility for throughput Maximization and Energy Consumption Minimization in Rectangular UWSNs, Ayesha Khan; Kamran Khan; Saba Gul; Muhammad Sajid (COMSATS Institute of IT, Pakistan); Muhammad Imran (KSU, Saudi Arabia); Nadeem Javaid (COMSATS Institute of IT, Pakistan)

1570351762: Energy Hole Avoidance based Routing for Underwater WSNs, Babar Ali; Nadeem Javaid; Ahmad Raza; Farwa Ahmad; Junaid Shabbir Abbasi; Saiful Islam (COMSATS Institute of IT, Pakistan); Muhammad Imran (KSU, Saudi Arabia)

➤ Session Title: Enabling Techniques for 5G Communications (5G Workshop)	FrM-4: Room: TURIA
➤ Session Chairs: Nurul H. Mahmood, Aalborg University, Denmark	

1570331898: Analysis of Multipath Propagation for 5G System at Higher Frequencies in Microcellular Environment, Muhammad Usman Sheikh and Jukka Lempiäinen (Tampere University)

1570333516: Full Duplex Communications in 5G Small Cells, Nurul H. Mahmood (Aalborg University, Denmark); Marta Gatnau Sarret (Aalborg University & Nokia, Denmark); Gilberto Berardinelli and Preben Mogensen (Aalborg U., Denmark)

1570345205: A traffic distribution scheme for 5G resilient backhauling using integrated satellite networks, Jesus Mendoza; Ramon Ferrús and Oriol Sallent (Polytechnic University of Catalonia, Spain)

1570338439: Low-Complexity Detection for Massive MIMO Systems over Correlated Rician Fading, Sofia Ghacham (Mohammed V University In Rabat, Morocco); Mustapha Benjillali (INPT, Morocco); Zouhair Guennoun (Ecole Mohammedia d'Ingenieurs & Laboratoire d'Electronique et de Communications, Morocco)

1570332896: Approximate BER Expressions for FSO Communication Systems with Multiuser Diversity, Chadi Abou-Rjeily; Mohamad Chami (Lebanese American University, Lebanon)

1570342290: A Novel RSRP-Based E-CID Positioning for LTE Networks, Gokhan Celik; Hasari Celebi (Gebze Technical University, Turkey); Gökhan Tuna (Vodafone, Turkey)

1570342018: Usage Control for Charging/Discharging of Plug in Electric Vehicle (UConPEV), Ezedin Barka; Juhar Abdella; Khaled Shuaib (UAE University, UAE)

Coffee Break — (10:45 - 11:15)

Friday Morning Sessions (FRM) — (11:15 - 13:00)

➤ Session Title: Clustering and Distributed Algorithms (Wireless Net. Symp.)	FrM-5: Room: MALVARROSA
➤ Session Chair: Jesus Mendoza, Polytechnic University of Catalonia, Spain	

1570342219: Cluster resource assignment algorithm for Device-to-Device networks based on graph coloring, Jianding Guo; Laurent Moalic; Jean-Noel Martin and Alexandre Caminada (UTBM, France)

1570341953: Performance Analysis of a Distributed MAC Scheme for Multi-Packet Reception Wireless Networks, António Furtado; David Vicente (DEE/FCT/UNL, Portugal); Rodolfo Oliveira; Luis Bernardo; Rui Dinis (Nova U. of Lisbon, Portugal)

1570342532: MRC Based SER Analysis of High Efficient UWB Spatial Modulation System, Shanshan Peng; Zhiqian Bai (Shandong University, P.R. China); Yingyan Su; Shangqian Sun (Shandong University, P.R. China); Tao Han (Huazhong University of Science and Technology, P.R. China); Kyung Sup Kwak (Inha University, Korea)

1570333606: Performance analysis of Clustering algorithm in a C-RAN Architecture, Kmar Thaalbi; Med Taher Missaoui and Nabil Tabbane (SupCom, Tunisia)

1570345041: Distributed power allocation for Device-to-Device communications underlying cellular networks, Ningqing Liu, Tong Liu, Wenbin Zhang, Shuai Han and Qiang Wang (Harbin Institute of Technology, P.R. China)

1570348369: An Indoor Positioning Approach using Sibling Signal Patterns in Enterprise WiFi Infrastructure, Xuan Du, Kun Yang (University of Essex, UK); Xiaofeng Lu (Xidian University, P.R. China); Xiaohui Wei (Jilin University, P.R. China)

1570351767: Towards the Integration of Diverse Context into Advertisement Recommendation on Mobile Devices, Youssef

- | | |
|--|--------------------------------|
| ➤ Session Title: E-Health (eHealth Symposium) | FrM-6: Room: LAS ARENAS |
| ➤ Session Chair: Somaya Ali Al-maadeed, Qatar University, Qatar | |

1570341894: Multispectral imaging and machine learning for automated cancer diagnosis, Suchithra Kunhoth and Somaya Ali Al-maadeed (Qatar University, Qatar)

1570341899: Building a multispectral image dataset for Colorectal Tumor biopsy, Suchithra Kunhoth and Somaya Ali Al-maadeed (Qatar University, Qatar)

1570348029: A review on Radio Frequency Identification methods, Suchithra Kunhoth; Somaya Ali Al-maadeed (Qatar University, Qatar)

1570342052: Joint Epidemic Control and Routing in Mass Gathering Areas using Body-to-Body Networks, Amira Meharouech (Paris Descartes University, France); Jocelyne Elias (Paris Descartes University & Sorbonne Paris Cité, France); Ahmed Mehaoua (University of Paris Descartes, France)

1570342289: Low-cost Fog-assisted Health-care IoT System with Energy Efficient Sensor Nodes, Tuan Nguyen Gia, Mingzhe Jiang and Victor Kathan Sarker (University of Turku, Finland); Amir M. Rahmani (University of California, Irvine, USA & TU Wien, Austria); Tomi Westerlund, Pasi Liljeberg and Hannu Tenhunen (University of Turku, Finland)

1570342106: Wireless Health Monitoring using Passive WiFi Sensing, Usman Khan and Zain Kabir; Syed Ali Hassan (National University of Sciences and Technology, Pakistan)

1570339006: ECG Based Authentication For the IoT: Towards a Secured and Ethical ECG Features Transmission, Emna Kalai (Ecole Polytechnique de Tunis & Telnet Innovation Labs, Tunisia); Adel Benzina (LISI Lab, University of Carthage, Tunisia); Rabah Attia (SERCOM Labs EPT University of Carthage La Marsa Tunis, Tunisia)

- | | |
|--|---------------------------|
| ➤ Session Title: WSN-based Monitoring Systems (WSNs Symp.) | FrM-7: Room: SALER |
| ➤ Session Chair: Mohamad Ali, Imine Youcef, University de Technology de Compiègne, France | |

1570338713: IoT-enabled Channel Selection Approach for WBANs,, Mohamad Ali; Hassine Moun gla (University of Paris Descartes/Instiut Mines Telecom & Instiut Mines Telecom, France); Mohamed Younis (University of Maryland Baltimore County, USA); Ahmed Mehaoua (University of Paris Descartes, France)

1570342178: Design of a Climate Monitoring System Based on Sensor Network, Walid Fantazi; Tahar Ezzedine (National Engineering School of Tunis, Tunisia)

1570342511: Collect Tree Protocol for SHM System using wireless sensor networks, A. Zrelli; T. Ezzeddine (ENIT, Tunisia)

1570351803: Energy-efficient distributed relay selection in wireless sensor network for internet of things, Sheikh Tahir Bakhsh (King Abdul Aziz University, Saudi Arabia)

1570345760: Ant Colony Based Hole Detection In Wireless Sensor Networks, D. Krichen; W. Abdallah (CN&S Research Lab., Tunisia); N. Boudriga (Communication Networks and Security Research Lab., University of Carthage, Tunisia)

1570355554: Evaluation of Capabilities of Open Source Cognitive Radio Network Simulators, Zeeshan Haider, Riaz Hussain, Irfan Latif Khan, Atif Shakeel, Bilal Ijaz and Shahzad A. Malik (COMSATS IIT, Islamabad, Pakistan)

1570342486: Adaptive UIWB AV PHY IEEE 802.15.3c for Compressed SPIHT Image Transmission, A. Ben Abdallah (Higher School of Communication of Tunis, Tunisia); A. Zribi (Higher Institute of Communication Technology & Telecom Bretagne, Tunisia); A. Dziri (CNAM Paris, France); F. Tilili (Ecole Supérieure de Communications de Tunis); M. Terré (CNAM, France)

- | | |
|---|---------------------------|
| ➤ Session Title: Advances towards Efficient 5G Communications (5G Workshop) | FrM-8: Room: TURIA |
| ➤ Session Chairs: Jose Monserrat, Universitat Politècnica de València, Spain | |

1570338589: On the Integration of Grassmannian Constellations into LTE Networks: A Link-level Performance Study, J. Cabrejas; D. Martín-Sacristán; S. Roger; D. Calabuig; J. Monserrat (Universitat Politècnica de València, Spain)

1570338581: A Polynomial Expansion Based Detection: A Low-Complexity Approach for Generalized Spatial Modulation over Transmit Antenna Correlation, Yue Sun, Jintao Wang and Changyong Pan (Tsinghua University, P.R. China)

1570341363: Energy Consumption Analysis of SDF and Non-Cooperative Schemes Over Nakagami-m channel and Under Outage Probability Constraint, Lamia Grira; Ridha Bouallegue (SUP'COM, Tunisia)

1570344334: "Fuzzy Q-Learning-Based User-Centric Backhaul-Aware User Cell Association Scheme", Farrukh Pervez (National University of Sciences and Technology Islamabad, Pakistan); Mona Jaber (University of Surrey, UK); Junaid Qadir (IT University, Pakistan); Muhammad Shahzad Younis (National University of Sciences and Technology, Pakistan); Muhammad Ali Imran (University of Glasgow, United Kingdom)

1570349131: Minimization of Delays in Multi-Service Cloud-RAN BBU Pools, Amel Arfaoui (University of Bourgogne/Sup'Com, Tunisia); Soumaya Hamouda (Ecole Supérieure des Communications de Tunis, Tunisia); Loutfi Nuaymi (Telecom Bretagne, France); Philippe Godlewski (Telecom ParisTech (ENST), France)

1570336591: A Distributed IBFD MAC Mechanism and Non-saturation Throughput Analysis for Wireless Networks, Haiwei

Zuo, Yanjing Sun, Song Li, Qi Cao and Yan Chen; Wenjuan Shi; Xiaolin Wang (CUMT, P.R. China)

1570332704: CAWO: Congestion-Aware WiFi Offloading for 5G Heterogeneous Wireless Network, Liu Bin (Nanjing University of Posts and Telecommunications, Nanjing, P.R. China)

LUNCH BREAK

13:00 – 14:00

Friday Afternoon Sessions (FRA) — (13:30 - 15:30)

- **Session Title:** Big Data Security (Big Data Symposium)
- **Session Chair:** Frederick Sheldon, University of Idaho, USA

FrA-1: Room: MALVARROSA

1570342313: Security Management of Cyber Physical Control Systems Using NIST SP 800-82r2, Ananth Jillepalli; Daniel Conte de Leon and Michael Haney; Frederick Sheldon (University of Idaho, USA); Robert K Abercrombie (Prime Time Computing, LLC, USA)

1570341615: Lightweight Format-Compliant Encryption Algorithm for JPEG 2000 Images, Zeinab Fawaz (University of Franche Comte, France); Hassan Noura (Independent, France); Ahmed Mostefaoui (Université de Franche Comté, France)

1570338956: A new Steganalysis method to Detect Information Hiding in speech, Fatiha Djebbar (UAEU, UAE); Beghdad Ayad (Emirates Aviation University, United Arab Emirates (UAE))

1570343224: Protocol for Preserving Privacy in Distributed System (PPDS), Achref Aloui (University Paris8, France); Mounira Msahli (TELECOM ParisTech, France); Talel Abdessalem (Big Data, France); Sihem Mesnager (University of Paris VIII, France); Stephane Bressan (NUS, Singapore)

1570339789: IEEE 802.15.4 Security sublayer for OMNET++, Ghada Glissa (University of Tunis El Manar, Tunisia); Aref Meddeb (University of Sousse, Tunisia)

1570341210: Data Redundancy May Lead to Unreliable Intrusion Detection Systems, MS Al-Rawi (Universidade de Aveiro, Portugal); Yasmin Al-Zuqary (AraVis, Germany); Firooz B. Saghezchi (Instituto de Telecomunicações, Portugal); Jie Yang (Shanghai Jiao Tong University, P.R. China); Jonathan Rodriguez (Universidade de Aveiro, Portugal)

1570342138: CTMS-SIOT: A Context-based Trust Management system for social internet of things, Oumaima Ben Abderrahim; Mohamed Elhoucine Elhdhili (ENSI, Tunisia); Leila Azouz Saidane (ENSI, University of Manouba, Tunisia)

- **Session Title:** IoT 3 (IoT Symposium)
- **Session Chair:** Sonia Aïssa, INRS, University of Quebec, Canada

FrA-2: Room: LAS ARENAS

1570341987: A Coalition Formation Algorithm for Multi-Robot Task Allocation in Large-Scale Natural Disasters, Carla Mouradian (Concordia University, Canada); Jagruti Sahoo (South Carolina State University, USA); Roch Glitho (Concordia University, Canada); Monique Morrow (Cisco Systems, Switzerland); Paul Polakos (CISCO Systems, USA)

1570342194: Context Aware Middleware for RFID Based Pharmaceutical Supply Chain, Marwa Chamekh; Mohamed Hamdi and Sadok El Asmi (Sup'Com, Tunisia); Tai-Hoon Kim (Sungshin W University, Korea)

1570342284: Enhancing the Throughput of 802.11ah Sectorized Networks Using AID-based Backoff Counters, Hanifa Nabuuma; Emad Alsusa (Manchester University, United Kingdom)

1570343238: On the Energy Efficiency and Stability of RPL Routing Protocol, Sheeraz A. Alvi (The Australian National University (ANU), Australia); Fakhar Hassan and Adnan Noor Mian (Information Technology University, Pakistan)

1570343241: On Route Maintenance and Recovery Mechanism of RPL, Sheeraz A. Alvi (The Australian National University (ANU), Australia); Adnan Noor Mian (Information Technology University, Pakistan)

1570343299: A Privacy-Preserving Homomorphic Encryption Scheme for the Internet of Things, J. Zouari (Sup'Com, Tunisia); M. Hamdi (University of Carthage, Tunisia); T-H. Kim (Sungshin W University, Korea)

1570338441: Analysis of Reactive Multi-Branch Relaying under Interference and Nakagami-m Fading, Amir. H. Forghani; Sonia Aïssa (INRS, University of Quebec, Canada); Minghua Xia (Sun Yat-sen University, P.R. China)

- **Session Title:** Next Generation Networking (NGSN Symp.)
- **Session Chair:** Jalal Almhana, University of Moncton, Canada

FrA-3: Room: SALER

1570333550: A Centralized Inter-Cell Rank Coordination Mechanism for 5G Systems, Nurul H. Mahmood (Aalborg University, Denmark); Klaus Pedersen (Nokia – Bell Labs, Denmark); Preben Mogensen (Aalborg University, Denmark)

1570337544: Comparative Analysis of Downlink Scheduling Algorithms for LTE Femtocells Networks, Yosra Benchaabene; Boujnah Nouredine (National Engineering School of Gabes, Tunisia); Faouzi Zarai (Sfax University, Tunisia)

1570338350: Design of 4G LTE Testbed for Implementing Green Cellular Algorithm, Gaurav Kulkarni; Mahasweta Sarkar; Santosh V. Nagaraj (San Diego State University, USA); Syed Hassan Ahmed (Kyungpook National University, Korea)

1570341825: More Clients Connected by NOMA in the Downlink Transmission of WLANs, Zhong Tian; Jun Wang; Jintao Wang; Chao Zhang; Zihan Tang; Feiteng Wu (Tsinghua University, China)

1570342309: Handover based on a Multi Criteria approach in WiMax Networks, W. Benaatou (Cadi Ayyad University, Morocco); V. Pla (Polytechnic university of Valencia, Spain); A. Latif (Cadi Ayyad University, Morocco); M. D. Baba (University Technologies MARA, Malaysia)

1570342321: Reactive and Proactive Strategies for Content Update in Content-Centric and Multi-users WSNs, G. Jaber (U. of Toulouse, France); R. Kacimi (IRIT/UPS, U. of Toulouse, France); T. Gayraud (LAAS-CNRS, U. of Toulouse, France)

1570342244: Secure Shortened MSR Codes, Natasa Paunkoska (UIST, Macedonia); Ninoslav Marina (Princeton University, USA); Weiler A. Finamore (UFJF - Federal University of Juiz de Fora, Brazil); Jovan Karamachoski (UIST, Macedonia)

➤ Session Title: Energy Efficient Systems (EEP Workshop)	FrA-4: Room: TURIA
➤ Session Chairs: Adel Ben Mnaouer, Canadian University of Dubai, UAE	

1570342021: Block-Sparse Compressive Sensing Based Multi-User and Signal Detection for Generalized Spatial Modulation in NOMA, Tengjiao Wang (Tsinghua University, P.R. China); Sicong Liu (Tsinghua University & Research Institute of Information Technology, Tsinghua National Laboratory of Information Science and Technology, P.R. China); Fang Yang, Jintao Wang and Jian Song (Tsinghua University, P.R. China); Zhu Han (University of Houston, USA)

1570349183: Constellation and Labeling Optimization for Bit-Interleaved Coded Spatial Modulation System, Zhecheng An; Jun Wang; Jintao Wang, Tengjiao Wang and Jian Song (Tsinghua University, P.R. China)

1570340852: Kalman Filter for Target Tracking Using Coupled RSS and AoA Measurements, D. Vicente (DEE/FCT/UNL, Portugal); S. Tomic (Universidade Nova de Lisboa, Portugal); M. Beko (ULHT/UNINOVA & UNINOVA, Portugal); R. Dinis (FCT-UNL, Portugal); M. Tuba (John Naisbitt University, Serbia); N. Bacanin (Megatrend University, Serbia)

1570342203: Energy-Efficient Multihop Schemes over Weibull-Fading Channels: Performance Analysis and Optimization, Abdelaziz Soulamani and Mustapha Benjillali (INPT, Morocco); Hatim Chergui (ExceliaCom Solutions, Morocco)

1570349188: Graph Theory Based Multicast Caching for Better Energy Saving in Dense Small Cell Networks, Safa Mrad (National Engineering School of Tunis, Tunisia); Soumaya Hamouda (Ecole Supérieure des Communications de Tunis, Tunisia); Houria Rezig (National Engineering School of Tunis (ENIT), Tunisia)

1570350741: EAMP-AIDC - Energy-Aware Mac Protocol With Adaptive Individual Duty Cycle For EH-WSN, O. Bouachir; A. Ben Mnaouer (CUD, UAE); F. Touati (Qatar University, Qatar); D. Crescini (University of Brescia, Italy)

1570342242: Performance analysis of MIMO cooperative relays for wireless sensor networks, Ali Dziri (CNAM Paris, FR)

Coffee Break — (15:30 - 16:00)

Friday Afternoon Sessions (FRA) — (16:00 - 18:00)

➤ Session Title: Next Generation Wireless Communications (NGSN Symp.)	FrA-5: Room: MALVARROSA
➤ Session Chair: Jorge Cabrejas, Universitat Politècnica de València, Spain	

1570342226: Design and Analysis of a 2Tb/s UDWDM System based on The Combination of Advanced Modulation Techniques and Multi-diagonal Code, Monia Najjar Bounouh; Sana Rebhi (SysCom, Tunisia)

1570338712: Joint Interference Suppression and Multiuser Detection for Three-Cell Multiple Relay Communications, Ahmet Ihsan Canbolat; Kazuhiko Fukawa (Tokyo Institute of Technology, Japan)

1570341845: Performance Analysis of Multi-Packet Reception Wireless Systems in Far-field Region, Antonio Furtado; David Vicente; Rodolfo Oliveira (Universidade Nova de Lisboa, Portugal); Luis Bernardo (FCT/Universidade Nova de Lisboa, Portugal); Rui Dinis (Universidade Nova de Lisboa, Portugal)

1570341846: Packet-Appended BICM-ID Exploiting Signal Space Diversity, M. Krasicki (Poznan U. of Technology, Poland)

1570342271: Degrees of Freedom in Cached MIMO Relay Networks With Multiple Base Stations, Osama Hana (Nile University, Egypt); Amr El-Keyi (Carleton University, Canada); Mohammed Nafie (Cairo University & Nile University, Egypt)

1570342373: Basis Expansion Model Based Spectral Efficient Channel Estimation Scheme for Massive MIMO Systems, Xuesi Wang; Jintao Wang; Longzhuang He; Jian Song (Tsinghua University, China)

1570338633: Geometry Optimization for WiFi-based Indoor Passive Multistatic Radars, Junaid Abdullah; Syed Ali Hassan (National University of Science and Technology, Pakistan)

➤ Session Title: Secure Communications (Wireless Networking Symp.)	FrA-6: Room: LAS ARENAS
➤ Session Chair: Sandra Sendra, Universidad de Granada, Spain	

1570337946: Achieving Secure Communication Through Random Phase Rotation Technique, Zhijiang Xu and Yuan Teng (Zhejiang University of Technology, P.R. China); Yi Gong (Southern University of Science and Technology, P.R. China); Weidang Lu and Jingyu Hua (Zhejiang University of Technology, P.R. China)

1570341918: Game-based Secure Sensing for the CRN, Jihen Bennaceur (National School of Computer Science Tunisia,

Tunisia); Hanen Idoudi (University of Manouba, Tunisia); Leila Azouz Saidane (ENSI, University of Manouba, Tunisia)
1570337723: A New Iterative Phase Correction Algorithm in Conformal Antenna Array Designing, Chengzhao Shan, Yongkui Ma and Honglin Zhao; Ruoyu Zhang (Harbin Institute of Technology, P.R. China)
1570338756: Access Control in 5G Communication Networks Using Simple PKI Certificates, Wided Boubakri (Supcom, Tunisia); Walid Abdallah (CN&S Research Lab., Tunisia); Noureddine Boudriga (University of Carthage, Tunisia)
1570342325: AMBAS: an Autonomous Multimodal Biometric Authentication System, Abdeljebar Mansour; Mohamed Sadik; Essaid Sabir; Mostafa Jebbar (Hassan II University of Casablanca, Morocco)
1570342211: Performance Enhancement of OCDMA System Based on 3D-Multi-Diagonal Codes, Monia Najjar Bounouh; Nabih Jallali (Syscom- ENIT, Tunisia); Moez Ferchichi (Ecole Nationale d'Ingénieurs de Tunis, Tunisia)
1570333617: SCTP-WSN New Extension for More Reliable Sparse Wireless Sensor Networks, Salheddine, Sadouni (University of Constantine 1, Algeria); Malek Benslama; Azzedine Mebarki (University of Constantine, Algeria); André-Luc Beylot (University of Toulouse, France)

➤ Session Title: Applications (AINIS Symposium)	FrA-7: Room: SALER
➤ Session Chair: Oscar Alvear, Universitat Politècnica de València, Spain	

1570337546: A chemotactic pollution-homing UAV guidance system, Oscar Alvear (Universitat Politècnica de València, Spain & Universidad de Cuenca, Ecuador); Nicola Roberto Zema; Enrico Natalizio (Université de Technologie de Compiègne, France); Carlos T. Calafate (Universidad Politècnica de Valencia, Spain)
1570338668: Dynamic Content Distribution for Decentralized Sharing in Tourist Spots using Demand and Supply, S. Kaisar and J. Kamruzzaman (Monash University, Australia); G. C. Karmakar; I. Gondal (Federation University, Australia)
1570338817: M-CoLBA: Multichannel Collaborative Load Balancing Algorithm with queue overflow avoidance in WSNs, Hamadoun Tall; Gerard Chalhoub; Michel J. Misson (Clermont University, France)/LIMOS CNRS, France)
1570342109: A New VLC Channel Model for Underground Mining Environment, Jia Wang (Shandong University, P.R. China); Ahmed Al-Kinani (Heriot-Watt University, United Kingdom); Wensheng Zhang (Shandong University, P.R. China); Chengxiang Wang (Heriot-Watt University, United Kingdom)
1570336252: Hybrid mechanism for remote water pipeline monitoring system, Maroua Abdelhafidh (ENIS, Tunisia); Lamia Chaari; Mohamed Fourati (Institut supérieur d'informatique et multimédia de sfax, Tunisia); Amor Abidi (GCT, Tunisia)
1570333855: CUsTOMER: A novel Customer chUrn predicTion methOd based on Mobile application usage, Nielsen Machado and Duncan Ruiz (Pontifical Catholic University of Rio Grande do Sul - PUCRS, Brazil)
1570336688: A Novel Cross-layer Framework for Large Scale Emergency Communications, Vu San Ha Huynh; Milena Radenkovic (University of Nottingham, United Kingdom)

➤ Session Title: Mobile Computing (Mobile Computing Symp.)	FrA-8: Room: TURIA
➤ Session Chair: Rafael Martinez, University of Valencia, Spain	

1570333824: A Low Complexity Distributed Cluster based Algorithm for Spatial Prediction, Vinay prasad Chowdappa; Carmen Botella; Sara Santos Sáez, Jose Javier Samper and Rafael Martinez (University of Valencia, Spain)
1570333307: Intelligent Handover Procedure for Heterogeneous LTE Networks using Fuzzy logic, Evelin Cardoso, Ketyllen da Costa Silva; Carlos Renato Francês (UFPA, Brazil)
1570333654: Optimizing Low Memory Killers for Mobile Devices Using Reinforcement Learning, Cong Li, Jia Bao, Haitao Wang (Intel Corporation, P.R. China)
1570341466: An Improved Policy for Network Selection Decision Based on Enhanced-TOPSIS and Utility function, Lahby Mohamed; Abdelbaki Attioui (ENS de Casablanca, Morocco); Abderrahim Sekkaki (University Hassan II, Faculty of Sciences Ain Chock, Casablanca, Morocco)
1570341864: Secure access to Cloud using cooperating relays, Takwa Bouallegue (Ecole Nationale d'Ingénieurs de Tunis, Austria); Kaouthar Sethom (Ecole Nationale des Ingenieurs de Carthage, Tunisia)
1570341963: Power Envelope reduction in MIMO-OFDM with Block Diagonalization by using Fuzzy Inference Systems, Roberto Pérez Pérez; Víctor P. Gil Jiménez (University Carlos III of Madrid, Spain)
1570341074: Internet-of-Things (IoT) Feasibility Applications in Information Centric Networking System, Sghaier Guizani (Alfaisal University, Riyadh, Saudi Arabia)

END OF SESSIONS



The 14th International Wireless
Communications and Mobile Computing
Conference
June 25th - 29th, 2018
Frederick University
St Raphael Hotel, Limassol, Cyprus

CALL FOR PAPERS

“Global Connectivity”

The International Wireless Communications and Mobile Computing Conference (IWCMC 2018) will be held in Holiday Inn Hotel, Valencia, Spain; June 25—29, 2018. Under the theme of "Plethora Communications," IWCMC 2018 will target a wide spectrum of the state-of-the-art as well as emerging topics pertaining to wireless networks, wireless communications, and mobile computing. Continuing the great success of previous IWCM events, IWCMC 2017 is anticipated to attract a large number of high-quality submissions and stimulate the cutting-edge research discussions among many academic pioneering researchers/scientists and industrial engineers/leaders from all around the world.

The IWCMC 2018 program will feature a number of symposia, workshops, invited presentations, special sessions, and pioneering keynote speakers. More information can be found at the conference website: <http://iwcmc.org/2018>. Prospective authors are invited to submit original technical papers—up to 6 pages of length, using the EDAS link: <https://edas.info> to various IWCMC 2018 Symposia and Workshops as listed in the conference website for possible publication in the IWCMC 2018 Conference Proceedings, which will be submitted in the IEEE Digital Library-*Xplore*. Selected papers will be further considered for possible publication in five special issues in the following Journals:

- 1) Wiley Journal of *Wireless Communications and Mobile Computing (WCMC)*
- 2) The *International Journal of Sensor Networks (IJSNet)*
- 3) The *International Journal of Autonomous and Adaptive Communications Systems (IJAACS)*
- 4) *KSII Transactions on Internet and Information Systems*
- 5) *Peer-to-Peer Networking & Applications*

There will also be best paper awards, one best symposium award, and one best Workshop award.

Important Dates:

Paper Submission Deadline:	10 January 2018
Paper Acceptance Notification:	30 March 2018
Camera-ready Paper Submissions:	30 April 2018
Registration Deadline for Authors:	30 April 2018

For more information, visit the conference website: <http://iwcmc.org/2018>

Technically sponsored by:



All submitted papers will be peer reviewed. Accepted papers will be published in the IWCMC 2018 Proceedings, which will be submitted for inclusion to IEEE Xplore®.