

Detailed Conference Program

Tuesday 09:30 - 10:30 TuP1 Conference Room

Signal, Image and Video Processing

Chairs: Prof. S. EL Ahmar, Prof.A. Djebbari

ID 503 [Towards 6G: Standardization, Use-Cases, and Emerging Technologies - Application to ITS](#)

Prof. Iyad Dayoub

Tuesday 11:00 - 12:30 TuA1 Room1

Signal, Image and Video Processing

Chairs: Prof. N. Taleb, Prof. A. Seddiki

ID 22 [Refined Approach for Rain Cloud Motion Estimation using the Center of Mass Forecasting Technique](#)

mehdia hedir (umbb); Aimen Abdelhak Messaoui (Ecole Supérieure Ali Chabati); Fethi DEMIM (EMP)*; Ali Zakaria Messaoui (EMP); Hadjira Belaidi (IGEE/ UMBB); Rouigueb Abdenebi (EMP); Abdelkrim NEMRA2022 (Ecole Militaire Polytechnique, Algiers Algeria); Omar Mechali (t Ali Chabati High School)

ID 44 [Accelerating image processing functions on ZYNQ-FPGA using the Vitis Vision Library](#)

Kamal SEHAIRI (University of Laghouat)*; Thierry BOUWMANS (Univ. La Rochelle)

ID 45 [Traffic Sign Detection Using Multiple Cascaded Classifiers Based on LBP Characteristics](#)

asma abdelldaim (ESTA)*; Oualid Dr. Araar (EMP); Zouhir Irki (EMP)

ID 75 [Smart Food Sorting Using Deep Learning](#)

Mohammed el Amin Gasbaoui (Tahri Mohammed University, Bechar)*; soumia benkrama (bechar university); mostefa bendjima (bechar university)

ID 81 [Improvement analysis of Multi-Source Knowledge-based CFARD in Weibull scenario and hardware implementation](#)

hamza zeraoula (École Militaire Polytechnique Bordj El Bahri, Algiers, Algeria)*; Abdellatif Rouabah (École Supérieure Ali CHABATI)

ID 96 [A Hybrid Deep Neural Network Architecture RefineUnet for Ultrasound Thyroid Nodules Segmentation](#)

KAMAR BOUHDIBA (University of Sciences and Technology of Oran- Mohamed Boudiaf (USTOMB).)*; LILA MEDDEBER (University of Sciences and Technology of Oran- Mohamed Boudiaf (USTOMB).); MOHAMED MEDDEBER (University Hospital Center of Oran- Mohamed Boudiaf (CHUO)); TARIK ZOUAGUI (University of Sciences and Technology of Oran- Mohamed Boudiaf (USTOMB).)

Tuesday 11:00 - 12:30 TuA2 Room2

Renewable Energy

Chairs: Prof. Z. Benamara, Prof. M. Brahami, Prof. H. Mazari

ID 236 [Assessment of waste heat potential of a gas turbine and flare gas system for combined cooling and electricity production](#)

Sofiane ABERKANE (University of Bouira)*; hamza SEMMARI (Ecole Nationale Polytechnique of Constantine); Juan Carlos BRUNO (Universitat Rovira i Virgili of Tarragona); Alberto CORONAS (Universitat Rovira i Virgili of Tarragona)

ID 238 [Analysis of the behavior of a Standalone PV System based on Classical and Advanced MPPT Algorithms](#)

MERIEF FAROU (National Higher School of Technology and Engineering ENSTI ANNABA)*; Abdelhak Djellad (National Higher School of Technology and Engineering ENSTI -Annaba); Sofiane CHIHEB (National Higher School of Technology and Engineering ENSTI Annaba); HALA LALAYMIA (École Nationale Supérieure de Technologie et d'Ingénierie (ENSTI)); BOUDERRERES NACER (University of Mentouri Brothers Ahmed Hammani Campus, 25000, Constantine, Algeria)

ID 268 [Maximum Power Point Tracking Based on a Robust Backstepping Control For a Standalone Photovoltaic System](#)

Mahmoud Ameen THABIT (Ferhat Abbas University Setif 1)*; Lakhdar Madani (Ferhat Abbas University Setif 1); Kamel Salim Belkhir (Ferhat Abbas University Setif 1)

ID 270 [Development of a high-frequency power source dedicated to DBD reactors for ozone production.](#)

Meriem Belabed (ICEPS Laboratory, Djillali Liabes University of Sidi-Bel-Abbes); Seyf Eddine BECHEKIR (Intelligent Control and Electrical Power Systems Laboratory, Department of Electrical Engineering, Djillali Liabes University of Sidi Bel-Abbes)*; JBILLOU Mokhtaria (UDL SIDI BEL ABBES); nemmich said (université de sidi bel abbes); Mostefa Brahami (ICEPS)

ID 279 [Optimizing Microgrid Energy Management using Reinforcement Double Deep Q-Networks with Prioritized Experience Replay](#)

Abdelkader Messlem (University of Tiaret)*; Youcef Messlem (Laboratoire de Génie Electrique et de Plasmas (LGEP)); KOUADRIA Selman (LGEP); Ahmed Safa (University of Tiaret); Djafar Ould Abdeslam (MIPS)

ID 281 [Optimal Operation of Air Conditioning system in Solar Home for peak demand reduction](#)

Khaled Tifoura (Blida University 1)*; Hamza Meliani (University Blida 1); Achour MAHRANE (UDES/CDER); ghania mohandkaci (Unité de Développement des Equipements Solaires /UDES)

Tuesday 11:00 - 12:30 TuA3 Room3

Energy and Materials

Chairs: Prof. A. Annani, Prof. A.Lachebi

ID 16 [Characterization of two samples \(Fe Si GO and Fe Si NGO\) using the measurement device](#)

Abdelghani Dr CHAHMI (USTO)*

ID 42 [Investigating The Effect Of Flow Path Geometry On PEMFC Performance and Reactant Distribution Using CFD Modeling](#)

Fethia Amrouche (Renewable Energy Development Center)*; Oumaima Brakni (Usthb); Sabrina Chabab (USTHB)

- ID 52** [CMOS On-Chip Integrated Transformers Comparison](#)
mokhtaria derkaoui (ENSTTIC)*
- ID 58** [Comparative analysis of thermal conductive materials for optimizing the thermal management of a lithium-ion battery pack.](#)
Ishak Mohammed Mokhtar Benounane (University of science and technology of Oran Mohamed Boudiaf)*; Ahmed Wahid BELARBI (University of science and technology of Oran Mohamed Boudiaf); Moahmmmed El Bachir GHRIBI (University of science and technology of Oran Mohamed Boudiaf)
- ID 278** [FDTD calculation of the lightning electromagnetic field in presence of vertically stratified ground and Tall tower: Validation and analysis](#)
ahmed ziane (universite des sciences et technologies mohamed boudiaf usto oran oran)*; Kaddour Arzag (University Tahar Moulay of Saida); Zineddine AZZOUCZ (USTO-Oran, Algeria)
- ID 301** [Study on the electrochemical performance of ZnO nanostructures synthesized by spray pyrolysis for hydrogen production](#)
Mehdi kheireddine (université des frères Mentouri Constantine 1)*; narimene bouza (Université des frères Mentouri Constantine 1); Nadjah SOBTI (University of Batna 2); Zineb Deridj (University of Constantine 1); Lynda SACI (LEMEAMED Laboratory, Electronic department Frères Mentouri University)

Tuesday 11:00 - 12:30 TuA4 Room4

Power Electronics and Drives

Chairs: Prof. M. Khatir, Prof. S. Hadjeri

- ID 35** [Improvement of the Conversion Quality and Efficiency of a Two-stage Single-phase Photovoltaic Microinverter](#)
Mohammed El Bachir GHRIBI (usto-mb)*; Zine Eddine Touhami TERNIFI (University of science and technology of Oran Mohamed Boudiaf); Ghalem BACHIR (University of science and technology of Oran Mohamed Boudiaf); Michel AILLERIE (Laboratoire Matériaux Optiques, Photonique et Systèmes (LMOPS), Université de Lorraine, Centrale Supélec)
- ID 40** [Comparative Performance Analysis of a Four-Leg Two-Level SAPF versus a Four-Leg Three-Cell FCI-Based SAPF](#)
Ahmed Djerboub (University of TIARET)*; Amina Tamer (Higher School of Electrical and Energy Engineering of Oran, Algeria); Tayeb Allaoui (University of IBN KHALDOUN Tiaret); Khaled Djerboub (University of Tiaret)
- ID 128** [Study and Implementation of DTC-SVM Control of Five-Phase Induction Motor fed by five-phase voltage source inverter](#)
abdelaftah hoggui (Ecole Nationale Polytechnique)*; Benkouachi khoutir (Ecole Nationale Polytechnique,); Benachour Ali (a.benachour@g.essa-alger.edu.dz); MAhmoudi M.O (ENP, Algiers, Algeria)
- ID 205** [Short-Circuit Protection of IGBTs using Collector-Emitter Current Slope Monitoring](#)
SIFEDDINE AYAD (Université Constantine 1 - frères Mentouri)*; Lynda SACI (LEMEAMED Laboratory, Electronic department Frères Mentouri University); Abdelmalek Khezzer (Université des frères Mentouri Constantine 1)
- ID 216** [Experimental Validation of a Speed/Torque Sensorless Observer for Induction Motors Based on Extended Kalman Filter](#)
djellouli younes (conférence)*; ARDJOUN Sid Ahmed El Mehdi (conférence); Emrah Zerdali (Ege University); DENAI Mouloud (conférence); HOUCINE CHAFOUK (ESIGELEC)
- ID 335** [Investigating Deep Saturation Effects in Buck Converters Through Modeling](#)
Chaker Rabah (université des frères mentouri constantine1)*; Haddad samir (université des frères mentouri constantine1); Mohamed-Amine MOUSSA (Université Larbi Tébessi, Tébessa); Lynda SACI (LEMEAMED Laboratory, Electronic department Frères Mentouri University); Abdelmalek Khezzer (Université des frères Mentouri Constantine 1)

Tuesday 11:00 - 12:30 TuA5 Room5

Telecommunication systems

Chairs: Prof. M. Challal, Dr. C. Kandouci

- ID 50** [The Impact of The Opto-Geometric Parameter of A Salinity Sensor Based on Photonic Crsytal Fiber on Sensitivity](#)
Ilhem Mired (University of Ain Témouchent)*; Hicham Chikh-Bled (University of Tlemcen); DEBBAL Mohammed (University of Ain Témouchent)
- ID 248** [Stimulated Raman scattering in silica tapered nanofibers within nonlinear liquid environments](#)
Hamza GOUASMIA (Ecole Militaire Polytechnique); Abderrahim Azzoune (Ecole Militaire Polytechnique)*; Oussama LAOUEDJ (Ecole Militaire Polytechnique)
- ID 344** [Modeling, simulation, and optimization of photoconductive antennas according to the gap size](#)
hamza zeraoula (École Militaire Polytechnique Bordj El Bahri, Algiers, Algeria)*; Djalal Benyahia (Ecole Militaire Polytechnique)
- ID 371** [Optimizing Wavelength Division Multiplexing Free-Space Optical Systems: A Comparative Analysis of Predictive Modeling Techniques](#)
Kebaili Rima (University of Djillali Liabes Sidi Bel Abbes)*; DRIZ Samia (Djillali Liabes university of sidi bel abbes); FASSI BENATTOU (UDL SBA)
- ID 381** [5G MCM based NOMA in Vehicular Environments: A Comparative Analysis of F-OFDM and W-OFDM](#)
Nour El Houda BOUDA (University of Djillali Liabes)*; ELAHMAR SidAhmed (LTTNS Laboratory, Djillali Liabes University); Iyad Dayoub (UPHF)

Tuesday 11:00 - 12:30 TuA6 Room6

Automation and Control of Systems

Chairs: Prof. A. Khezar, Prof. A. Semmah

- ID 21** [Advancing Echo Processing Techniques by Combining Support Vector Machine and Weber's Law Integration](#)
mehdia hedir (umbb); Ali Zakaria Messaoui (Ecole Militaire Polytechnique); Fethi DEMIM (EMP)*; Aimen Abdelhak Messaoui (Ecole Supérieure Ali Chabati); Hadjira Belaidi (IGEE/ UMBB); Rouigueb Abdenebi (EMP); Abdelkrim NEMRA2022 (Ecole Militaire Polytechnique, Algiers Algeria); Omar Mechali (t Ali Chabati High School)
- ID 23** [Optimal Trajectory Planning and Robust Control for Enhanced Unmanned Ground Vehicle Performance](#)
Fethi DEMIM (EMP)*; Yasmine Saidi (Ecole Nationale Polytechnique); Rouigueb Abdenebi (EMP); Amar Benghezal (EMP); Aimen Abdelhak Messaoui (Ecole Supérieure Ali Chabati); Ali zakaria Messaoui (EMP); Hadjira Belaidi (IGEE/ UMBB); Abdelkrim NEMRA2022 (Ecole Militaire Polytechnique, Algiers Algeria)
- ID 25** [Efficient Obstacle Avoidance and Target Tracking in Mobile Robots using Advanced Technique](#)
Hadjira Belaidi (IGEE/ UMBB); ahmed allam (Ecole nationale polytechnique); Fethi DEMIM (EMP)*; Aimen Abdelhak Messaoui (Ecole Supérieure Ali Chabati); Elhaouari KOBZILI (National Polytechnic School); Ali Zakaria Messaoui (EMP); Rouigueb Abdenebi (EMP); Abdelkrim NEMRA2022 (Ecole Militaire Polytechnique, Algiers Algeria)
- ID 39** [Image-based ball tracking using a holonomic robot](#)
Younes Samsar (Mohamed Khider University of Biskra)*; Aicha Guergazi (Mohamed Khider University of Biskra); Abderrazak Debilou (Mohamed Khider University of Biskra)
- ID 76** [Design of Sliding Mode Observer -Controller for Stick-Slip Vibration Suppression in Drill String Systems](#)
Ahmed Hichem Zebboudj (University M'hamed Bougara of Boumerdes)*; Hamza Dr AKROUM (University M'hamed Bougara of Boumerdes Faculty of Engineering); Mohamed Zinelabidine Dr DOGHMANE (University of Boumerdes); Madjid Kidouche (Boumerdes university)
- ID 200** [HW/SW Co-design of the Secure Hash Function SHA-256](#)
Nadjia Anane (CDTA); Mohamed Issad (Centre de Développement des Technologies Avancées, CDTA)*; Nesrine Guenfoud (USTHB); Mohamed Debyeche (Université des Sciences et Technologies Houari Boumediene)

Tuesday 14:00 - 15:00 TuP2 Conference Room

Renewable Energy

Chairs: Prof. MK. Fellah, Prof. H. Abid

- ID 502** [Light Yesterday, Today, and Tomorrow - An Everyday Perspective](#)
Dr. Laurent Canale

Tuesday 15:30 - 17:00 TuB1 Room1

Signal, Image and Video Processing

Chairs: Prof. A. Chentir, Prof. MC. Elmezouar

- ID 116** [Harnessing a New 5-D Hyperchaotic System with Fibonacci Q-Matrix Encryption Scheme](#)
Yehia Lalili (20 August 1955 University of Skikda)*; Toufik Bouden (University of Jijel); Morad Grimes (University of Jijel); Müştak Erhan Yalçın (İTÜ); Abderazzak Lachouri (hh); Ersin Elbasi (American University of the Middle East)
- ID 204** [Modified MFP-Unet for Left Ventricle segmentation from 2D echocardiographic images](#)
Hafida BELFILALI (University of Tlemcen)*; Frédéric Bousefsaf (Université de Lorraine); Mahammed Messadi (University of Tlemcen)
- ID 210** [Prediction of Brain Tumor Volume based on Segmented Slices](#)
Mehdi BAALI (Souk Ahras University)*; Nadjla Bourbia (Mentouri Brothers University, Constantine 1); messaoudi kamel (Souk-Ahras University); El Bey Bourennane (Faculté des sciences Mirande France)
- ID 220** [FPGA-Based Reconfigurable Direct Digital Linear Chirp Synthesizer For Software Defined Radar](#)
BELAID Mr GHEZALI (Ecole Supérieure ALI CHABATI)*; AHCENE BELLABAS (Ecole Militaire Polytechnique); ALI ABBADI (Ecole Supérieure ALI CHABATI); SAID SADOUDI (Ecole Militaire Polytechnique)
- ID 232** [Facial Recognition based on Machine And Deep Learning](#)
Assia Ould hamou (University of Sciences and Technology Houari Boumediene)*; Fatma Zohra CHELALI (University of Science and Technology Houari Boumediene,USTHB)
- ID 239** [A Comparative Analysis of Road Extraction from Satellite Images using D-LinkNet34](#)
Mohamed El-Mehdi IMAM (University of Sciences and Technology of Oran 'Mohamed Boudiaf')*; lila MEDDEBER (University of Sciences and Technology of Oran 'Mohamed Boudiaf'); tarik ZOUAGUI (University of Sciences and Technology of Oran 'Mohamed Boudiaf')

Tuesday 15:30 - 17:00 TuB2 Room2

Renewable Energy

Chairs: Prof. A. Zebblah, Prof. A. Rami

- ID 41** [PID Control based on PSO for a Grid Connected Photovoltaic System Using a Three-Phase Voltage Source Inverter](#)
GHRISSI TAHRI (University Oran 1, Ahmed Ben Bella)*; Fatima TAHRI (Higher School of Electrical and Energetic Engineering Oran, ESGEEO); Ali Tahri (Université des Sciences et de la Technologie d'Oran Mohamed Boudiaf USTO-MB)
- ID 84** [A comparative study between \(PVT\) collectors based on thin film solar cells](#)
Haloui Hafsia (Unité de recherche appliquée en énergies renouvelables (URAER))*
- ID 89** [SOLAR DISTILLER PRODUCTION IN ARID CLIMATIC CONDITIONS](#)
Houcine Moungar (URERMS)*; Mohammed Benhammou (URER/MS); Youcef Sahli (Unité de recherche en énergies renouvelables en milieu

saharien UREMS, centre de développement des énergies renouvelables, CDER, 01000.Adrar, Algérie); AZZI Ahmed (Unit of Research on Materials and Renewable Energies, URMER Department of Physics, Faculty of Sciences, Abou Bekr Belkaid University)

- ID 133** [Improved Direct Power Control of PV-SAPF System using ADALINE and ANN-MPPT Algorithms](#)
Mustapha Meraouah (University of Tiaret)*; faiza kaddari (1Department of Electrical Engineering, Higher School of Electrical and Energetic Engineering of Oran (ESGEE), Algeria); HASSAINE Said (University of Tiaret); MIHOUB YUCEF (University of Tiaret)
- ID 134** [APSO-Enhanced Optimization of NFTSMC and HGO for a Photovoltaic Pumping System](#)
meryem bentata (University of Jijel - Algeria)*; Doudou Sofiane (University of Setif 1)

Tuesday 15:30 - 17:00 TuB3 Room3

Energy and Materials

Chairs: Prof. M. Tabet Derraz, Prof. B. Zebentout

- ID 189** [Synthesis, Characterization, and Theoretical Investigation of cadmium Sulfide Thin Films \(CdS\) for Biosensor Applications](#)
Ouari kheira (Université Djillali Liabes de SBA)*
- ID 194** [Prediction of the photovoltaic behavior of In_{0.3}Ga_{0.7}N PIN solar cell via intrinsic layer doping optimization](#)
Kheira AMEUR (Department of Electronics, University Djillali Liabes of Sidi Bel Abbès, 22000 Sidi Bel Abbès, Algeria)*; Halima MAZARI (Department of Electronics, University Djillali Liabes of Sidi Bel Abbès, 22000 Sidi Bel Abbès, Algeria); Nadia Benseddik (Université de Djillali Liabes de Sidi Bel Abbès, Faculté des Sciences Exactes, Département de Physique, Algérie); Ouari kheira (Université Djillali Liabes de SBA); Mohammed Chellali (Department of Electronics, University Djillali Liabes of Sidi Bel Abbès, 22000 Sidi Bel Abbès, Algeria); Zineb Benamara (Univerté Djilali Liabes)
- ID 256** [A 3D Integral Model Using Fictitious Surface Currents For The Magnetic Field Modeling In Ferromagnetic Materials](#)
Yazid STATRA (Ecole Militaire Polytechnique)*; Abdelillah AOUGBI (Ecole Militaire Polytechnique (EMP)); HOCINE MENANA (UNIVERSITE DE LORRAINE); Mohamed Elbaa (LESI Lab., Univ Khemis Miliana, Algeria)
- ID 264** [Development of Sn-ZnO Thin Films for Energy Storage Uses](#)
Boulmelh SALH (Algeria)*; Lynda SACI (LEMEAMED Laboratory, Electronic department Frères Mentouri University); Nadjah SOBTI (University of Batna 2); Bessem KAGHOUCHE (University Center of Mila)
- ID 300** [Green Synthesis of ZnO Nanostructures from Poppy-leaf extract obtained by Spray pyrolysis: Electrochemical Applications](#)
narimene bouza (Université des frères Mentouri Constantine 1)*; Mehdi kheireddine (université des frères Mentouri Constantine 1); Nadjah SOBTI (University of Batna 2); Azizi Assia (International Conference on Advanced Electrical Engineering); Zineb Deridj (University of Constantine 1); Lynda SACI (LEMEAMED Laboratory, Electronic department Frères Mentouri University)

Tuesday 15:30 - 17:00 TuB4 Room4

Electrical Machines

Chairs: Prof. S. Zidi, Prof. F. Benhamida

- ID 159** [Experimental Investigation to Bearing-fault Signatures in Defective Induction Machine](#)
Abderrahim Touil (lec-umc)*; Babaa Fatima (Université de Constantine 1); merabet nacer (university of constantine1); chibani abdelghani oualid (univ-constantine)
- ID 364** [Linear BLDC motor embeded control on ESP32](#)
Lotfi BAGHLI (Université de Lorraine)*; EHSAN JAMSHIDPOUR (Université de Lorraine); Noureddine TAKORABET (Université de Lorraine)
- ID 385** [Interconnection and Damping Assignment Approach for PM Synchronous Motors, Comparison with The Classical PI Control](#)
mohamed azzi (université de lorraine); Lotfi BAGHLI (Université de Lorraine)*; EHSAN JAMSHIDPOUR (Université de Lorraine); Noureddine TAKORABET (Université de Lorraine); Phatiphat Thounthong (King Mongkuts University of Technology North Bangkok)
- ID 390** [Combined-Fault Detection and Diagnosis in Induction Motor Using Motor Current Signature Analysis](#)
merabet nacer (university of constantine1)*; Babaa Fatima (Université de Constantine 1); Abderrahim Touil (lec-umc); chibani abdelghani oualid (univ-constantine)

Tuesday 15:30 - 17:00 TuB5 Room5

Antennas and Wave propagation

Chairs: Prof. M. Ameri, Prof. B. Fassi, Prof. B. Akkal

- ID 63** [Breast Cancer Detection Using Aperture Coupled Patch Antenna](#)
rachida boulerbah (Ziane Achour University of Djelfa 17000, Algeria ,)*; Abdelhalim Chaabane (Universit´e 8 Mai 1945 Guelma); Hussein Attia (KFUPM); Djelloul Aissaoui (Ziane Achour University of Djelfa)
- ID 125** [Modified Vivaldi Antenna for Through Wall Imaging Applications](#)
Zahir HAMOUDA (University Blida-1, Institute of Aeronautics and Spatial Studies, Aeronautical Science Laboratory, Algeria)*; Hennia Benamara (Université Djillali Liabes de Sidi Bel Abbès); Hichem Benkadi (Ecole Supérieure des Techniques de l'Aéronautique); Tuami Lasri (Univ. Lille, CNRS, Centrale Lille, ISEN, Univ. Valenciennes, UMR 8520 - IEMN, F-59000, Lille, France)
- ID 178** [10-Element Yagi Antenna For 38 GHz Frequency](#)
Metahri Hanane (University Tlemcen)*; Abri Mehadji (Tlemcen)
- ID 228** [Bandwidth Enhancement of a CPW-fed UWB Antenna for Breast Cancer Detection](#)
Mokhtar MOKHTARI (centre de développement des technologies avancées)*; Mouloud CHALLAL (Univ. Boumerdès); Ali MANSOUL (Centre de développement des technologies avancées (CDTA)); Rachid Oussaid (USTHB)

ID 302 [Unveiling the Potential of BaLa₂ZnO₅ : Er³⁺ LEDs for Overcoming NLOS Challenges in VLC Systems](#)
HALIMA CHAHED (Université Djillali Liabes)*; BENATTOU FASSI (Université Djillali Liabes); SAMIA DRIZ (Université Djillali Liabes)

Tuesday 15:30 - 17:00 TuB6 Room6

Power Electronics and Drives

Chairs: Prof. S. Bacha, Prof. M. Amrani, Prof. M. Chellali

- ID 99** [Improved Control of DC Motor using Parallel Multicellular Converter and Intelligent Control Strategies](#)
Dyhia KAIS (Université Mouloud Mammeri)*; Hakim DENOUN (Université Mouloud Mammeri de Tizi-Ouzou); Mohamed Lamine Hamida (Université Mouloud Mammeri); FEKIK Arezki (université de bouira); Zoulikha Tebri (université de tizi ousou); Mustapha Zaouia (Université Mouloud Mammeri)
- ID 107** [RTLAB-Based Performance Validation of PV-Powered Single-Phase Asynchronous Motor Pumps](#)
FEZAZI OMAR (ICEPS)*; Semmak Abdelkader (UDL university of sidi bel abbes); mohammed A djehaf (UDL university of sidi bel abbes); AYAD 2 AHMED NOUR EL ISLAM (UDL SIDI BEL ABBES); HASAN KOTEN (Istanbul Medeniyet University); Biswadip Basu Mallik (University of Engineering & Management,Kolkata)
- ID 124** [Control of PUC5 based-Grid Connected Inverter Using MPC and PI Regulator](#)
Soufian KHETTAB (Blida 1 University, Faculty of Technology, Electronics Department)*; Aissa kheldoun (University M'hamed Bouagara of Bumerdes); Rafik BRADAI (University Blida 1); Intissar hattabi (Blida 1 University, Faculty of Technology, Electronics Department)
- ID 179** [Robust Control Strategy for an Electric Water Pump Powered by the Photovoltaic Panel](#)
romaissa hamdi (abbas laghrour university of khenchela)*
- ID 192** [Circulating current suppressing in two parallel-connected inverters supplied a water pump drive using a non-linear control method](#)
zaidi elyazid (emp)*; Elyazid Zaidi (ensh)
- ID 340** [Three-Phase Switched Capacitor Boost Inverter for Photovoltaic Pumping Systems with Adapted Space Vector Modulation](#)
Rania OMAR AMRANI (National Polytechnic School of Algiers)*; Bouchra BELLILI (National Higher School of Advanced Technologies of Algiers); Selma CHELLAL (National Higher School of Advanced Technologies of Algiers); Ali BENACHOUR (National Higher School of Advanced Technologies of Algiers); Zineddine RADJI (National Higher School of Advanced Technologies of Algiers); El Madjid BERKOUK (National Polytechnic School of Algiers)

Wednesday 09:00 - 10:00 WeP3 Conference Room

Renewable Energy

Chairs: Prof. L. Baghli, Prof. F. Krim

- ID 501** [AI-based decision-making for expert prioritization and project assessment in Renewable Energy investments](#)
Prof. Hasan Dincer

Wednesday 10:30 - 12:00 WeC1 Room1

Signal, Image and Video Processing

Chairs: Prof. Z. Mahdjoub, Prof. S. Mansouri

- ID 241** [Orange Freshness Classification Using Fluorescence and Color Imaging with Deep Learning](#)
Mohamed El Amine Bouhadjer (Djillali Liabes University of Sidi Bel Abbes)*; Mazari Sarah (Djillali Liabes University of Sidi Bel Abbes); Miloud Chikr Elmezouar (Djillali Liabes university of Sidi Bel-Abbes)
- ID 242** [Real Time Face Recognition System using Raspberry Pi4](#)
Fatma Zohra CHELLALI (University of Science and Technology Houari Boumediene,USTHB)*; Alaa Eddine BOUKERCHE (University of Science and Technology Houari Boumediene,USTHB)
- ID 245** [Video Transcoding Dataset for MPEG-DASH MPD Generation: An Experimental Approach](#)
abdlatif benhassaini (Telecommunications and Digital Signal Processing Laboratory (LTTNS), Djillali Liabes University)*; sidahmed chouakri (Telecommunications and Digital Signal Processing Laboratory (LTTNS), Djillali Liabes University); fatiha meskine (Communication Networks, Architectures and Multimedia Laboratory (RCAM) Djillali Liabes University)
- ID 252** [Indoor localization for epileptic patients assistance](#)
ADEL ZIER (USTHB)*; LAMYA FERGANI (USTHB)
- ID 254** [Medical image segmentation based U-Net architecture implemented on Raspberry Pi4](#)
ABDELLAOUI Cherifa (University of Bumerdes, Faculty of Technology, Department Engineering of Electrical Systems, LIST Laboratory and Research Center in Industrial Technologies (CRTI))*; Belkacem Samia (University of Bumerdes); Redouane Draï (Centre de Recherche en Technologies Industrielles CRTI); MESSAOUDI Noureddine (DISE DEPARTMENT)
- ID 274** [Evaluation of the impact of attention mechanisms on UNet and Res-UNet models for building extraction accuracy](#)
Melouka Medjadi (University of sciences and technology Mohamed boudiaf Usto-MB)*; LILA MEDDEBER (Université des sciences et technologies Mohamed boudiaf Usto-MB); Tarik Zouagui (Université des sciences et technologies Mohamed boudiaf Usto-MB)

Wednesday 10:30 - 12:00 WeC2 Room2

Renewable Energy

Chairs: Prof. Z. Bensaad, Prof. A. Bouzidi

- ID 195** [Magneto-Hydrodynamic Coupling of a Sea Wave Energy Conversion System](#)
Bachir Ouartal (LATAGE Laboratory, Mouloud Mammeri University of Tizi-Ouzou)*; Meziane Hamel (M'Hamed Bougara University of

boumerdès); mustapha zaouia (LATAGE Laboratory, Mouloud Mammeri University of Tizi-Ouzou); riad riad (LATAGE Laboratory, Mouloud Mammeri University of Tizi-Ouzou); Hakim DENOUN (Université Mouloud Mammeri de Tizi-Ouzou)

- ID 196** [Optimizing Residential Energy Autonomy: Hydrogen Integration with Photovoltaic and Battery Systems](#)
Mouffok Arezki (Ibn Khaldoun University of Tiaret)*; BELABBAS BELKACEM (University of TIARET); Tayeb Allaoui (University of IBN KHALDOUN Tiaret); Yassine Bouroumeid (Djilali Liabes University of Sidi Bel Abbes); Abderrezak MANSOURI (Higher School of Electrical and Energy Engineering of Oran); samira HEROUAL (université tiaret)
- ID 201** [Robustness investigation of FOC of PMSG based Variable-Speed Wind Turbine connected on grid](#)
Mohammed AOUMRI (university Adrar)*; Abdelkader HARROUZ (university Adrar); Ibrahim Yaichi (Laboratoire de Développement Durable et d'Informatique (LDDI), University Ahmed Draia Adrar, Algeria); Seddik BAALA (university Adrar); WIRA PATRICE (Université de Haute Alsace)
- ID 211** [Decarbonization of gas turbine using concentrating solar tower in algeria :cas study](#)
Mohammed LAISSAOUI (CDER)*; Karoua Housseyn (CDER); sabrina lecheheb (CDER); amar bouhalla (cder); Abdelatif TAKILALTE (Centre de Développement des Energies Renouvelables); messaoud hazmoune (cder)
- ID 214** [Techno-Economic Feasibility Study of Developing Wind Turbines in Algeria](#)
Brahim Taoussi (National School of Commerce)*; Fatima Zohra Ben Seghiér (Larbi Tebessi University); Sidi Mohammed BOUDIA (Centre de Développement des Energies Renouvelables)
- ID 378** [An Integrated Multi-Objective Optimization Algorithm for Parameter Estimation and Maximum Power Point Tracking in Photovoltaic Systems](#)
Yasser HADDOU (ESGEE)*

Wednesday 10:30 - 12:00 WeC3 Room3

Energy and Materials

Chairs: Prof. SA. Choakri, Prof. F.Meskine

- ID 70** [Correlation between frequency and water trees detection](#)
Madjid Meziani (Université Mouloud Mammeri de Tizi-Ouzou)*; Abdelouhab MEKHALDI (ECOLE NATIONALE POLYTECHNIQUE); BELHITECHE EL HADI (Université de Msila); Madjid Teguar (Ecole Nationale Polytechnique)
- ID 155** [Comparative Study Between an Analytical Model and Simulation of a Magnetic Induction in an Eddy Current Separator](#)
Abderahmane BETTACHE (Djillali Liabes University Sidi Bel Abbes)*; Salah-Eddine Bendimerad (Djillali Liabes University of Sidi Bel Abbes); Wafa Krika (Djillali Liabes University Sidi Bel Abbes); Abdelgnani AYAD (UDL. SBA); AYAD 2 AHMED NOUR EL ISLAM (UDL SIDI BEL ABBES); kadda khellaf (Djillali Liabes University Sidi Bel Abbes)
- ID 295** [CONTAMINATED TRANSFORMER OIL ELECTRIFICATION BEHAVIOUR](#)
Beldjilali Abdeslem (USTHB / Faculty of physics)*; Slimane Bouazabia (USTHB / Faculty of Electrical Engineering)
- ID 318** [Emitter Thickness and Solar Cell Efficiency: The Role of Deep-Level Defects and Auger Recombination](#)
Nedjouda BENCHIHEB (Hydraulics National Higher School, Blida)*; Asma A Benchiheb (Université de Constantine); Yasmina Saidi (Université de Constantine); LIDJICI Hamza (University of Laghouat)
- ID 376** [Grey Wolf Optimization to boost the Efficiency of CdTe based thin film Solar Cell](#)
Ziyad Younsi (Higher National School of Renewable Energies, Environment & Sustainable Development, Batna); Hichem Bencherif (LAAAS laboratory, Dept. of Electronics Mostefa Benboulaïd University Batna)*; Faycal Meddour (Higher National School of Renewable Energies, Environment & Sustainable Development, Batna); P Sasikumar (Saveetha university); Selma Rabhi (University of Medea); Sara H. Shahatha (Middle Technical University, Technical Engineering College/Materials Technique Engineering Baghdad); Mohammad r. Mohammad (Department of Laser and Optoelectronic Engineering, Al-Ma'moon University College, Al-Washash Baghdad)

Wednesday 10:30 - 12:00 WeC4 Room4

Power Systems

Chairs: Prof. A. Massoum, Prof. A. Rais

- ID 74** [A new optimization approach to solve the Optimal Reactive Power Dispatch problem for real power loss minimization, voltage deviation minimization and voltage stability enhancement](#)
abdallah chanane (blida1 university)*; messaoud belazzoug (blida1 university)
- ID 110** [Multi Objective Optimal Design for Multi-State Power System Using the Non-Dominated Sorting Genetic Algorithm II](#)
Kamel BELKACEM (USTHB)*; BALI Nouredine (USTHB); Labdelaoui Hilal (USTHB)
- ID 129** [Detection of False Data Injection Attacks in Smart Power Grid Using Data Balancing-Based Machine Learning Algorithms](#)
Younes GASMI (University of Science and Technology of Houari Boumediene (USTHB))*; Nouredine BALI (University of Science and Technology of Houari Boumediene (USTHB)); atif karim (Faculty of Computer Science University USTHB); Soufiane BELAGOUNE (University of Science and Technology of Houari Boumediene (USTHB))
- ID 213** [Underground Electric Field Radiated by Lightning return stroke on Tall Structures: Analysis using EM models and the 3D-FDTD method](#)
Mohamed Abdelghani A TALBI (university of saida "Dr Moulay Taher")*; Kaddour Arzag (University Tahar Moulay of Saida); Zin-Eddine Azzouz (USTO-MB of Oran,)
- ID 373** [Analysis of PD for Composite Insulator with and without Pollution Using PSD Technique](#)
SIHEM ALIOUAT (USTHB)*; Azzeddine NACER (University USTHB); Hocine MOULAI (USTHB, University of Science and Technology); Sofiane CHIHEB (National Higher School of Technology and Engineering ENSTI Annaba)

Wednesday 10:30 - 12:00 WeC5 Room5

Telecommunication systems

Chairs: Prof. B. Soudini, Prof. S.Tizi

- ID 111** [Elliptic-Curve Digital-Signature System Based on Radix-2w Arithmetic](#)
NAIT ABDESSELAM FADILA (Centre de developpement des technologies avancées)*; Abdelkrim Kamel Oudjida (Center For Development of Advanced Technologies); Abdelhakim A. K. Khouas (University M'hamed Bougara of Boumerdes); Amina bourahla (University M'hamed Bougara of Boumerdes); Lynda Nebhi (University M'hamed Bougara of Boumerdes)
- ID 193** [Estimation of Frequency-Selective MIMO Channels using DDST and ZCZ Sequences](#)
Hanane Meriem Toaba (Djillali Liabes University of Sidi Bel Abbes)*; Mouad Addad (Djillali Liabes University of Sidi Bel Abbes); Ali Djebbari (Djillali Liabes University of Sidi Bel Abbes)
- ID 262** [Hybrid Beamforming Design based on Low Complexity Alternating Minimizing Solution for Millimeter Wave MIMO Systems](#)
Baghdad HADJI (USTHB)*; Abdeldjalil Aissa-El-Bey (France); FERGANI LAMYA (USTHB); DJEDDOU Mustapha (ENP)
- ID 272** [Comparative Study of Coupled MPTCP Congestion Control Algorithms](#)
Sadjida LEBID (Djillali Liabes university)*; ZOUAOUI Chakib Mustapha Anouar (University); DJEBBAR ahmed bouzidi (Laboratoire de Télécommunications et de Traitement Numérique du signal (LTTNS))
- ID 276** [Lidar Approach for Vehicular Applications in Smart Cities](#)
Chahinaz Kandouci (Telecommunications and digital signal processing laboratory , UDL Sidi Bel Abbes)*

Wednesday 10:30 - 12:00 WeC6 Room6

Automation and Control of Systems

Chairs: Prof. A. Bentaallah, Prof. B. Dehiba

- ID 215** [Enhanced Trajectory Planning with Robust Interval Type 2 Fuzzy Logic Controller for Unmanned Surface Vehicles](#)
Fethi DEMIM (EMP)*; Zakaria Hadjou (EMP); Yasmine Saidi (Ecole Nationale Polytechnique); Aimen Abdelhak Messaoui (Ecole Supérieure Ali Chabati); Rouigueb Abdenebi (EMP); Ali Zakaria Messaoui (EMP); Omar Mechali (t Ali Chabati High School); Abdelkrim NEMRA2022 (Ecole Militaire Polytechnique, Algiers Algeria)
- ID 243** [Experimental Study of Swing-Up PD and Sliding Mode Control for Rotary Inverted Pendulum](#)
Nidhal Cherrat (university of boumerdes)*; Hamid BOUBERTAKH (University of Jijel); Hichem Arioui (IBISC-Lab, EA2456, University of Evry Val d'Essonne); Ratiba Fellag (Centre de Développement des Technologies Avancées)
- ID 246** [Consensus Analysis with Time Delays in Variable Networks](#)
Amina Khalfaoui (University of Guelma 8 mai 1945)*; Sihem Kechida (University of Guelma 8 mai 1945)
- ID 255** [Assessing the Impact Of Time Intervals On PM2.5 Prediction using LSTM Neural Networks](#)
selma boukamh (university of constantine 2 Abdelhamid Mehri)*; Nadia Zeghib (University Constantine 2); Yacine Yaddaden (Université du Québec à Rimouski)
- ID 334** [Visual Servoing-Enhanced Optimal Control for Trajectory Tracking in 2-DOF Ball on Plate Systems](#)
mohammed A djehaf (UDL university of sidi bel abbes)*; Ahmed Hamet Sidi (UDL university of sidi bel abbes); Youcef Islam D DJILANI KOBIBI (Mascara university); FEZAZI OMAR (ICEPS); Youcef Djeriri (Djillali Liabes university)
- ID 345** [Waste Sorting Automation with Visual Sensor and RFID](#)
Sifeddine seray (University of M'hammed Bouguerra Boumerdes); ishak bey (University of M'hammed Bouguerra Boumerdes); Isma AKLI (CDTA)*

Thursday 09:00 - 10:00 ThP4 Conference Room

Automation and Control of Systems

Chairs: Prof. M. Khadraoui, Prof. A. Bendaoud

- ID 504** [Applications of machine learning and deep learning in photovoltaic systems: challenges, recommendations and future perspectives](#)
Prof. Adel Mellit

Thursday 10:30 - 12:00 ThD1 Room1

Signal, Image and Video Processing

Chairs: Prof. M. Kandouci, Prof. N. Bounoua

- ID 191** [FPGA-based hardware architecture for real-time time-frequency analysis: Applying STFT for the segmentation of non-stationary signals](#)
Hocine HAMIL (CRTI)*; Mohamed Salah Azzaz (Ecole Militaire Polytechnique); Samir SAKHI (Ecole Militaire Polytechnique); Kaibou Redouane (Emp); Ali HAMIL (University yahia fares Médéa); Mustapha Bessalah (EMP); Laifa Amazigh (Ecole Militaire Polytechnique); Hani Mohamed Seddik (Ecole Militaire Polytechnique); Ahmed Kechida (CRTI)
- ID 289** [Performances Analysis of DNN Accelerator in a HW/SW Co-Design FPGA Implementation for Image Classification](#)
Kaibou Redouane (Emp)*; Mohamed Salah Azzaz (Ecole Militaire Polytechnique); MADANI Bachir (EMP); amina kadir (emp); Hocine HAMIL (CRTI)
- ID 291** [Comparative Study of Different Local Descriptors for Maritime Ships Recognition using Bag of Visual Words Model](#)
Atmane Khellal (Ecole Militaire Polytechnique)*; BOUOUDEN Ikkal abdeslam (DSMO/CFA); Abdeldjalil Belhafsi (Ecole Militaire Polytechnique); bilfel Nebili (Ecole militaire polytechnique); Mehrez BOULAHMAR (Ecole militaire polytechnique); Rabah LOUALI (Ecole Militaire Polytechnique)

- ID 316** [Real-Time FPGA Implementation of a 90° phase shifter based on Hilbert Transform](#)
Hocine HAMIL (CRTI)*; Mohamed Salah Azzaz (Ecole Militaire Polytechnique); Samir SAKHI (Ecole Militaire Polytechnique); Kaibou Redouane (Emp); Ali HAMIL (University yahia fares Médéa); Laifa Amazigh Chourar (EMP); Hani Mohamed Seddik (EMP); Ahmed Kechida (CRTI)
- ID 336** [Continuous Glucose Monitoring in Diabetes Patients: An LSTM-Based Predictive Approach](#)
Meriem LEFKIR (University of science and technology houari boumediene)*; Lamya Fergani (University of science and technology houari boumediene); Mourad Oussalah (University of Oulu)
- ID 375** [Making Biometric Identification with EMG Easier: Using a Single Channel for Specific Purposes](#)
Mehdi Chames Eddinne Layes (école nationale polytechnique d'Alger); Safia Benahmed (CDTA)*; Omar Kermia (cdta)

Thursday 10:30 - 12:00 ThD2 Room2

Plasma and Electrostatics

Chairs: Prof. A. Mekhaldi, Prof. F. Miloua, MF. Boukhoulda

- ID 237** [Electrostatic Separation Process for Metal/Plastic Particles by Double-Sided Electric Curtain Conveyor](#)
LOUHADJ Soumia (University of Science and Technology of Oran); Hadj Ali Aicha (Mascara University); Amar TILMATINE (Univ. of Sidi-Bel-Abbes, Algeria)
- ID 253** [Factors Affecting the Adhesion Force in Electrostatic Separation of Metal/Plastic Mixtures Using an Electric Curtain Conveyor with Suction System](#)
Hadj Ali Aicha (Mascara University)*; KADOUS Nezha (APELEC Laboratory); LOUHADJ Soumia (University of Science and Technology of Oran); Amar TILMATINE (Univ. of Sidi-Bel-Abbes, Algeria)
- ID 298** [A new electrostatic separator device using a double side rotating actuator](#)
imane zennani (aine temouchent univ.)*
- ID 367** [Realization and optimization of a rotating cylinder separator](#)
Reriballah Hafidha (university Relizane)*; Wessim Aksa (UDL SBA); smail Latifa (Centre universitaire nour el bachir el bayadh); touhami seddik (sidi bel abbes); medles karim (poitier); Amar TILMATINE (Univ. of Sidi-Bel-Abbes, Algeria)
- ID 393** [Comparative Study of Electrostatic Separation Techniques Used in the Sorting of WEEE](#)
Lahcen Azzeddine (IRECOM Laboratory); Seddik Touhami (UDL-SBA); rezoug mohammed (Université sidi bel abbés)*; mohamed maammar (UDL-SBA); Wessim Aksa (UDL SBA); Amar TILMATINE (Univ. of Sidi-Bel-Abbes, Algeria)
- ID 394** [Development of a Linear Motor Separator for Recovering Copper Particles of Various Sizes](#)
MUSTAFA LOUAHEDJ (Université de Djillali Liabès de Sidi Bel Abbès Algérie); Wessim Aksa (UDL SBA); rezoug mohammed (Université sidi bel abbés)*; seddik touhami (UDL-SBA); Lahcen Azzeddine (IRECOM Laboratory); adel benabboun (University mascara)

Thursday 10:30 - 12:00 ThD3 Room3

Plasma and Electrostatics

Chairs: Prof. M. Abid, Prof. K. Nassour, Prof. K. Ameer

- ID 103** [EXPLORING THE IMPACT OF THERMAL AGING ON THE CONDUCTION PROCESSES IN THE VEGETABLE OIL IMPREGNATED KRAFT PAPER BASED INSULATION](#)
Beldjilali Abdeslem (USTHB / Faculty of physics)*
- ID 212** [Evaluation the electrical properties of XLPE cable insulation material aged under the combined effects of thermal stress and UV-radiation](#)
Sabrina AMRAOUI (Université Mouloud Mammeri de Tizi Ouzou)*; Abdallah HEDIR (Université Mouloud Mammeri de Tizi-Ouzou); Soraya NAIT LARBI (Université Mouloud Mammeri de Tizi-Ouzou); Mustapha MOUDOUD (Université Mouloud Mammeri de Tizi-Ouzou); Ali DURMUS (Department of Chemical Engineering, Engineering Faculty, Istanbul University-Cerrahpaşa, Istanbul, Turkey)
- ID 219** [Exploring the Impact of Multi -Wire Corona Electrodes on Polypropylene Granule Charging](#)
CHIBANE OUALID (University of annaba)*; SMILI KARIMA (ENSTI-Annaba); RAHMANI ALLAOUA (LGEBejaia); CHIBANE OUARDA (LGEBejaia); MESSIKH TAREK (ENSTI-Annaba); HEROUS LAZHAR (University of annaba); Lucian Dascalescu (Laboratory of Aerodynamic Studies University of Poitiers Poitiers)
- ID 250** [Improvement of germination and seedling growth of durum wheat seed using surface dielectric barrier discharge plasma](#)
Lyes BENTERROUCHE (Frères Mentouri University Constantine 1)*; Aya Malak BENMOUNAH (Frères Mentouri University Constantine 1); Salah Sahli (Les Frères Mentouri Constantine university); Houssein Eddine Bousba (Frères Mentouri University of Constantine); Wail Seifeddine NAMOUS (Frères Mentouri University Constantine 1); Boubakeur Essedik BELKERK (Frères Mentouri University Constantine 1); Mohamed Tahar BENABBAS (Center for Development of Advanced Technologies)
- ID 389** [Shielding Impact on Efficiency of Electric Wind Blower for Solar Panel Cleaning](#)
Amine CHELIH (Universite IBN KHALDOUN TIARET)*; Bouazza M Ridha (University); KADOUS Nezha (APELEC Laboratory); Yassine bellebna (APELEC Laboratory University of Sidi Bel-Abbes); Khelifa Yanallah (LGEP Laboratory Ibn Khaldoun University of Tiaret); Amar TILMATINE (Univ. of Sidi-Bel-Abbes, Algeria)
- ID 391** [Numerical Modeling of Surface Charge Dynamics of Corona Charged Polymers](#)
Meriem Bouaziz (Université de constantine 1); Zehira ZIARI (Université Frères Mentouri Constantine 1)*; Salah SAHLI (Université Frères Mentouri Constantine 1)

Thursday 10:30 - 12:00 ThD4 Room4

Power Electronics and Drives

Chairs: Prof. A. Joti, Prof. H. Chaker

- ID 287** [DC microgrid for renewable applications taking into account the load dynamics](#)
Amirhosein Mansouri (Shahid Beheshti University); Mohammad Afkar (Shahid Beheshti University); Roghayeh Gavagsaz-Ghoachani (Shahid Beheshti University); Mathepot Phattanasak (King Mongkut's University of Technology North Bangkok)*; serge pierfederici (LEMETA)
- ID 341** [Comparative Study for a Shunt Active Power Filter using Multilevels Inverter with DSOGI-PLL](#)
Mohamed El Amine Mokhtar Boumendjel (University Mentouri, Constantine, Algeria)*; benalla hocine (constantine university); SALAH EDDINE REZGUI (UFMC1)
- ID 354** [Wireless Power Transfer Optimization Using FEM-GA Method](#)
Fatima Bennia (University of Bumerdes)*
- ID 358** [Multi-Output Neural Network-Based Online Filter Parameters Estimation for Predictive Control of PWM Converter Under Unbalanced Grid Conditions](#)
Noumidia Amoura (L2CSP Laboratory, Mouloud Mammeri University of Tizi-Ouzou)*; Adel Rahoui (Ecole Nationale Supérieure des Travaux Publics Francis Jeanson); Boussad Boukais (Université Mouloud Mammeri de Tizi Ouzou); Koussaila Mesbah (université Mouloud MAMMERI Tizi-Ouzou); Abdelhakim Saim (Nantes Université, IREENA); Azeddine Houari (University of Nantes)
- ID 366** [Modeling and Control of a Parallel Active Filter Considering Components Losses](#)
Mustapha Asnoun (Université Mouloud Mammeri)*; Noumidia Amoura (L2CSP Laboratory, Mouloud Mammeri University of Tizi-Ouzou); Ahmed Icheroufene (Departement of electrical engening, Mouloud Mammeri University of Tizi-Ouzou)

Thursday 10:30 - 12:00 ThD5 Room5

Microwave Circuits and Systems

Chairs: Prof. K. Belloula, Prof. AB. Djebbar, Prof. A. Semmahi

- ID 94** [System-On-Chip Implementation Of Blind Spectrum Sensing Method Using Discrete Transforms And Hardware/Software Co-Design](#)
Abderrezzaq BOUHDJEUR (Ecole Militaire Polytechnique)*; TEGUIG DJAMAL (Ecole Militaire Polytechnique); Mohamed Salah Azzaz (Ecole Militaire Polytechnique)
- ID 115** [3 to 6 GHz CMOS LC VCO Design for PLL of Cognitive Radio Application](#)
Feth Eddine MEKKI (Ecole Supérieure Ali Chabati)*; Abdelhalim Slimane (CDTA); Djalal Benyahia (Ecole Militaire Polytechnique)
- ID 296** [Impact of Temperature on Skin Depth and Crossover Frequency in Conductive Materials Considering Reflection Loss](#)
Benhamou Sidi Mohamed (Ecole Supérieure en Sciences Appliquées de Tlemcen)*
- ID 323** [39 GHz Double Negative DR-SRR 5G mm-Wave Applications Enhancement](#)
MIHAD HOURIA BENDERRADJI (Kasdi Merbah Ouargla)*; Souad BERHAB (National Higher School of Telecommunications and Information and Communication Technologies(ENSTTIC))
- ID 343** [Theoretical comparative study of the band offset and band offset ratio of the GaNAsSb/GaAs and GaNAsSb/GaSb quantum well structures](#)
Abdelkader Aissat (University of Blida 1)*

Thursday 10:30 - 12:00 ThD6 Room6

Automation and Control of Systems

Chairs: Prof. A. Benaissa, Prof. A. Hamdaoui, Prof. A. Nacéri

- ID 98** [Development of an Optical System for Non-invasive Blood Glucose Measurement](#)
Mohammed Anes Bereksi Reguig (Tlemcen University)*; nassima Labdelli (Higher School of Applied Sciences, Tlemcen, Algeria)
- ID 153** [Model for Predicting electrical energy consumption in Smart Home with weather information](#)
Younsi Sarah (USTHB)*; rabea guedouani (usthb); Amirouche NAIT SEGHIR (USTHB)
- ID 353** [An Intelligent Sequential Approach for Traffic Single Agent Lights Signals Control](#)
Youcef Hassani (university sidi bel abbès); Bilal TOLBI (Djillali Liabes, Sidi Bel Abbes)*; Walid SASSI (Djillali Liabes, Sidi Bel Abbes); Hicham ZATLA (University of Sidi Bel-Abess)
- ID 362** [Analysis and OGY Control of Chaotic Dynamics in Cancer Systems](#)
Rania SLIMANI (Constantine 1 university)*; Nora MANSOURI (Univ. Constantine 1); Ameer IKHLEF (Université des frères Mentouri)
- ID 363** [Sliding Mode Control For Underactuated Nonlinear Mechanical Systems](#)
Feddaoui F Anis (UBMA)*; Mohammed Abdeldjalil DJEHAF (Djillali Liabes University of Sidi Bel-Abbes); Bilal Bouchelarm (UDL SBA); Youcef Islam D DJILANI KOBIBI (Mascara university); Youcef Djeriri (Djillali Liabes university)
- ID 384** [Deep Learning based Heat controller for domestic appliances](#)
YAHY ABDELKADRE (USTHB)*; Houcine H Zeroug (University of Sciences and Technology)

Thursday 14:00 - 15:30 ThE1 Room1

Signal, Image and Video Processing

Chairs: Prof. FS. Bachir B, Prof. A. Bendaoudi

- ID 88** [Fault Diagnosis: An Integrated Methodology Based on Neural Networks](#)
Mohamed Amine ATMANE (University of Djillali LIABES, Sidi-Bel-Abbès)*; Oussama BOUDEBOUDA (University of Djillali Liabès, Sidi Bel Abbès); Hicham ZATLA (University of Sidi Bel-Abess); NOUAR Fadila Souad (university Djillali Liabes); Bilal TOLBI (Djillali Liabes, Sidi Bel Abbes); Youcef Djeriri (Djillali Liabes university); Mohammed BOUHMAMA (UDL. SBA)
- ID 90** [A Theoretical and Experimental Investigation of Multi-layer Composite Materials' Shielding Effectiveness using a](#)

[DTEM Cell](#)

Youcef Amine MEDJAOURI (Ecole Militaire Polytechnique)*; Achour ALES (Electromagnetic Compatibility Laboratory , Ecole Militaire Polytechnique, BP 17 Bordj El-Bahri 16111 Algiers, Algeria); Karim Benzaoui (Laboratory Electromagnetic Compatibility, Ecole Militaire Polytechnique); redouane TAHMI (Ecole Nationale Polytechnique, ENP)

ID 127 [Theoretical Analysis of Shielding Effectiveness in Conducting Polymer Composites Using the Transmission Line Matrix Method: Applications in Near and Far Fields](#)

Karim Benzaoui (Laboratory Electromagnetic Compatibility, Ecole Militaire Polytechnique)*; Youcef Amine MEDJAOURI (Ecole Militaire Polytechnique); Achour ALES (Electromagnetic Compatibility Laboratory , Ecole Militaire Polytechnique, BP 17 Bordj El-Bahri 16111 Algiers, Algeria); redouane TAHMI (Ecole Nationale Polytechnique, ENP)

ID 207 [Current Sensor Fault Diagnosis in DFIG Wind Turbines: Kalman Filter-Based Dedicated Observer Scheme](#)

Mohammed ABBAS (Djillali Liabes University of Sidi Bel Abbes and IRSEEM/ESIGELEC University of Rouen Normandy)*; Sid Ahmed El Mehdi ARDJOUN (Djillali Liabes University of Sidi Bel Abbes); HOUCINE CHAFOUK (ESIGELEC)

Thursday 14:00 - 15:30 ThE2 Room2

Automation and Control of Systems

Chairs: Prof. M. Medles, Prof. A. Talbi

ID 226 [Induction Motor diagnosis at Standstill Conditions](#)

Mabrek Abdelhakim (univ UFAS)*

ID 263 [Predictive method for cleaning photovoltaic plants in desert areas using TinyML and IoT technique](#)

Adel MELLIT (Electronics department); Chourouk Moussaoui (University of Jijel)*; Marco Zennaro (The International Center of Theoretical Physics Trieste, Italy)

ID 293 [Enhancing Application placement in cloud-fog environment based on multicriteria decision making](#)

Bochra Arichi (université de Tlemcen)*; Amraoui Asma (université de Tlemcen)

ID 294 [A Novel Experimental Approach for Predictive High-Frequency Modeling of Differential-Mode Impedance in Three-Phase Induction Motors](#)

hakmi yassine (SBA UNIV)*; MILOUDI HOUCINE (SBA UNIV); Mohamed MILOUDI (Relizane University); Abdelber BENDAOU (SBA UNIV); Kheira MENDAZ (Ain Temouchent University); Mohammed Hamza BERMAKI(SBA UNIV)

ID 310 [Improving Load Profile through Optimal Load Scheduling using Genetic Algorithms](#)

Belhabri Rihab (ICEPS)*; ZIDI Sid Ahmed (ICEPS); HADJERI Samir (ICEPS); Boubekeur sba Halima (Université Djilali Liabes)

ID 377 [SMO based sensorless direct torque sliding mode control of IM for EV applications](#)

abdelkader ghezouani (University de vechar)*; Imèn Souhila Bousmaha (ICEPS)

Thursday 14:00 - 15:30 ThE3 Room3

Renewable Energy

Chairs: Prof. H. Miloudi, Prof. A. Ayad

ID 282 [Allocation Analysis Optimal of Energy Storage System in grid connected Microgrids](#)

HOURIA SADOUNI (université de sidi bel abbes)*; Abelkader rami (. Djillali Liabes University)

ID 283 [Enhancing MPPT Efficiency in Standalone Photovoltaic Systems: Integration of Finite Control Set Model Predictive Control with Optimized Artificial Neural Network](#)

BENABDALLAH Naima (University of Tiaret)*; BELABBAS BELKACEM (University of TIARET); Ahmed TAHRI (University of Tiaret)

ID 304 [Enhancing Photovoltaic System Performance Through Particle Swarm Optimization With Time-Varying Acceleration Coefficients \(TVAC-PSO\) for MPPT in Partial Shading Conditions](#)

Hadiby Soufiane (University of Science and Technology Houari Boumediene)*; BERIBER Dalila (USTHB); khelil zaouche (esi); Abdelaziz Talha (USTHB)

ID 306 [The degradation Evaluation of PV modules installed in Adrar desert environment by translating STC using the Bilinear interpolation technique](#)

azzedinne tayebi (Unité de Recherche en Energies Renouvelables en Milieu Saharien (URERMS) Centre de Développement des Energies Renouvelables (CDER) Adrar, Algeria)*; Mohammed Yaichi (URERMS Adrar); Lakhdar SAIHI (Unité de Recherche en Energies Renouvelables en Milieu Saharien (URERMS), Centre de Développement des Energies Renouvelables (CDER), Adrar, Algeria); Abdelkader Boutadara (Unité de Recherche en Energies Renouvelables en Milieu Saharien (URERMS), Centre de Développement des Energies Renouvelables (CDER), Adrar, Algeria); youcef bakou (URERMS Adrar); HADIDI ABDELKADER (Unité de Recherche en Energies Renouvelables en Milieu Saharien B.P. 478, Route de Reggane-Adrar AND Hydraulic Department, Abou Bekr Belkaid University of Tlemcen)

ID 314 [Optimizing Grid-Connected Microgrid Energy Management through Advanced Heuristic Algorithms](#)

Abdourahim Amadou Adamou (TLEMENEN University- PAUWES Pan African University Institute for Water and Energy Sciences Incl. Climate Change)*; mohammed A djehaf (UDL university of sidi bel abbes); Youcef Islam DJILANI KOBIBI (Mustapha Stambouli University of Mascara); Miloud Rezkallah (Research Center in Energy Intelligence and Innovation (CR2Ie), Sept-Iles, Quebec); Feddaoui F Anis (UBMA)

ID 349 [A new robust synergetic sliding mode approach based on the Lyapunov theorem for MPPT controller of wind turbine](#)

HORCH Mohamed (LAT, Université de Tlemcen)*; Lotfi BAGHLI (Université de Lorraine); Abdelmajid BOUMEDIENE (Université de Tlemcen); YAHIAOUI MAAMAR (université mascara)

Thursday 14:00 - 15:30 ThE4 Room4

Plasma and Electrostatics

Chairs: Prof. W. Aksa, Prof. Y. Bellebna

- ID 60** [Realization of a High-Voltage High-Frequency Power Supply for Ozone Generation. Application to Water Traitement.](#)
Nacéra HAMMADI (USTMB Oran)*; Amar TILMATINE (Univ. of Sidi-Bel-Abbes, Algeria); nemmich said (université de sidi bel abbes); nassour kamel (uniuersité de sidi bel abbes)
- ID 104** [Experimental analysis of breakdown voltage in air as a function of temperature and inter-electrode distance for a plane-plane electrode geometry under positive DC voltage.](#)
Abderrezak MANSOURI (Higher School of Electrical and Energy Engineering of Oran)*; khadra kessairi (ESGEE); mounia Hendel (ESGEE); Seyf Eddine BECHEKIR (Intelligent Control and Electrical Power Systems Laboratory, Department of Electrical Engineering, Djillali Liabes University of Sidi Bel-Abbes); Farid Miloua (Université); Amar TILMATINE (Univ. of Sidi-Bel-Abbes, Algeria)
- ID 168** [A novel multi-tube ozone generator based on dielectric barrier discharge for wastewater treatment](#)
GHAITAOUI Essama Ahmed (ICEPS Laboratory , Djillali Liabes University of Sidi Bel Abbès.)*; nassour kamel (uniuersité de sidi bel abbes); nemmich said (université de sidi bel abbes); Brahim el khalil Oulad naoui (Djillali Liabès University); ghaitaoui touhami (Laboratoire de Développement Durable et d'information (LDDI), faculté des Science et de la Technologie, Université Ahmed Draia, Adrar, Algeria); Yassine Bouroumeid (Djilali Liabes University of Sidi Bel Abbes); Amar TILMATINE (Univ. of Sidi-Bel-Abbes, Algeria)
- ID 169** [Comparative Experimental Study of Voltage Waveform Influences on ozone production efficiency](#)
Brahim el khalil Oulad naoui (Djillali Liabès University)*; nemmich said (université de sidi bel abbes); nassour kamel (uniuersité de sidi bel abbes); GHAITAOUI Essama Ahmed (ICEPS Laboratory , Djillali Liabes University of Sidi Bel Abbès.); Yassine Bouroumeid (Djilali Liabes University of Sidi Bel Abbes); Amar TILMATINE (Univ. of Sidi-Bel-Abbes, Algeria)
- ID 259** [Experimental study of a low-pressure glow-discharge characteristics in a thin film deposition plasma reactor](#)
Fethi Mohammed BEKKARA (University Mustapha Stambouli of Mascara)*; Omar DAHOU (University Mustapha Stambouli of Mascara); Toufik Ahmed HOUARI (University Mustapha Stambouli of Mascara); Youcef BENMIMOUN (U. Mascara); Imene BELARIBI (LAGUA Solaire Oran); Noureddine OUALHACI (LAGUA Solaire); Abdelkrim BOUHEDIBA (LAGUA Solaire)
- ID 351** [Surface disinfection in hospital environment and public transport using gaseous ozone in Algeria](#)
smaïl Latifa (Centre universitaire nour el bachir el bayadh)*; boukhoulda fodil (UDL SBA); Zenagui nour el houda (UDL SBA); nassour kamel (uniuersité de sidi bel abbes); nemmich said (université de sidi bel abbes); Riballah Hafidha (université djilali liabes sidi bel abbes); Amar TILMATINE (Univ. of Sidi-Bel-Abbes, Algeria)

Thursday 14:00 - 15:30 The5 Room5

Telecommunication systems

Chairs: Prof. Z. Chama, Prof. M. Djebbouri

- ID 117** [Localization of buried objects under pillar using Ultra-Wideband Confocal Imaging Radar](#)
Hanane Taourite (University of Tlemcen)*; Sidi Mohammed Chouiti (University of Tlemcen); Merad Lotfi (Ecole Supérieure en Sciences Appliquées de Tlemcen)
- ID 130** [HT-IDS:A hybrid Trust based intrusion detection system for Wireless Sensor Networks](#)
Ahmed Saidi (University of Ghardaia)*
- ID 177** [Performance Evaluation of STAR-RIS-Aided-V2V Visible Light Communications at Road Intersections](#)
Aicha Meghraoui (Aicha Meghraoui)*; Mohamed Larbi Tayebi (University of Djillali Liabes); Mokhtar BESSEGHIER (University of Mascara); Hossien Badr Eldeeb (Khalifa University); Sami Muhaidat (Khalifa University)
- ID 184** [MMSE channel estimation in MIMO-FBMC/OQAM systems](#)
Rebouch Dahmane (University of SIDI Bel Abbes); DJEBBAR ahmed bouzidi (Laboratoire de Télécommunications et de Traitement Numérique du signal (LTTNS))*; Mokhtar Besseghier (University of Mascara)
- ID 218** [Development of a means for controlling the uplink signal generator at the Algerian satellite ground station](#)
saïah BEKKAR DJELLOUL SAIAH (Satellite Development Center (Algerian Space Agency))*; boualem nasri (ASAL); Ali Kaddouri (Centre de développement des satellites); Wahiba BELGACEM (Satellite Development Center (Algerian Space Agency)); Djamel eddine BABA HAMED (Satellite Development Center (Algerian Space Agency)); Amine BAB (Satellite Development Center (Algerian Space Agency))