IECON 2020



IEEE Industrial Electronics Chapter



NANYANG

TECHNOLOGICAL UNIVERSITY

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CALL FOR PAPERS

IECON 2020 is the 46th Annual Conference of the IEEE Industrial Electronics Society (IES), focusing on contemporary industry topics ranging from electronics, controls, manufacturing, to communications and computational intelligence.

Singapore

IECON is the flagship annual conference of IES and returns to Singapore for the first time after 1988. It aims to create a forum for scientists and practising engineers throughout the world to present the latest research findings and ideas in the areas of Industrial Electronics, and possible contributions toward sustainable development and environment preservation.

Regular sessions within the scope of the following topics, but not limited to:

I. ENERGY

Power Systems and Smart Grids; Electrical Machines and Industrial Drives; Power Electronic Converters; Smart Building Technologies; Renewable Energy and Energy Storage Systems; Transportation Electrification and Automotive Technologies

II. CONTROL, INTELLIGENT SYSTEMS, ROBOTICS

Control Systems and Applications; Machine Learning & Signal and Image Processing; Mechatronics and Robotics; Sensors, Actuators and Micro-Nanotechnology; Resilience and Security for Industrial Applications; Smart Manufacturing Technologies; Unmanned Systems.

III.INFORMATION AND COMMUNICATION TECHNOLOGIES

Electronic Systems on Chip and Embedded Systems; Cyber Physical Systems and Internet of Things in Industry; Communications for Industrial and Factory Automation; Industrial Electronics and Education; Cloud Computing, Big Data, Industrial Informatics

Special sessions: Special sessions covers subjects or cross-subjects belonging to the topics of interest, or novel topics related with the ones identified within the topics of interest.

Submission of Papers

The working language of the conference is English. Prospective participants are requested to electronically submit full papers of their work to http://submit.ieee-ies.org/submit/iecon20/. Accepted, registered, and presented papers will be IEEE copyrighted and published in the conference proceedings. The proceedings is planned to be submitted for inclusion in IEEE Xplore® Digital Library and therefore indexed by El Compendex. In order for the accepted paper to be submitted for inclusion into the IEEE Xplore® Digital Library, all of the following requirements must be satisfied: 1. Appropriate publication materials: final paper and transfer of copyright to IEEE must be submitted. 2. At least one full registration has to be paid. 3. The paper must be presented at the conference.

Important Dates:

Deadline for author registration:

Deadline for submission of regular papers: April 26, 2020 May 26, 2020 June 9, 2020 Deadline for submission of special session papers: May 17, 2020 May 26, 2020 June 9, 2020 Notification of acceptance: July 4, 2020 Deadline for submission of camera ready manuscripts: August 1, 2020

Co-sponsored by

Smart Grid + Power Electronics Consortium Singapore Supported by

Held in

August 1, 2020





Regular Sessions

The technical topics for the regular sessions include, but are not limited to the topics under the following three major themes:

ENERGY

TPC Chairs: Josep Pou, Chandan Chakraborty, Shihua Li

Power Systems and Smart Grids

Fanghong Guo (China), Hao Ma (China), Peter Palensky (Netherlands), Pierluigi Siano (Italy), Stanimir Valtchev (Portugal), Yan Xu (Singapore)

Electrical Machines and Industrial Drives

Andrea Cavagnino (Italy), Giulio De Donato (Italy), David Gerada (UK), Christopher H. T. Lee (Singapore), Antonio Marques-Cardoso (Portugal), Xinan Zhang (Australia)

Power Electronic Converters

Haitham Abu-Rub (Qatar), Sertac Bayhan (Qatar), Jiawei Chen (China), Amer M. Y. M. Ghias (Singapore), K. Gopakumar (India), Georgios Konstantinou (Australia), Vitor Pires (Portugal), Enrique Romero-Cadaval (Spain), Yi Tang (Singapore), Jack Xin Zhang (Singapore)

Smart Building Technologies

Jan Haase (Germany), Jingjing Huang (China), Yahui Wang (China), Jack Xin Zhang (Singapore)

Renewable Energy and Energy Storage Systems

Federico Baronti (Italy), Leong Hai Koh (Singapore), Chengbin Ma (China), Narasimalu Srikanth (Singapore), Thomas Strasser (Austria), Sergio Vazquez (Spain)

Transportation Electrification and Automotive Technologies

Fei Gao (France), Ritesh Keshri (India), Gil Marques (Portugal), Akshay Rathore (Canada), Adolfo Senatore (Italy), Zhongbao Wei (China)

CONTROL, INTELLIGENT SYSTEMS, ROBOTICS

TPC Chairs: Guoqiang Hu, Milos Manic, Jinhu Lv

Control Systems and Applications

Huijin Fan (China), Jiangshuai Huang (China), Chenliang Wang (China), Wei Wang (China), Yan-Wu Wang (China), Jun Yang (China), Chuanlin Zhang (China)

Machine Learning & Signal and Image Processing

Kanghyun Jo (Korea), Kezhi Mao (Singapore), Peng Hui Tan (Singapore), Han Wang (Singapore)

Mechatronics and Robotics

Makoto Iwasaki (Japan), Péter Korondi (Huangry), Weichao Sun (China), Xinyu Wu (China), Xuebo Zhang (China)

Sensors, Actuators and Micro-Nanotechnology

Carmen Aracil (Spain), Qingsong Xu (Macao, China)

Resilience and Security for Industrial Applications

Bo Chen (China), Mikael Gidlund (Sweden), Yilin Mo (China), Nuno Pereira (Portugal)

Smart Manufacturing Technologies

Xiang Chen (Canada), Michael Yu Wang (HKSAR, China), Rong Su (Singapore), Ya Zhang (China)

Unmanned Systems

Wen-Hua Chen (UK), Dimos V. Dimarogonas (Sweden), Xiwang Dong (China), Fang Hao (China)

INFORMATION AND COMMUNICATION TECHNOLOGIES

TPC Chairs: Zhengguo Li, Juan J. Rodriguez-Andina

Electronic System on Chip and Embedded Systems

Ray Cheung (HKSAR, China), Marcian Cirstea (UK), Joao L. Monteiro (Portugal), Eric Monmasson (France)

Cyber-Physical Systems and Internet of Things

Jose Barbosa (Portugal), Seta Bogosyan (USA), Jose L. Martinez Lastra (Finland), Yang Shi (Canada), Lantao Xing (Singapore)

Communications for Industrial and Factory Automation

Antoni Grau (Spain), Birgit Vogel-Heuser (Germany), Yonghong Zeng (Singapore)

Industrial Electronics and Education

Claudia-Melania Chituc (Germany), Oscar Lucia (Spain)

Cloud Computing, Big Data, and Industrial Informatics

Zhenghua Chen (Singapore), Paulo Leitao (Portugal), Luis Ribeiro (Sweden), Kim Fung Tsang (HKSAR, China), Valeriy Vyatkin (Sweden), Yu-Dong Zhang (UK), Yimin Zhou (China)

Special Sessions

The conference will include Special Sessions on highly specialized topic areas reporting technical trends and breakthroughs within the scope of the conference. Special Sessions are organized at the initiative of one or more individuals, who must adhere to specific procedures published on the conference website.

Tutorials

Informative tutorials will be organized by well-known experts to introduce fundamentals and the state of the art in emerging industrial electronics fields.

Industry Forum

The Industry Forum focuses on industry directions and use of industrial electronics technologies in processes and products. It also motivates discussion with applications into emerging areas in select areas. For more information, please visit the conference website.

Student & Young Professionals Activities

The S&YP Activities offers opportunities for engineering students and recent graduates (young professionals) to present their R&D work in Industrial Electronics, and to help them develop networking connections IES S&YP can take a part in a competition for the IES-S&YP Paper Assistance during submission process. For more details, please visit IES electronics channels.

IES Women in Engineering Forum

The Second IES Women in Engineering Forum will host invited speeches, a break to mingle with the attendees and favor networking, and a panel discussion at the end. The aim of the Forum is to foster women's involvement in scientific and technical activities, but it is not intended for women only. Professionals and students, regardless of gender, are welcome to network in a relaxed atmosphere.



Contact:

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URL: http://www.iecon2020.org