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## Twenty-fifth IEI Convocation and Technicians'/Students' Convention held at Goa



**Goa State Centre** of the Institution organized the Twenty-fifth IEI Convocation and Technicians'/Students' Convention during October 28-29, 2017 at Goa. The theme of the Convention was 'Role of Engineers towards Skill India Mission'. Mr Navinchandra B Vasoya, President, IEI, presided over the function. Mr Vasoya, in his presidential address, emphasized the unique opportunity given to the working officials who cannot attend regular engineering courses but are enterprising enough to follow up their career objectives and appear in the examination being conducted by the Institution. He mentioned that the Institution has

kept the quality standard of its examinations comparable with the requirements of the profession on the changing global scenario. He enumerated that those who have passed Sections A & B Examinations of the Institution are holding senior positions in Government, Semi-Government, Public and Private Sector organizations and industries. Mr Vasoya expressed his happiness and pride that Mr Manohar Parrikar, Hon'ble Chief Minister of Goa was present as the Chief Guest to inaugurate the Convocation. The Chief Guest, Mr Manohar Parrikar, delivered the Convocation Address. In his address, Mr Parrikar, complimented IEI for encouraging professional engineers,

academicians and research workers and providing a vast array of technical and professional expertise. He also complimented the graduate engineers and encouraged them to become experts in their respective fields. He appealed to the engineering students to welcome the changes and keep themselves equipped with new technologies and industries. Continuing his speech, Mr Parrikar enlightened the students with his practical experience in



the field of Mechanical Engineering on how to solve a problem with solutions. He evoked the Student Members to come up to the expectations of the society. Dignitaries, namely, Mr Sisir Kumar Banerjee, President-elect, IEI; Mr S C Rudra and Mr Jagroop Singh, Vice Presidents, IEI; Prof (Dr) T S Kamal, Chairman, All India Technicians' Committee (AITC), IEI; Mr Kiran Chander Sethi, Chairman, All India Students' Committee (AISC),

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## Safety Convention at Delhi

### Industrial Safety with Focus on Manufacturing Excellence

**Delhi State Centre** of the Institution organized the Fourteenth Safety Convention on the theme 'Industrial Safety with Focus on Manufacturing Excellence' under the aegis of Safety and Quality Forum (SQF), IEI, during September 4-6, 2017 at New Delhi. Mr Devendra Gill, Chairman of the Centre, in his welcome address, spoke about the dilemma of safety offers, since whatever action is taken to prevent accident or unfortunate happening is not quantifiable but any incident happened gets recorded thus putting greater stress on them to focus on accident-free safe and happy society. Mr Navinchandra B Vasoya, President, IEI, presided



over the function. In his address, Mr Vasoya appreciated the efforts of the organizers for providing a platform to industries and academia to collaborate on safety issues for increasing productivity. He suggested that all fora of IEI may also organize their programmes in other regions by rotation for creating greater awareness on relevant issues. The Chief Guest, Hon'ble Mr Manish Sisodia, Deputy Chief Minister, Government of NCT of Delhi, in his address, stated that recently Delhi witnessed some unfortunate accidents of collapses of garbage mound and death of workers while working in sewage line which could have been avoided with proper safety awareness of hazard potential. He appreciated the role of Delhi Metro Rail Corporation (DMRC) for being a role model in safety implementation in the metro network and said that we all need development but all our actions should have safety embedded in it. The Guest-of-Honour, Mr K S Popli, CMD, IREDA, enumerated that safety and manufacturing excellence go hand in hand. He stated that Japan which was very poor after World War II, built up manufacturing excellence with safety and are now suppliers to the whole world. Mr Popli further mentioned that in the renewable energy sector, we have yet to scale up the manufacturing activities, but of late with greater government support, thrust have been provided to the manufacturing sector. The other Guest-of-Honour, Dr Mangu Singh, Managing Director, DMRC, stated that at any work place, maximum exposure to safety hazard

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## Development of Smart Cities for Better World

**Rajasthan State Centre** of the Institution in association with Swami Keshvanand Institute of Technology (SKIT), Management & Gramothan, Jaipur, organized a two-day All India Seminar on the topic 'Development of Smart Cities for Better World' under the aegis of Civil Engineering Division, IEI, during August 18-19, 2017 at Jaipur. Dr S K Calla, Council Member, IEI, in his welcome address, stated that Indian Society has practiced sustainable development for thousands of years, because sustainability was considered as the foundation and essence of development. He further mentioned that objective of 'Smart City' mission is to promote sustainable and inclusive cities that provide core infrastructure and give decent quality of life to its citizens. The Chief Guest, Mr Surja Ram Meel, Chairman, SKIT, stated that innovations find applications in every sphere of human activity including sustainable urban development & new medical treatments etc. He mentioned that innovation offers new capabilities to influence almost every major industry in the world and it has the potential to create new ways of thinking, planning and design for future development. Mr Meel lamented that burgeoning population in India is facing numerous problems including infrastructure, housing, transportation, potable water, energy, law and order, unemployment, education, health care, sanitation, etc. The Guest-of-



Honour, Dr S L Surana, Director (Academics), SKIT, in his address, apprised that government has planned to develop 100 smart cities on the outskirts of large cities as green field enclaves. He stated that smart cities are expected to employ information and communication technology to deliver better services, reduce carbon footprint, create sustainable environment etc. Mr P C Sanghi, Past Chairman of the Centre and Convener of the Programme highlighted the strategic components of 'Smart City' mission. Mr Jaipal Meel, Director SKIT, informed that the Seminar is a set-up to provide a uniform platform to bring the major stakeholders and experts of the urban development and government to discuss and deliberate on the various models of the smart city. Prof (Dr) R A Gupta, Honorary Secretary of the Centre, proposed the vote of thanks. A large number of papers embracing the theme of the Seminar was presented and discussed during technical sessions.

## New Trends and Innovations in Geotextile Reinforcement

**Kerala State Centre** of the Institution in association with the Department of Civil Engineering, Sarabhai Institute of Science and Technology (SIST), Thiruvananthapuram, organized a two-day All India Seminar on the theme 'New Trends and Innovations in Geotextile Reinforcement' under the aegis of Civil Engineering Division, IEI, during September 19-20, 2017 at Thiruvananthapuram. Mr Udaya Kumar K S, Honorary Secretary of the Centre, delivered the welcome address. Mr N Rajkumar, Chairman of the Centre, while presiding over session, stressed that budding engineers should come forward, have conversation with senior engineers and play a vital role for the upliftment of the society as a whole. While introducing the theme of the Seminar, Mr Sunil J, Head, Department of Civil Engineering, SIST, highlighted the importance of foundations in any structure, like, built drip, offshore structures, railways, highway pavement etc. The Chief Guest, Prof (Dr) K Balan, Vice Principal, Rajadhani Institute of Engineering and Technology, Thiruvananthapuram, in his keynote address, emphasized on the importance and use of geosynthetics, geotextiles and geomembranes for performing and stabilizing soft soils. While



speaking on the topic 'Reinforcement Potential of Coir Geotextiles', Prof Balan spoke about geogrids, the axial geogrid and bioaxial geogrid and various products used for the soil stabilization and design parameters of reinforced soil. He informed that Indian Railways has accepted coir and jute as erosion controlled material along slope. Dr Jayasree P K, Professor, Department of Civil Engineering, College of Engineering, Thiruvananthapuram, delivered lecture on the topic 'Soil News Print and Geo synthetics'. She spoke about construction of Beaver dams, components of reinforced earth, forms of reinforcement, geo-synthetics, geo-mattresses, geo-nets, geo-frames, geo-pipes, geo-drains, geo-cells and geotextiles. She also mentioned that geotiles and geobags are used in coastal protection and geotextiles are used as wrapping to geocell which stabilizes the soil. Dr Jayamohan J, Principal, LBS Institute of Technology for Women, Thiruvananthapuram, delivered lecture on the topic 'Modeling of Reinforced Soil' and explained the analog modeling, mathematical modeling, mechanical modeling and theoretical modeling. Dr V V Karunakaran, Principal SIST and Prof K Mamman, Vice Principal, SIST, also addressed the gathering. Inaugural function was concluded with the vote of thanks proposed by Mr K Sarat Kumar, Past Honorary Secretary of the Centre. A large number of papers embracing the theme of the Seminar were presented and discussed during technical sessions.

## Twenty-fifth IEI Convocation and Technicians'/Students' Convention held at Goa

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IEI; Mr G M N Parrikar, Chairman, Organizing Committee and Chairman of Goa State Centre; Mr Deepak A Karmalkar, Co-chairman, Organising Committee and Honorary Secretary of Goa State Centre; Mr Chandrashekhkar G Prabhudessai, Secretary, Organizing Committee and Maj Gen (Dr) S Bhattacharya, VSM (Retd),

Secretary and Director General, IEI, graced the occasion with their august presence. Earlier, Mr G M N Parrikar, Chairman of the Centre, welcomed the gathering. The programme ended with a vote of thanks proposed by Maj Gen (Dr) S Bhattacharya, VSM (Retd), Secretary and Director General, IEI. The programme was well attended with overwhelming response from the students, their parents and others.



## Thirty-first National Convention of Marine Engineers, Kolkata

# Inland Water Transport – Technical Challenges and Opportunities

**Durgapur Local Centre** of the Institution in association with the West Bengal State Centre, IEI and the Institute of Marine Engineers (India), Kolkata Branch organized the Thirty-first National Convention of Marine Engineers and National Seminar on the theme 'Inland Water Transport – Technical Challenges and Opportunities' during October 15-16, 2017 at Kolkata. The Chief Guest, Mr Sisir Kumar Banerjee, President-Elect, IEI, was given a ceremonial guard of



Marine Engineering Division Board, IEI, presided over the Inaugural Session. He mentioned that inland waterways plays a vital role in the national economy by means of increased employment potential and providing support structures for other economic sectors of the country. On this occasion, four Eminent Engineering Personalities, namely, Mr Arun Sankar Sengupta, Chairman, Shalimar Works Limited, Kolkata; Mr Dharendra Kumar Sanyal, Director-in-Charge (Retd.), Directorate of Marine Engineering Training, Calcutta; Mr Gautam Sen, Vice Chairman, The Institute of Marine Engineers (India), Kolkata Branch and Mr Biplab Kumar Biswas, Chief Surveyor (Retd), Directorate General of Shipping, Mumbai were felicitated for their valuable contributions in the field of Marine Engineering. The Rear Admiral T B Bose Memorial Lecture was delivered by Mr Amit Bhatnagar, Principal Surveyor and Associate Vice President, Area Manager, Kolkata, Indian Register of Shipping. Mr Bhatnagar pointed out the reasons for underdeveloped inland water transport in the country which included poor infrastructure, outdated rules, lack of underwriting support, non-availability of certified crew and lack of interest. He discussed various aspects of vessel

design, river information system, different modes of IWT including LNG propelled bulk carriers, Push Boats, Ro-Ro vessels etc. A CD containing the technical papers was released during the inaugural session. Mr P K Biswas, Chairman, Institute of Marine Engineers (India), Kolkata Branch, proposed the vote of thanks. During subsequent technical sessions, dignitaries, namely, Mr Amitava Banerjee, Director, School of Maritime Studies, Neotia University, Kolkata; Ms R Sushila, Executive Director, Corporate Planning, Vivada Inland Waterways Ltd; Mr Khandaker Rasel Hasan, Assistant Professor, Department of Port and Shipping Management, Bangabandhu Sheikh Mujibur Rahman Maritime University, Bangladesh; Mr Iswara Arun Kishore, Director, Indian Maritime University, Kolkata Campus; Mr Bikash Choudhury, Chief Hydraulic Engineer KOPT; Capt. Manoj Hirkane, Program Chair, Modular and Competency Enhancement Courses and Management Representative, Tolani Maritime Institute; Commodore Gautam Dutt, Ex. Chief Hydrographer KOPT; Mr Kalyan Chakraborty, Deputy Chief Hydraulic Engineer, Kolkata Port Trust; Mr Kalyan Mitra, Senior Faculty, Indian Maritime University, attended the Convention and spoke on different topics ranging from development of tourism to the logistical support that will be required from entrepreneurs in the near future, in the field of inland water transport. Mr S C Rudra, Vice President, IEI, graced the Valedictory Session as the Chief Guest. Mr S K Sarkar, Ex-Director, IMU Kolkata Branch and Convenor of the programme, placed the draft recommendation. Mr K L Mallik, Chairman, West Bengal State Centre, IEI, proposed the vote of thanks.

honour by the cadets of the Indian Maritime University, Kolkata campus. In his inaugural address, Mr Banerjee stated that Inland Water Transport is a cheap, fuel-efficient, environment-friendly alternative mode of transport with high employment generation potential and is suitable for transporting heavy and bulky materials. He further spoke about the important inland water stretches including Ganga-Bhagirathi-Hoogly and Brahmaputra stretches. The Guest-of-Honour, Rear Admiral A S M Abdul Baten, BSP, ndc, psc, Vice Chancellor, Bangabandhu Sheikh Mujibur Rahman Maritime University, Bangladesh, highlighted the importance of inland water transport of goods and people in the daily life of the citizens of Bangladesh which is a predominantly riverine country. He also spoke about the methods adopted in reducing accidents through proper monitoring of vessels and training of personnel in Bangladesh. The other Guest-of-Honour, Mr Sudhir Kumar Sinha, Principal Officer & Joint Director General of Shipping, Mercantile Marine Department, Kolkata, in his address, emphasized upon the prospects of inland water transport for the tourism sector. The Guest-of-Honour and Keynote Speaker, Mr S V K Reddy, Chief Engineer, Inland Waterways Authority of India, through his audio visual presentation on the ongoing 'Jal Marg Vikas Project' informed the audience about the changes visualized in the field of water transportation in the country within the next five years. He also informed that bulk coal is already being transported from Sandheads to NTPC Farakka through National Waterways-1 which covers the stretch from Haldia to Allahabad. Mr Atanu Kumar Mukherjee, Chairman,

## Industrial Safety with Focus on Manufacturing Excellence

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and risk is at lowest level and it is also a fact that these people are exposed to risks and are not aware of relevant safety aspect. He mentioned that it is the responsibility of the management to create awareness at grass root level. Dr Singh stressed that we need to be more vigilant as accidents happen mainly due to two main reasons i.e. ignorance and over-confidence. Lt Gen (Retd.) J S Ahluwalia, Chairman, Safety and Quality Forum (SQF), IEI, highlighted the alarming situation of lack of safety and poor accident records in India quoting that 50% of total road accidents worldwide occurs in India. He stressed the need to have umbrella legislation on safety for both organized and unorganized sectors as well as a part of education curriculum. Mr Pradeep Chaturvedi,

Chairman, Safety Convention and Council Member, IEI, mentioned that the high priority to safety issues given by the Institution and the presence of large number of Council members and experts

at the Convention proves the importance of safety. 'With advancement of technology and analytics, we are now equipped to get in-depth understanding of safety issues', added Mr Chaturvedi. On this occasion, a Book on 'Safety at Residence' authored by Mr K B Rajoria, Past Chairman of the Centre and SQF, IEI, was released. The programme concluded with the vote of thanks proposed by Mr Praveen Kumar Singh, Honorary Secretary of the Centre. A large number of papers on various topics, such as, Industrial Safety and Manufacturing Productivity, Manufacturing and Environmental Safety, Safety in Public Life, Safety in Energy Sector, Road and Transport Safety, Safety in Construction Sector, etc, were presented and discussed during Plenary Session and Technical Sessions.

## Safety Management and Energy Conservation in Process Industries

**Telangana State Centre** of the Institution in association with Chaitanya Bharathi Institute of Technology, Hyderabad, organized a two-day All India Seminar on the theme 'Safety Management and Energy Conservation in Process Industries' under the aegis of Chemical Engineering Division, IEI, during October 6-7, 2017 at Hyderabad. The Chief Guest, Mr K Swamy



Goud, Chairman, Legislative Council, Government of Telangana, in his speech, mentioned that the future of the nation depends on the role of engineers and they are considered to be nation builders. He stressed on solid waste management and appealed that all the industries should employ qualified engineers in their respective factories and take precautionary

steps for safeguarding the environment. He suggested that Pharma Industries should recruit qualified engineers and take care of all pollution control measures. Mr Goud suggested that the senior engineers from IEI should visit factories and advise the management to implement all safety measures. The Guest-of-Honour, Mr G Prabhakar, Past President, IEI, in his address, stated that the idea behind organizing the Seminar by clubbing the safety management with energy conservation is very much useful and interesting. He suggested the organizers to send the recommendations of the Seminar to Safety and Quality Forum of the Institution, New Delhi. Mr R Gopalakrishna, Vice Chairman, Energy Conservation Mission and Accredited Energy Auditor, Advisor Zenith Energy, in his Keynote Address, spoke about the prevention of accident and energy conservation in industries and role of Bureau of Energy Efficiency (BEE) for energy conservation. He further highlighted the importance of safety ISO 18001 for safety with practical examples. Earlier, Mr G Rameshwar Rao, Honorary Secretary of the Centre, welcomed the august gathering and Mr G K Anand, Convener, Organizing Committee, elaborated the theme of the Seminar. The function was concluded with the vote of thanks proposed by Dr G Shravan Kumar, Joint Honorary Secretary of the Centre. A large number of students from various engineering colleges, eminent engineers, industrialists and Corporate Members of IEI attended the Seminar and took active part in the deliberations. A large number of papers embracing the theme of the Seminar were presented and discussed during technical sessions.

## Food Process Engineering Technology

**Dharwad Local Centre** of the Institution in association with College of Community Sciences, University of Agricultural Sciences (UAS), Dharwad and Department of Food Process Engineering, UAS, Raichur, organized a two-day National Conference on the topic 'Food Process Engineering Technology' under the aegis of Agricultural Engineering Division, IEI, during October 6-7, 2017 at Dharwad. The Chief Guest, Dr D P Biradar, Vice Chancellor, University of Agricultural Sciences, Dharwad, in his address, emphasized that it is essential to adopt proper food processing techniques, so that, the post-harvest loss can be reduced. 'Our country being mainly Agrarian, it is required that we add value to the agriculture produces, so that, the farmers get an increase in their income and this value addition is to be done by employing modern engineering & technology approaches', he opined. He mentioned that food processing and the corresponding technology should be given due importance and called for making such new technologies available economically and easily to small and medium farmers. Dr Biradar further stated that of late, interest towards food processing technology is increasing which is a positive development. He informed that UAS is taking proactive steps of encouraging and supporting R&D activities in this sector. Mr S M V Narayana, Chairman of the Centre, presided over the function. He appreciated

conducting of this conference as it is coinciding with Golden Jubilee Year celebration of the Centre. A Souvenir of the Conference was brought out on this occasion which was released by the Chief Guest. Earlier, Dr M R Kappali, welcomed

the guests and dignitaries and Dr R C Hallikeri, Convener of the programme, briefed about the objectives of the Conference. Dr Ramesh L Chakrasali, Honorary Secretary of the Centre, proposed the vote of thanks. Dignitaries namely, Dr Alloli, Dr Gopali, Dr Devadattam, Dr Udayakumar Nidoni from Raichur and Dr R C Hallikeri along with Dr Chhaya Badiger, Dean UAS, Dharwad, graced the occasion as the resource persons. The Conference received overwhelming response from both faculty and students and a large number of papers on various subthemes were presented and discussed during technical sessions.





## Prospects of Industrial Consultancy, Research and Incubation in Academic Institutions

**Karnataka State Centre** of the Institution in association with Sri Venkateswara College of Engineering, Bengaluru, organized a two-day All India Seminar on the theme 'Prospects of Industrial Consultancy, Research and Incubation in Academic Institutions' under the aegis of Interdisciplinary Coordination Committee (ICC), IEI, during October 11-12, 2017 at Bengaluru. In his welcome address, Prof (Dr) S S Kubsad, Dean – R&D, Sri Venkateswara College of Engineering (SVCE) briefed



about the importance of the Seminar and informed the delegates about the necessity to inculcate awareness of consultancy, research and incubation in the minds of faculty and student community. The Chief Guest, Dr E S Dwarakadasa, Chairman, KDHML, Bengaluru, in his address, informed the

delegates that industry and institution interaction is gearing up for creating new avenues in Research and Development of innovative technologies and also help the students and faculty to get live industrial projects and develop research at the institution level. The Guest-of-Honour, Dr Suresha, Principal, SVCE, Bengaluru, spoke about Research Centre of SVCE with exclusive infrastructure and mentioned that faculty team has motivated the students and delegates to bridge the gap between industry and institutions and also help to develop the skill of each individual which in turn facilitates to procure placement. Dr E S Dwarakadasa while delivering Keynote Address, spoke about how to cultivate strong liaison with industry, how to build confidence in research scholars and how to find the solution of the industrial problems through experimentation. He also elaborated regarding the details of the reserved funds of various funding agencies, such as, VGST, DST, AICTE, etc and also explained the procedures followed by the scrutinizers of the research proposals. Dr N Chikkanna, Chairman of the Centre, presided over the Inaugural Session. In his address, Dr Chikkanna stressed on research activities and highlighted its various advantages. He further mentioned that consultancy and incubation will be developed by the institutions if the gap between industry and institutions is eliminated. The function concluded with the vote of thanks proposed by Prof Abhilash D C. Papers on various sub-themes were presented and discussed by the experts in the field during various technical sessions.

## Architectural Technologies for Building Engineers

**Kozhikode Local Centre** of the Institution in association with the Department of Architecture, NIT Calicut organized a two-day All India Seminar on the topic 'Architectural Technologies for Building Engineers' under the aegis of Architectural Engineering Division, IEI, during October 14-15, 2017 at Kozhikode. Prof (Dr) K P Mohandas, Chairman of the Centre, presided over the inaugural session. In his address, Dr Mohandas, stressed on the need for energy efficient building design. Dr Balagopal T S Prabhu, Convener of the programme, welcomed the dignitaries and delegates and briefed about the theme of the Seminar. Dr M S Mathew, Professor and Head, Civil Engineering Department, IIT Palakkad, inaugurated the Seminar and delivered keynote address on 'Principles of Restoration'. A Proceedings of the Seminar was brought out on this occasion which was released the Dr Mathew. Dr A K Kasthubha, Head, Department of Architecture, NIT Calicut, also attended the function. Dr P Gireesan, proposed the vote of thanks. A large number of papers on various sub-themes were presented and discussed during technical sessions. The first technical session on the subject 'Emerging Materials and Technologies' was chaired by Dr A Achyuthan, Former Dean, Academic Staff College, Calicut University. Papers presented in this session highlighted the need for using traditional

materials, like, mud and timber with inputs from modern building science and technology. The second technical session was on the topic 'Energy Systems and Green Building Concepts'. The papers presented emphasized on minimizing energy inputs in construction, operation and maintenance of building and on utilizing alternate energy sources for buildings for lowering environmental degradation. In the session 'Traditional Systems and Sustainable Architecture', papers presented discussed on 'Urban Farming and Cultural Heritage of Built Forms'. Mr K K Muhammed, Regional Director (Retd), Archeological Survey of India, Northern Circle, delivered keynote address on 'Archeological Conservation'. In the fourth technical session, speaking on the subject 'Design Methodology in Architecture', Prof Manoj Datta, Chartered Architect and Design Chair, DG College of Architecture, mentioned that the design methodology in architecture is unique since the design fulfills individual and social needs. A Plenary Session was also organized which was chaired by Prof (Dr) K P Mohandas, Chairman of the Centre.



## Use of Nanotechnology in Medical Applications

**Odisha State Centre** of the Institution in collaboration with NM Institute of Engineering & Technology, Bhubaneswar, organized a two-day All India Seminar on the theme 'Use of Nanotechnology in Medical Applications' under the aegis of Electronics and Telecommunication Engineering Division, IEI, during September 16-17, 2017 at Bhubaneswar. Prof (Dr) P K Parhi, Chairman of the Centre, presided over the function and welcomed the dignitaries and delegates. In his address, he emphasized on the applications of nano-pharmaceuticals to detect diseases at an early stage. The Chief Guest, Prof (Dr) Gangadhar Sahoo, Dean, IMS & SUM Hospital, Siksha 'O' Anusandhan University, Bhubaneswar, in his speech, highlighted the involvement of nano-particles to deliver drugs, heat and light to special types of cells. He mentioned that nanotechnology is the study of controlling and manipulating matter on an atomic and/or molecular scale.



He also spoke about various applications of medical nanotechnology in drugs, medicines, therapeutics, diagnosis of diseases, surgery, medical robotics etc. Prof Sahoo further stated that nanotechnology can deliver medicine or drugs into specific parts of human body, thereby making them more effective and less harmful to the other parts of the body. The Guest-of-Honour, Mr Ramesh Ch Parida, Chairman, NM Group of Institutions, Bhubaneswar, mentioned that 'Smart Drugs' developed through the help of nanotechnology have been shown to cause fewer side effects and more effective than traditional therapies. He mentioned that nanotechnology in medical science could be the basis for the regeneration or replacement of body parts that are currently lost due to infection, accident or disease. The Chief Speaker, Dr Sanjeeb Kumar Sahoo, Senior Scientist, Laboratory for Nanomedicine, Institute of Life Sciences, Bhubaneswar, stressed on the link of nano-medicine and engineering to translate advances in nanotechnology research into clinical practices. According to him, nanomedicine research includes the development of diagnostics for rapid monitoring, targeted cancer therapies, localized drug delivery, improved cell material interactions, scaffolds for tissue engineering and gene delivery systems. Prof Rashmi Ranjan Rath, Organizing Secretary, elaborated on the enormous potentials of nanotechnology to revolutionize the field of medicine through manifold applications. Mr Basanta Kumar Behera, Convener of the Seminar, spoke about the theme and sub- themes of the Seminar. A Souvenir of the Seminar was brought out on this occasion which was released by the Chief Guest. Prof (Dr) K K Rout, Honorary Secretary of the Centre, proposed the vote of thanks. Papers on various sub-themes were presented and discussed during technical sessions.

## Automation in Welding

**West Bengal State Centre** of the Institution in association with Research Design and Standards Organization (RDSO) and in technical collaboration with Indian Institute of Welding (IIW), Kolkata, organized a two-day All India Seminar on the theme 'Automation in Welding' under the aegis of Mechanical Engineering Division, IEI, during September 08-09, 2017 at Kolkata. Mr



Kashmir Lal Mallik, Chairman of the Centre, welcomed the august gathering and highlighted various activities of the Centre. Mr P C Sen, Former Chairman and Managing Director, Burn Standard Limited and Peerless General Finance & Investment Company Ltd., addressed the gathering as the Chief Guest. Mr J K Saha, Chief Mechanical Engineer, South Eastern Railway and Mr Ravinder Gupta, Chief Mechanical Engineer, Eastern Railway, graced the occasion as the Guests-of-Honour and addressed the gathering. Mr Yatish Kumar, Director (I&L), Research, Design and Standards Organization, Railway Board, Kolkata and Chairman, Mechanical Engineering Division, West Bengal State Centre, IEI, in his address, highlighted the prominence of automation in welding and stressed on automated welding and cutting technology by the renowned welding companies across the world. He further explained the significance of ISO 3834 and strengthening the basics. Mr Samir Kumar Gupta, Technical Director, Jupiter Alloys and Steel India Ltd, delivered Keynote Lecture on the topic 'ISO 3834 – Quality Requirements for Welding'. A large number of papers were presented and discussed during technical sessions. During two-day technical sessions, various aspects of welding were discussed by eminent speakers which included: conditions of railways and wagon manufacturers with respect to welding standards requirement, automation in welding and cutting for higher productivity, international qualification & certification on welding, training of trainers in quality framework and so on.

## Physical Computing using Arduino

**Kancheepuram Local Centre** of the Institution in collaboration with the Department of Electrical & Electronics Engineering, SRM University, Kancheepuram, Chennai, organized a two-day All India Workshop on the topic 'Physical Computing using Arduino' under the aegis of Electronics & Telecommunication Engineering Division, IEI, during October 5-6, 2017. During the inaugural session, Dr S S Dash, Professor, EEE Department, SRM University, welcomed the august gathering. Dr R Venkatesan, Chairman of the Centre, presided over the inaugural session and addressed the gathering. Dr B Umamaheswari, Professor, Faculty of Electrical Engineering, Anna University, Chennai, inaugurated the Workshop and highlighted the importance of Physical Computing and Arduino in today's evolving engineering sector. She cited various examples from simple to complex



real time applications for the better understanding of Physical Computing. She also explained how we could create kinetic models or an interactive installation or device that monitors sensor input. The Guest-of-Honour, Mr K Chandrasekaran, General Manager, The Hindu, Trichy Edition, enumerated on the creative possibilities of electronics and programming with the Arduino language, which is

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# IEI Celebrates World Standards Day

**Theme: Standards make cities smarter**

The World Standards Day was celebrated by the Institution on October 14, 2017. Brief accounts of celebration as received from various Centres are reported hereunder

## STATE CENTRES

### Bihar

Mr Ashok Kumar Sinha, Chairman of the Centre, welcomed the guests and dignitaries and elaborated the theme of the Day. The Keynote Speaker, Mr K C S Bisht, Scientist 'F' and Head, Bureau of Indian Standards (BIS) delivered lecture on the theme. Mr Bisht, in his speech, threw light on the role of BIS in making the cities smarter. Mr Arun Kumar Shrivastava, Council Member, IEI, also shared his views on this occasion. Mr Sandeep Prakash, Honorary Secretary of the Centre, proposed the vote of thanks.



### Delhi

Mr Devendra Gill, Chairman of the Centre, welcomed the gathering and introduced the theme of the day. Mr Pradeep Chaturvedi, Council Member, IEI, explained that standards in conformity assessment activities are inextricably linked to all facets of our business. 'Companies, successful in their sectors, recognize that standards and conformance are business tools that should be managed right alongside their quality, safety, intellectual property and environmental policies', he



added. The Chief Guest, Dr Girdhar J Gyani, DG, Association of Healthcare Providers (India), speaking on the topic 'Smart Hospitals', stated that tremendous shift has taken place in the concept of healthcare. Speaking on the latest concept of 'Smart Hospitals', Dr Gyani clarified that it is where technology and design converge to create seamless patient care environment, better outcomes and quality of care at lower cost. At the end of the function, Mr Praveen Kumar Singh, Honorary Secretary of the Centre, proposed the vote of thanks.

### Gujarat

The Keynote Speaker, Mr Darshit Shah, Corporate Member, IEI, introduced the theme and spoke about Bureau of Indian Standards. He also explained the importance of standards in design, manufacturing quality etc and mentioned that standards open the door to large choice of products and services. Mr Shah further stated that International Standards make things work safely and smoothly together at every level in cities. He felt that standards provide important guidance for all aspects of city life, including energy-efficient buildings, intelligent transportation, improved waste management, building



sustainable communities, etc. Mr Sanny Prajapati, Bio Medical Engineer, also addressed the gathering. Earlier, Mr K R Patel, Corporate Member, IEI, welcomed the gathering. He also proposed the vote of thanks.

### Manipur

Dignitaries, namely, Mr Kh Temba Singh and Mr N Joykumar Singh, Chairman and Honorary Secretary of the Centre, respectively; Mr N Shyamsunder Singh, Former Chairman, Joint Electricity Regulatory Commission (Manipur & Mizoram); Mr M Ibomcha Singh, Controller of Tech Education, Manipur; Dr R K Hemakumar Singh, Principal, MIT, Takyel and Mr R K Nando Singh, Principal, Govt. Polytechnic, Imphal, graced the occasion as Presidium Members. Mr Salam Mangi Singh, Former Deputy Secretary, Board of Secondary Education, Manipur and Dr Th Kiranbala Devi, Faculty of Civil Engineering, MIT, Takyel, delivered speeches on the theme of the day. All the resource persons paid tributes to the efforts of the scientists and experts worldwide who contributed in developing the voluntary technical agreements that published as International Standards.



### Tamilnadu

Dr G Ranganath, Chairman of the Centre, welcomed the august gathering and presided over the event. The Chief Guest, Dr E Bhaskaran, Deputy Director of Industries and Commerce, Department of Industries and Commerce, Government of Tamil Nadu, Chennai, while speaking on smart city mentioned that a smart city is an urban development vision to integrate information and communication technology (ICT) and Internet of Things (IoT) technology in a secure fashion to manage a city's assets. With regard to smart city mission, he explained that the objective is to promote cities that provide core infrastructure and give a decent quality of life to its citizens, a clean and sustainable environment and application of 'Smart' solutions. He also spoke about the core infrastructure elements of a Smart City. Mr R Ramdoss, Honorary Secretary of the Centre, proposed by the vote of thanks.



### Telangana

Dr S Satyanarayana, Chairman of the Centre, presided over the function. The Chief Guest, Mr G Yoganand, Chairman and Managing Director, Manjeera Constructions Ltd, Hyderabad, in his address, mentioned that Worldwide Standards should be adopted to compete with other countries with regard to building smart cities. He stressed that new policies and plans should be designed and more studies should be carried out in this respect. Mr Yoganand further suggested that Government should take initiatives to reach the desired objective since quality of construction material is more important. Earlier, Mr G Rameshwar Rao, Honorary Secretary of the Centre, welcomed the august gathering. Mr S P Anchuri, Joint Honorary Secretary of the Centre, proposed the vote of thanks.



### Uttar Pradesh

Prof (Dr) Bharat Raj Singh, Chairman of the Centre, welcomed the dignitaries and the participants and introduced the theme of the day. The Chief Guest and Keynote Speaker, Dr Irfan Ahmad Mir, Manager (Technical), Central

Institute of Plastic Engineering & Technology, Lucknow, spoke about the role of standards, aims of standardization, benefit of standards and their



role in making cities smarter. He defined a smart city as an urban development vision to Integrate Information and Communication Technology (ICT) and Internet of Things (IoT) technology in a

secure fashion to manage a city's assets. Dr Mir elaborated in details, how facilities like efficient transport system, providing clean drinking water, adequate green power, effective health services to masses, waste management etc, can be developed by using standardization. Convener of the programme, Mr V B Singh, Past Chairman & Council Member, IEI, stated that international standards can be implemented as per local condition for providing better facilities to the citizens. Mr R K Trivedi, Honorary Secretary of the Centre, proposed the vote of thanks.

### LOCAL CENTRES

#### Bareilly

Mr Prem Prakash Gupta, Chairman of the Centre, in his welcome address, mentioned that International Standards will support development of smooth and integrated Smart City. Mr S K Suri, Chairman, Institute of EHS Studies, Bareilly, mentioned that sufficient fresh water, universal access to cleaner energy, the ability to travel efficiently from one point to another, a sense of safety and security, are the kinds of promises that modern cities must fulfill if they are to stay competitive and provide a high quality of life to their citizens. 'Every city faces its own challenges and requires its own mix of solutions', he added. Mr S K Gupta, Honorary Secretary of the Centre, shared his views about the collaborative efforts of the thousands of experts who share their knowledge and expertise in international standardization activities. He also proposed the vote of thanks.



#### Durgapur

Mr R K Roy, Chairman of the Centre, in his welcome address, enumerated that International Standards make things work safely and smoothly together at every level in cities. Mr M N Bandyopadhyay, Honorary Secretary of the



Centre, elaborated the significance of observing the day. The Chief Guest, Mr T Roy, Advisor, NHIT, Durgapur & Past Chairman of the Centre, highlighted how International Standards allow things to work safely and smoothly together at

every level in cities – from travel to communication technologies, to waste management and cleaner energy. The Guest-of-Honour, Prof J Ghosh, Head, Department of ECE, The New Horizons Institute of Technology, Durgapur, stated that the main goal of standardization is to make life easier and safer, ensure transparency, build continuous improvement across industries, and sustain efficiency and effectiveness. Mr Srikantha Mondal, Assistant Engineer, Asansol-Durgapur Development Authority stated that every city faces its own challenges and requires its own mix of solutions. Mr M N Bandyopadhyay proposed the vote of thanks.

#### Gwalior

The Chief Speaker, Mr Prabhat Bhargawa, emphasized on thinking about how International Standards allow things to work safely and smoothly

together at every level in cities – from travel to communication technologies, to waste management and cleaner energy. Standards also open the door



to a larger choice of products and services. 'With Standards, we can make our cities smarter, step by step', he added. Prof (Dr) P K Singhal, Chairman of the Centre, stated that International Standards make things work safely and smoothly together at every level in

cities. He further mentioned that these standards support the information and communication technologies that enable data collection, exchange and analysis, and information security.

#### Indore

Dr Prashant Bansode, Chairman of the Centre, welcomed the august gathering. Theme Speaker, Mr Ashish Kanar, Scientist-B, Bureau of Indian Standards (BIS), Bhopal Branch, explained the need of standards for a better life and quality of living in the society. He traced back in the history of initiation and implementation of World Standards Day when some countries came forward to form the International Standards Organization [ISO]. He mentioned that Consumer Protection Act and BIS came into existence together. Mr H I Mehta presided over the function. Mr Dinesh Wadhwa, Honorary Secretary of the Centre, proposed the vote of thanks.



#### Kalaburagi

Mr M M Kadadi, Chairman of the Centre, presided over the function. Mr Kashappa Vanjarkhed welcomed the gathering and elaborated the significance of observing the World Standards Day. Dr Shashikant R Mise, Honorary Secretary of the Centre and Professor, PDA College of Engineering, Kalaburagi, was the Speaker of the Day. The programme was concluded with the vote of thanks proposed by Ms Kumari



Anjali. A large number of Corporate Members of IEI and other dignitaries graced the occasion with their august presence.

#### Kanpur

Prof (Dr) D P Mishra, Chairman of the Centre, delivered the welcome address. The Guest Speaker, Mr K C S Bisht, Scientist 'F' and Head, Bureau of Indian Standards, Patna, said that the level of urbanization throws challenges in terms of high demand on energy, transport, buildings including housing, roads, water supply & sanitation, healthcare and education including ecological footprint. He further explained that if these challenges are not handled properly, cities would face perpetual problems of insufficient water supply, poor sanitation and many more. 'Therefore, cities must get smarter to handle this large-scale urbanization and find new ways to manage complexities, increase efficiency and improve quality of life', he opined. Mr Vivek Asthana, Honorary Secretary of the Centre, proposed the vote of thanks.

#### Kanyakumari

Mr G Sivasubramanian, Chairman of the Centre, while presiding over the function spoke about various aspects of standards and felt that it should be followed to improve the quality. Special address on the theme 'Standards





Mr V Sivathanu Pillai, Honorary Secretary of the Centre, proposed the vote of thanks.

### Kollam

Ms Channu Lal, Assistant Professor, Electrical & Electronics Engineering, welcomed the august gathering. Mr K Sivadasan, Honorary Secretary of the Centre, inaugurated the function and presided over the session. He highlighted the importance of standardization with examples. Mr K Rajan, Retired Electrical Inspector, Govt. of Kerala, spoke on the topic 'Electrical Safety, Field Theory and Electrical Standards'. He highlighted the importance of standardization of electrical plants and machineries. Students and faculty members from Electrical Department participated in the Seminar.



### Kota

The Chief Guest, Mr A K Gupta, Former Managing Director, JVVNL, Jaipur in his address, mentioned that the theme of the day is very relevant and useful to the present day scenario and stated that if we are to make smart cities, we should follow the standards. Mr V S Bhatnagar, Jt Manager, DCM Shriram, Kota and Mr S C Agrawal, Past Chairman of the Centre, were the Guest Speaker and Guest-of-Honour, respectively, and delivered lectures. Mr C K S Parmar, Chairman of the Centre, Chaired the function. Earlier, Mr Jasamat Singh, Honorary Secretary of the Centre, welcomed the dignitaries and participants. He also proposed the vote of thanks.



### Ludhiana

Brig Mastinder Singh, Chairman of the Centre, in his welcome address, stated that in order to fulfill the dream of our Hon'ble Prime Minister about Smart Cities, standards must be set. The Chief Guest, Mr Lalit Sharma, Director, Punjab Pollution Control Board and Industrialist, in his address, exhorted the youth to come up with novel ideas to solve the problems being faced by the cities of modern day. Mr Gurpreet Singh Walia, Honorary Secretary of the Centre, highlighted various activities of the Centre. Dr Varinderjit Rai, Principal, Bhutta College of Engineering and Prof Harinder Kaur also spoke on the theme and explained why standards are required for cities. The programme concluded with the vote of thanks proposed by Dr Arvind Dhingra.



### Madurai

Mr K Vijaya Kumar, Chairman of the Centre, delivered the welcome address and presided over the function. Mr J Samuel, Honorary Secretary of the Centre, introduced the Chief Guest, Mr N Sivasubramanian, Senior Scientist

and Former Chief General Manager, ISRO, Thiruvananthapuram. The Chief Guest in his address recalled his 18 years of association with Dr A P J Abdul Kalam. He informed that a new Standard is going to be announced next year 2018. He mentioned that the Standard Weight 'Kilogram' which is being measured against the gravity is going to be changed as based on electromagnetic attraction and instead of kg, it will be called as Blanks Gram (BG). 'Thus the standards are always reviewed and changed. Similarly for Smart Cities, there are about 5 core and 22 supportive indicators. Different category of cities have different basic parameters' he added. Mr R Narayanasamy, Jt Honorary Secretary of the Centre, proposed the vote of thanks.



### Meerut

The Keynote Speaker, Mr A N Malhotra, Immediate Past Chairman, Indian Industries Association, Meerut, explained how standards can help making a city smarter. Highlighting the importance of standards, he stated that there is nothing in the world which is not following the standards and every product maintains some standards. He explained that the requirement for a smart city is availability of sufficient electricity, so that no work or service is hampered. 'Sufficient fresh water, efficient transport system, proper waste management and a sense of safety and security are other parameters for a smart city', he added. Mr Malhotra further enumerated that by using international standards, things can be done safely and smoothly together at every level in cities. Earlier, Mr Ajay Kumar Gupta, Immediate Past Chairman of the Centre, welcomed the guests and dignitaries. Mr Rajneesh Kumar, Honorary Secretary of the Centre, conducted the programme. Mr C P Gupta, Past Chairman of the Centre, proposed the vote of thanks.



### Mysore

Mr M Chinnaswamy, Chairman of the Centre, welcomed the august gathering. The Chief Guest, Mr H Raghavendra Prabhu, Regional Director, National Productivity Council, (Ministry of Commerce & Industries) Bangalore, while explaining the meaning of International Standards, stated that it is the document established by consensus, describe how to achieve an optimal outcome time after time by using an agreed and consistent approach. He further enumerated that smart city concept encompasses sustainable development, sufficient water, cleaner energy, travel efficiency, safety and security, better city governance to make a decent quality life. He highlighted some of the important components of smart cities, which included, public information, citizen engagement, artificial intelligent, internet of things, tele-medicine, tele-education, trade facilities centers, skill development centers, efficient waste management, etc. Vote of thanks was proposed by Mr B V Ravindranath, Honorary Secretary of the Centre.



### North Bengal

The Theme Speaker, Mr Goutam Bairagi, Head, Department of Civil Engineering, Jalpaiguri Govt. Engineering College, Jalpaiguri, enumerated that sufficient fresh water, universal access to cleaner energy, ability to travel

Contd. on page 15

# IEI Celebrates World Habitat Day

**Theme: Housing Policies: Affordable Homes**

The World Habitat Day was celebrated by the Institution on October 2, 2017. Brief accounts of celebration as received from various Centres are reported hereunder.

## STATE CENTRES

### Delhi

Mr Devendra Gill, Chairman of the Centre, in his welcome address, elaborated the significance of observing the day. He mentioned that the purpose of the day is to reflect on the state of our cities and towns and the basic human right to adequate shelter. The Chief Guest, Mr A K Jain, Former Commissioner (Planning), Delhi Development Authority, apprised that 96% of housing shortage pertains to Economically Weaker Section (EWS) and Lower Income Group (LIG). He informed that the Government has taken up initiatives for private housing for 20 million homes by 2022. Mr Pradeep Chaturvedi, Council Member, IEI, mentioned that to facilitate economic transformation, India needs to make room for increased urbanization while also imposing and ensuring the good quality of urban life. He stressed on orderly expansion of existing cities, conversion of larger but as yet rural agglomerations into towns and cities and building of green field cities. Mr Praveen Kumar Singh, Honorary Secretary of the Centre, proposed the vote of thanks.



## LOCAL CENTRES

### Ghaziabad

Welcoming the Chief Guest and others, Dr H S Sharma, Chairman of the Centre, spoke about the problems of housing, especially in case of middle class people and hoped that the deliberations will help in developing a strategy to provide houses with all basic amenities



at affordable cost. The Chief Guest Prof (Dr) R P Mohapatra, Dean (Admissions), SRM University, Modinagar, emphasized in detail the changing pattern of the theme of this day. Considering the requirement and technological developments, he advocated the necessary of using low cost construction technology to build homes and also frame policies for providing subsidies to those who cannot afford to own homes at market rates. Mr Manish Bhardwaj, Convener of the programme, stressed the need to form policies, so that, the lower or middle income household may also afford to have home which is a basic need. Dr S C Gupta, Honorary Secretary of the Centre, proposed the vote of thanks.

### Kanpur

Prof D P Mishra, Chairman of the Centre, welcomed the dignitaries and the participants. Mr Vivek Asthana, Honorary Secretary of the Centre, introduced the Guest Speaker, Prof Pradeep Kumar, Department of Civil Engineering, HBTU, Kanpur. In his speech, Prof Kumar mentioned that 35% houses of Housing Projects are constructed for Economically Weaker Sections (EWS). He discussed in detail about households of Economically Weaker Sections and Lower Income Group. Prof Kumar also spoke about affordable housing, factors influencing affordability, etc. The programme was concluded with the vote of thanks proposed by Mr Vivek Asthana.



### Upper Assam

Mr Diganta Kumar Dutta, Chairman I/C of the Centre, in his welcome address, highlighted the significance of observing the day and the importance of affordable homes. Mr Ramesh Chandra Das, Honorary Secretary of the Centre, explained the relevance of the theme. The Chief Guest, Mr P K Barua, Dean, R&D, Dibrugarh University, in his address, expressed his expectation from all the research scholars working on the subject matter for a better future of the coming generations. Dr M C Bora, Dean, DUEIT, Dibrugarh University and Mr B P Bakshi, Chairman Assam Productivity Council, Tinsukia, were the Guests-of-Honour. Dr M C Bora touched upon many key factors embracing the theme of the day, like state of slum dwellers, population explosion, marshy land destruction and encroachment of water bodies, like Deepor Beel threatening lives of various marine species. Dr Partha J Das, Environmental Scientist and Head of Water, Climate and Hazard Programs, AARANYAK, delivered Keynote Speech on 'Wetland Preservation for Habitation of All Living Beings'. He highlighted the importance of wetlands for safeguarding environment and ecosystem with special reference to Ramsar Convention, 1971. The vote of thanks was proposed by Mr Diganta Goswami, Senior Manager (E/M), AGBP, NEEPCO.



## Industry 4.0

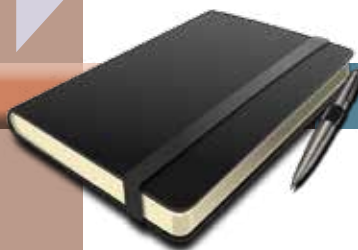
**Salem Local Centre** of the Institution in association with the Department of Information Technology, Sona College of Technology, Salem, organized a two-day National Conference on the topic 'Industry 4.0' under the aegis of Computer Engineering Division, IEI, during September 21-22, 2017 at Salem. Mr K Pandian, Chairman of the Centre, welcomed the dignitaries and participants. Dr J Akilandeswari, Professor and Head, IT Department, Sona College of Technology, Salem and Organizing Secretary of the event addressed the gathering on the theme of the Conference. Dr V Jayaprakash, Director – Industry Connect, Sona College of Technology, in his presidential address, mentioned that Industry 4.0 is a knowledge discovery and this could be the destiny of the future world. Dr V Karthikeyan, Principal, Thiagarajar Polytechnic College, Salem and Committee Member, Tamilnadu State Centre, IEI, delivered the Inaugural Address and wished this event a grand success. He also released the Book of Abstracts. Dr J Akilandeswari, Organizing Secretary, delivered Keynote Address on 'Future of Cloud Computing for Industry 4.0'. Mr Vasanthakumar, in his Keynote Address, further added the techniques and advantages of Cloud Computing on Industry 4.0. He mentioned that every computer engineer should extend



technological aid to the rural people. A Session on 'Hadoop Technologies' was handled by Mr P Kamalakannan, Hadoop Consultant, IBM Singapore PT Ltd, Singapore, through Skype. He spoke about the rapid increase in the usage of Big Data and the necessity of learning the Hadoop Technologies to interact with machines. The programme was concluded with the vote of thanks proposed by Mr S R Saravanan, Honorary Secretary of the Centre. A large number of papers on various aspects, such as, Industry 4.0 related approaches and their applications, Future of Industry 4.0, Application of Industry 4.0, Big Data and Industry 4.0, Smart factory and Industry 4.0, etc were presented and discussed in the technical sessions during the two-day National Conference.



# IEI DIARY



## Aerospace Engineering Division

### All India Seminar on "Smart Materials and their Applications to Aerospace, Mechanical and Civil Structures"

Salem, December 12-13, 2017

The Honorary Secretary, IEI, Salem Local Centre, 3rd Floor, SPC Bhawan, No.104/7, Manivannan Street, Opp to Salem New Bus Stand, Salem 636004, Tamilnadu [☎: (0427) 2332544; e-mail: salemmlc@ieindia.org]

### Thirty-second National Convention of Aerospace Engineers on "Advances in Aerospace Sciences and Technologies"

Ranchi, October 27-28, 2018

The Honorary Secretary, IEI, Jharkhand State Centre, Engineer Bhawan, Nepal Kothi Campus, Ranchi 834002 [☎: (0651) 2491344; web: ieijsc.org; e-mail: jharkhandsc@ieindia.org]

## Agricultural Engineering Division

### All India Seminar on "High-tech Cultivation of NUTRI & Cash Crops in Himalayan Region"

Dehradun, December 2-3, 2017

The Honorary Secretary, IEI, Uttarakhand State Centre, PO: Clement Town, Delhi - Saharanpur Road, Near ISBT, Dehradun 248002 [TeleFax: (0135) 2641190; e-mail: uttarakhandsc@ieindia.org]

### All India Seminar on "Need of Watershed Development in India"

Kota, December 09-10, 2017

The Honorary Secretary, IEI, Kota Local Centre, Engineers Bhawan, Near BSNL Office, Jhalawar Road, Kota 324005 [☎: (0744) 2428250; e-mail: kotalc@ieindia.org]

### All India Seminar on "Agro Big Data and Decision Support Systems in Agriculture"

Hosur, January 08-09, 2018

The Honorary Secretary, IEI, Hosur Local Centre, No.69, Kamaraj Nagar, Kumudapall, Near Adhiyamaan College of Engineering, Tamil Nadu, Hosur 635109 [e-mail: hosurhc@ieindia.org]

### Thirty-first National Convention of Agricultural Engineers on "Engineering Interventions in Doubling the Income of Small and Marginal Farmers by 2022"

New Delhi, February 2-3, 2018

The Honorary Secretary, IEI, Delhi State Centre, Engineers Bhawan, Bahadur Shah Zafar Marg, New Delhi 110002 [☎: (011) 23379052/23379948; Fax: (011) 23370489; e-mail: delhisc@ieindia.org]

## Architectural Engineering Division

### One Day Seminar on "Energy Efficiency Retrofitting of Existing Building"

Nashik, December 11, 2017

The Honorary Secretary, IEI, Nashik Local Centre, PWD Campus, Sir Visvesvaraya Marg,

Nashik 422002 [☎: (0253) 2317701; e-mail: nashiklc@ieindia.org]

### All India Workshop on "Advanced Computer Visualization Tools for Architectural Engineering"

Salem, January 19-20, 2018

The Honorary Secretary, IEI, Salem Local Centre, 3rd Floor, SPC Bhawan, No.104/7, Manivannan Street, Opp to Salem New Bus Stand, Salem 636004, Tamilnadu [☎: (0427) 2332544; e-mail: salemmlc@ieindia.org]

## Chemical Engineering Division

### National Conference on "Advances in Material Sciences: Bio-materials"

Salem, February 27-28, 2018

The Honorary Secretary, IEI, Salem Local Centre, 3rd Floor, SPC Bhawan, No.104/7, Manivannan Street, Opp to Salem New Bus Stand, Salem 636004, Tamilnadu [☎: (0427) 2332544; e-mail: salemmlc@ieindia.org]

### All India Seminar on "Bio-fuels, Bio-energy and Bio-economy"

Guwahati, March 16-17, 2018

The Honorary Secretary, IEI, Assam State Centre, Panbazar, Overbridge, East Lane, Guwahati 781001 [☎: (0361) 2548742; e-mail: assamsc@ieindia.org]

## Civil Engineering Division

### Workshop on "Disaster Mitigation Measures Adopting National Building Code"

Salem, December 07, 2017

The Honorary Secretary, IEI, Salem Local Centre, 3rd Floor, SPC Bhawan, No.104/7, Manivannan Street, Opp to Salem New Bus Stand, Salem 636004, Tamilnadu [☎: (0427) 2332544; e-mail: salemmlc@ieindia.org]

### One Day Seminar on "Modern Surveying Techniques"

Salem, December 16, 2017

The Honorary Secretary, IEI, Salem Local Centre, 3rd Floor, SPC Bhawan, No.104/7, Manivannan Street, Opp to Salem New Bus Stand, Salem 636004, Tamilnadu [☎: (0427) 2332544; e-mail: salemmlc@ieindia.org]

### All India Seminar on "Development of Indian Roads since Independence of Country"

Kota, December 23-24, 2017

The Honorary Secretary, IEI, Kota Local Centre, Engineers Bhawan, Near BSNL Office, Jhalawar Road, Kota 324005 [☎: (0744) 2428250; e-mail: kotalc@ieindia.org]

### One Day Seminar on "Cost Effective and Eco-friendly Construction Technology"

Salem, January 10, 2018

The Honorary Secretary, IEI, Salem Local Centre, 3rd Floor, SPC Bhawan, No.104/7, Manivannan Street, Opp to Salem New Bus Stand, Salem

636004, Tamilnadu [☎: (0427) 2332544; e-mail: salemmlc@ieindia.org]

### Workshop on "National Building Code"

Udaipur, January 18, 2018

The Honorary Secretary, IEI, Udaipur Local Centre, 128 Hiran Magri, Sector 11, Near Seva Charitable Hospital, Udaipur [☎: (0294) 2583702 [e-mail: udaipurhc@ieindia.org]

### All India Seminar on "Transit Oriental Development in Urban Areas"

Hyderabad, January 19-20, 2018

The Honorary Secretary, IEI, Telangana State Centre, Visvesvaraya Bhavan, Khairatabad, Hyderabad, Telangana 500004 [☎: (040) 23314969; e-mail: telanganasc@ieindia.org]

### Workshop on "National Building Code of India - 2016"

Salem, January 30-31, 2018

The Honorary Secretary, IEI, Salem Local Centre, 3rd Floor, SPC Bhawan, No.104/7, Manivannan Street, Opp to Salem New Bus Stand, Salem 636004, Tamilnadu [☎: (0427) 2332544; e-mail: salemmlc@ieindia.org]

### Workshop on "Disaster Roof Construction and Other Risk Management Systems"

Ghaziabad, July 15, 2018

The Honorary Secretary, IEI, Ghaziabad Local Centre, 15 Shopping Complex, ALTT Centre, Rajnagar, Ghaziabad 201002 [☎: 0120-2728699/2702673; e-mail: ghaziabadlc@ieindia.org]

### All India Seminar on "Concrete and Steel Structures - Care for their Health and Longevity"

Bokaro, August 25-26, 2018

The Honorary Secretary, IEI, Bokaro Steel City Local Centre, Abhiyanta Bhavan, Sector 5A, Bokaro Steel City 827006 [☎: (06542) 267227 / 288972; e-mail: bokarolc@ieindia.org]

### Thirty-fourth National Convention of Civil Engineers, on "Innovative Trends in Civil Engineering for Sustainable Development"

Pune, September 28-29, 2018

The Honorary Secretary, IEI, Pune Local Centre, Abhiyanta Bhavan, 1332, J M Road, Shivajinagar, Pune 411005, Maharashtra [☎: 020-25533376 / 25520239 / 25530150; e-mail: punelc@ieindia.org]

## Computer Engineering Division

### One Day Workshop on "Programming in Big Data Analysis"

Salem, January 03, 2018

The Honorary Secretary, IEI, Salem Local Centre, 3rd Floor, SPC Bhawan, No.104/7, Manivannan Street, Opp to Salem New Bus Stand, Salem 636004, Tamilnadu [☎: (0427) 2332544; e-mail: salemmlc@ieindia.org]

### All India Seminar on "Green Computing, Intelligent and Renewable Energy"

Kanchepuram, January 08-09, 2018

The Honorary Secretary, IEI, Kanchepuram Local





Centre, Agni College of Technology – ACT, Old Mahabalipuram Road, Thalambur, Chennai 600130 [e-mail: kanchepuramlc@ieindia.org]

**One Day Workshop on “Android Application Development”**

Solapur, January 16, 2018

The Honorary Secretary, IEI, Solapur Local Centre, Vastu Vaibhav, 3 North Kasaba, 4th Floor, Near, Laxmi Bank, Shivaji Chowk, Solapur 413001 [☎: 0217-2727707; e-mail: solapurlc@ieindia.org]

**One Day Workshop on “Ethical Hacking and Cyber Security”**

Solapur, January 19, 2018

The Honorary Secretary, IEI, Solapur Local Centre, Vastu Vaibhav, 3 North Kasaba, 4th Floor, Near, Laxmi Bank, Shivaji Chowk, Solapur 413001 [☎: 0217-2727707; e-mail: solapurlc@ieindia.org]

**Thirty-second National Convention of Computer Engineers on “Application of IoT in Rural Development”**

Ahmedabad, February 24-25, 2018

The Honorary Secretary, IEI Gujarat State Centre, Bhaikaka Bhavan, Law College Road, Ahmedabad 380006 [☎: (079) 26400811; Fax: (079) 26561825; e-mail: gujaratssc@ieindia.org]

**Thirty-third National Convention of Computer Engineers on “Computer Cognitions and Intelligent Systems”**

Ghaziabad, February 15-16, 2019

The Honorary Secretary, IEI, Ghaziabad Local Centre, 15 Shopping Complex, ALTT Centre, Rajnagar, Ghaziabad 201002 [☎: 0120-2728699/2702673; e-mail: ghaziabadlc@ieindia.org]

**All India Seminar on “Impact of Data Analysis on Business of Future through IoT & Social Media”**

Ahmedabad, April 07-08, 2018

The Honorary Secretary, IEI Gujarat State Centre, Bhaikaka Bhavan, Law College Road, Ahmedabad 380006 [☎: (079) 26400811; Fax: (079) 26561825; e-mail: gujaratssc@ieindia.org]

**Electrical Engineering Division**

**One Day Seminar on “Energy Conservation on Municipal Operations”**

Hyderabad, December 20, 2017

The Honorary Secretary, IEI, Telangana State Centre, Visvesvaraya Bhavan, Khairatabad, Hyderabad, Telangana 500004 [☎: (040) 23314969; e-mail: telanganasc@ieindia.org]

**One Day Seminar on “Integration and Challenges on Renewable Energy Systems”**

Chennai, December 27, 2017

The Honorary Secretary, IEI Kanchepuram Local Centre, Agni College of Technology – ACT, Old Mahabalipuram Road, Thalambur, Chennai 600130 [e-mail: kanchepuramlc@ieindia.org]

**All India Seminar on “Recent Trends in Renewable Energy”**

Chennai, January 03-04, 2018

The Honorary Secretary, IEI Kanchepuram Local

Centre, Agni College of Technology – ACT, Old Mahabalipuram Road, Thalambur, Chennai 600130 [e-mail: kanchepuramlc@ieindia.org]

**One Day Workshop on “An Overview of Substation Control System Engineering”**

Chennai, January 24, 2018

The Honorary Secretary, IEI Kanchepuram Local Centre, Agni College of Technology – ACT, Old Mahabalipuram Road, Thalambur, Chennai 600130 [e-mail: kanchepuramlc@ieindia.org]

**All India Workshop on “Hands on Training on Internet of Things and Its Applications”**

Madurai, February 07-08, 2018

The Honorary Secretary, IEI, Madurai Local Centre, T M Jambulingam Bhavan, 1 Vivekananda Nagar, 100 Feet Road, Surveyor Colony, K Pudur, Madurai 625 007 [☎: (0452) 256 1783; e-mail: madurailc@ieindia.org]

**All India Seminar on “Recent Trends in Renewable Energy Application and Research”**

Ahmedabad, February 16-17, 2018

The Honorary Secretary, IEI Gujarat State Centre, Bhaikaka Bhavan, Law College Road, Ahmedabad 380006 [☎: (079) 26400811; Fax: (079) 26561825; e-mail: gujaratssc@ieindia.org]

**All India Seminar on “Major Advances and Sustainable Developments in Renewable Energy Sources and their Applications”**

Jamshedpur, February 23-24, 2018

The Honorary Secretary, IEI, Jamshedpur Local Centre, Pipe Line Road, Sakchi (Between Red Cross Society and TCE Building), Jamshedpur 831001 [☎: (0657) 2234316; Fax: (0657) 2230159; e-mail: jamshedpurc@ieindia.org]

**“National Power Engineering Conference – 2018”**

Madurai, March 09-10, 2018

The Honorary Secretary, IEI, Madurai Local Centre, T M Jambulingam Bhavan, 1 Vivekananda Nagar, 100 Feet Road, Surveyor Colony, K Pudur, Madurai 625 007 [☎: (0452) 256 1783; e-mail: madurailc@ieindia.org]

**International Conference on “Recent Developments in Cleaner and Safer Nuclear Power Generation”**

Hyderabad, May 24-26, 2018

The Honorary Secretary, IEI, Telangana State Centre, Visvesvaraya Bhavan, Khairatabad, Hyderabad, Telangana 500004 [☎: (040) 23314969; e-mail: telanganasc@ieindia.org]

**Electronics & Telecom. Engineering Division**

**One Day Seminar on “Nanotechnology in Medical Applications”**

Salem, December 09, 2017

The Honorary Secretary, IEI, Salem Local Centre, 3rd Floor, SPC Bhawan, No.104/7, Manivannan Street, Opp to Salem New Bus Stand, Salem 636004, Tamilnadu [☎: (0427) 2332544; e-mail: salemc@ieindia.org]

**One Day Seminar on “5-G Technologies & Future Scenario”**

New Delhi, December 16, 2017

The Honorary Secretary, IEI, Delhi State Centre, Engineers Bhawan, Bahadur Shah Zafar Marg, New Delhi 110002 [☎: (011) 23379052/23379948; Fax: (011) 23370489; e-mail: delhisc@ieindia.org]

**Environmental Engineering Division**

**All India Seminar on “Water Conservation through 3R’s – Reduce, Recycle and Reuse”**

Bokaro, December 02-03, 2017

The Honorary Secretary, IEI, Bokaro Steel City Local Centre, Abhiyanta Bhavan, Sector 5A, Bokaro Steel City 827006 [☎: (06542) 267227 / 288972; e-mail: bokarolc@ieindia.org]

**All India Seminar on ‘Harnessing Smart Urban and Rural Water Supply Networks through Cyber Physical Systems’**

Mangalore, January 08-09, 2018

The Honorary Secretary, IEI, Mangalore Local Centre, 2nd floor, Opal Complex, Opp Bejai Church, Bejai, Mangalore 575 004 [☎: (0824) 2400112; email: mangalorelc@ieindia.org]

**One Day Workshop on “Project Management Cost & Time Overrun”**

Ranchi, January 14, 2018

The Honorary Secretary, IEI, Jharkhand State Centre, Engineer Bhawan, Nepal Kothi Campus, Ranchi 834002 [☎: (0651) 2491344; web: ieijsc.org; e-mail: jharkhandsc@ieindia.org]

**One Day Workshop on “Environmental Management and Sustainable Development”**

Thanjavur, January 24, 2018

The Honorary Secretary, IEI, Thanjavur Local Centre, Periyar Maniammal University, Periyar Nagar, Vallam, Thanjavur 613403 [e-mail: thanjavurc@ieindia.org]

**All India Seminar on “Integrating Climate Change Adaptation into Environmental Impact Assessment”**

Kanchepuram, January 29-30, 2018

The Honorary Secretary, IEI, Kanchepuram Local Centre, Agni College of Technology – ACT, Old Mahabalipuram Road, Thalambur, Chennai 600130 [e-mail: kanchepuramlc@ieindia.org]

**All India Seminar on “Energy Efficiency in HVAC & R”**

Ranchi, February 10-11, 2018

The Honorary Secretary, IEI, Jharkhand State Centre, Engineer Bhawan, Nepal Kothi Campus, Ranchi 834002 [☎: (0651) 2491344; web: ieijsc.org; e-mail: jharkhandsc@ieindia.org]

**One Day Seminar on “Sewage Treatment and Disposal”**

Thanjavur, February 23, 2018

The Honorary Secretary, IEI, Thanjavur Local Centre, Periyar Maniammal University, Periyar Nagar, Vallam, Thanjavur 613403 [e-mail: thanjavurc@ieindia.org]

**All India Seminar on “Swachh Bharat Abhiyan – Creating and Enabling Environment”**

Kolkata, March 07-08, 2018





The Honorary Secretary, IEI, West Bengal State Centre, 8 Gokhale Road, Kolkata 700020 [☎: (033)22238914; Fax: (033) 22233140; e-mail: wbsc@ieindia.org]

#### Thirty-fourth National Convention of Environmental Engineers on “Environmental Pollution and Climate Change”

New Delhi, August 10-11, 2018

The Honorary Secretary, IEI, Delhi State Centre, Engineers Bhawan, Bahadur Shah Zafar Marg, New Delhi 110002 [☎: (011) 23379052/23379948; Fax: (011) 23370489; e-mail: delhisc@ieindia.org]

#### Marine Engineering Division

#### Thirty-second National Convention of Marine Engineers on “Emerging Trends and Developments in Marine Technology”

Chennai, August 18-19, 2018

The Honorary Secretary, IEI, Tamilnadu State Centre, 19 Swami Sivananda Salai, Chepauk, Chennai 600005 [☎: (044) 25360614/64998729; Fax: (044) 25369433; e-mail: tnscc@ieindia.org]

#### Mechanical Engineering Division

#### All India Seminar on “Sources of Planet Energy, Environmental & Disaster Science: Glacier Melting and its Challenges”

Lucknow, December 09-10, 2017

The Honorary Secretary, IEI, Uttar Pradesh State Centre, Engineers Bhawan, River Bank Colony, Lucknow 226018 [TeleFax: (0522) 2625322; e-mail: upsc@ieindia.org]

#### International Conference on “Future Material Handling Prospects – Opportunities and Challenges”

Ranchi, January 27-28, 2018

The Honorary Secretary, IEI, Jharkhand State Centre, Engineer Bhawan, Nepal Kothi Campus, Ranchi 834002 [☎: (0651) 2491344; web: ieijsc.org; e-mail: jharkhandsc@ieindia.org]

#### All India Seminar on “Recent Development in Mechanical Engineering – Computational Heat Transfer, Fluid Flow and Energy Systems”

Thiruvananthapuram, July 14-15, 2018

The Honorary Secretary, IEI, Kerala State Centre, Visvesvaraya Bhavan, Opposite Kanakaannu Palace, Thiruvananthapuram 695033 [☎: (0471) 2322991, 2322993; TeleFax: (0471) 2322992; e-mail: keralasc@ieindia.org]

#### Thirty-fourth National Convention of Mechanical Engineers on “Mechanical Engineering and Engineering Challenges for Manufacturing”

Delhi, September 01-02, 2018

The Honorary Secretary, IEI, Delhi State Centre, Engineers Bhawan, Bahadur Shah Zafar Marg, New Delhi 110002 [☎: (011) 23379052/23379948; Fax: (011) 23370489; e-mail: delhisc@ieindia.org]

#### Thirty-fifth National Convention of Mechanical Engineers, on “Exploring Trends and Developments in Automobile Engineering”

#### Hosur, September 13-14, 2019

The Honorary Secretary, IEI, Hosur Local Centre, No.69, Kamaraj Nagar, Kumudepall, Near Adhiyamaan College of Engineering, Tamil Nadu, Hosur 635109 [e-mail: hosurcl@ieindia.org]

#### Metallurgical & Materials Engg. Division

#### All India Seminar on “Mechanics, Design and Testing of Composites”

Madurai, January 04-05, 2018

The Honorary Secretary, IEI, Madurai Local Centre, T M Jambulingam Bhavan, 1 Vivekananda Nagar, 100 Feet Road, Surveyor Colony, K Pudur, Madurai 625 007 [☎: (0452) 256 1783; e-mail: madurailc@ieindia.org]

#### All India Workshop on “Additive Manufacturing: Materials and Process

Ranchi, January 12-13, 2018

The Honorary Secretary, IEI, Jharkhand State Centre, Engineer Bhawan, Nepal Kothi Campus, Ranchi 834002 [☎: (0651) 2491344; web: ieijsc.org; e-mail: jharkhandsc@ieindia.org]

#### Thirty-first National Convention of Metallurgical & Materials Engineers on “Role of Stakeholders in Development of Roadmap for Steel Vision”

Kolkata, January 19-20, 2018

The Honorary Secretary, IEI, West Bengal State Centre, 8 Gokhale Road, Kolkata 700020 [☎: (033)22238914; Fax: (033) 22233140; e-mail: wbsc@ieindia.org]

#### One Day Seminar on “Nano Composites Materials and Its Applications in Manufacturing”

Salem, February 01, 2018

The Honorary Secretary, IEI, Salem Local Centre, 3rd Floor, SPC Bhawan, No.104/7, Manivannan Street, Opp to Salem New Bus Stand, Salem 636004, Tamilnadu [☎: (0427) 2332544; e-mail: salemcl@ieindia.org]

#### International Conference of Metallurgical & Materials Engineering Division on “Synthesis, Characterization and Application of Nanomaterials [SCAN]”

Kolkata, November 01-03, 2018

The Honorary Secretary, IEI, West Bengal State Centre, 8 Gokhale Road, Kolkata 700020 [☎: (033)22238914; Fax: (033) 22233140; e-mail: wbsc@ieindia.org]

#### Mining Engineering Division

#### All India Seminar on “Advancement in Mine Closure and Rehabilitation Techniques”

Ranchi, December 16-17, 2017

The Honorary Secretary, IEI, Jharkhand State Centre, Engineer Bhawan, Nepal Kothi Campus, Ranchi 834002 [☎: (0651) 2491344; web: ieijsc.org; e-mail: jharkhandsc@ieindia.org]

#### Twenty-ninth National Convention of Mining Engineers on “Sustainable Open Cast Mining at Small Mines”

Salem, February 22-23, 2018

The Honorary Secretary, IEI, Salem Local Centre, 3rd Floor, SPC Bhawan, No.104/7, Manivannan

Street, Opp to Salem New Bus Stand, Salem 636004, Tamilnadu [☎: (0427) 2332544; e-mail: salemcl@ieindia.org]

#### Production Engineering Division

#### All India Seminar on “Unconventional Machining and Modern Production Techniques”

Bhubaneswar, January 13-14, 2018

The Honorary Secretary, IEI, Odisha State Centre, Sachivalaya Marg, Unit IV, Bhubaneswar 751001 [TeleFax: (0674) 2390630; e-mail: odishasc@ieindia.org]

#### All India Seminar on “Challenges and Advances of Rapid Prototyping in Production Engineering”

Tiruchengode, February 02-03, 2018

The Honorary Secretary, IEI, Salem Local Centre, 3rd Floor, SPC Bhawan, No.104/7, Manivannan Street, Opp to Salem New Bus Stand, Salem 636004, Tamilnadu [☎: (0427) 2332544; e-mail: salemcl@ieindia.org]

#### All India Workshop on “Six Sigma Fundamentals and Applications”

Kolkata, March 16-17, 2018

The Honorary Secretary, IEI, West Bengal State Centre, 8 Gokhale Road, Kolkata 700020 [☎: (033)22238914; Fax: (033) 22233140; e-mail: wbsc@ieindia.org]

#### Thirty-third National Convention of Production Engineers on “Advances in Manufacturing and Systems Engineering”

Bhubaneswar, May 19-20, 2018

The Honorary Secretary, IEI, Odisha State Centre, Sachivalaya Marg, Unit IV, Bhubaneswar 751001 [TeleFax: (0674) 2390630; e-mail: odishasc@ieindia.org]

#### Textile Engineering Division

#### Thirty-first National Convention of Textile Engineers on “Indian Textile Industries: Future Direction”

Hosur, February 17-18, 2018

The Honorary Secretary, IEI, Hosur Local Centre, No.69, Kamaraj Nagar, Kumudepall, Near Adhiyamaan College of Engineering, Tamilnadu, Hosur 635109 [e-mail: hosurcl@ieindia.org]

#### Interdisciplinary Coordination Committee

#### All India Seminar on “Engineering Projects: Contracts, Funding and Legal Aspects”

Jabalpur, December 09-10, 2017

The Honorary Secretary, IEI, Jabalpur Local Centre, Visvesvaraya Marg, Civil Lines, Jabalpur 482 001 [TeleFax: (0761) 267 8929; Fax: (0761) 404 5625; e-mail: jabalpurcl@ieindia.org]

#### All India Seminar on “Excellence in Manufacturing and the New Horizon”

Ranchi, January 12-13, 2018

The Honorary Secretary, IEI, Jharkhand State Centre, Engineer Bhawan, Nepal Kothi Campus, Ranchi 834002 [☎: (0651) 2491344; web: ieijsc.org; e-mail: jharkhandsc@ieindia.org]

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# NEWS-IN-BRIEF

The following is a brief account of Technical Activities organised by various Centres of the Institution

## STATE CENTRES

### Andaman & Nicobar

- ❖ Celebrated '50th Engineers Day' on September 15, 2017.

### Andhra Pradesh

- ❖ Er Yarlagadda Sreeramulu Fourteenth Endowment lecture on 'Affordable Housing is a Public Goods' delivered by Dr Jagan A Shah, Director, National Institute of Urban Affairs, New Delhi on November 10, 2017.

### Delhi

- ❖ Lecture on 'High Rise Building Fires with Specific Reference to Recent London Fire Tragedy' in association with Safety & Quality Forum, IEI delivered by Mr S C Sharma, Former Director, Delhi Fire Services, on November 18, 2017.
- ❖ Celebrated 'Foundation Day' of the Centre on November 4, 2017.

### Goa

- ❖ Seminar on 'Galvanized Rebars in RCC Structures – Life Cycle Advantages' on November 15, 2017.

### Manipur

- ❖ Workshop on 'Role of Agricultural Engineering in Agriculture and Food Processing' on November 27, 2017.

### Meghalaya

- ❖ Celebrated '50th Engineers Day' on September 15, 2017.

### Odisha

- ❖ Celebrated '50th Engineers Day' on September 15, 2017.

### West Bengal

- ❖ Seminar on 'Promotion of Rooftop Solar Power in India' on September 12, 2017.
- ❖ Seminar on 'Advancement of Chemical Engineering and Biotechnology in Securing Health Energy and Food' on November 10, 2017.

## LOCAL CENTRES

### Ahmednagar

- ❖ Lecture on 'Importance of Packaging' delivered by Mr Vishal Gandhi, Director, M/s Vishal Gandhi & Associates and Saras Industries, Ahmednagar on November 14, 2017.

### Bathinda

- ❖ Celebrated 50th Engineers' Day on September 15, 2017.

### Belapur

- ❖ Lecture on 'Fresh and Hardened Concrete Properties of Manufactured Sand' delivered by Mr Hitesh Barot, General Manager [Technical Services, Ambuja Cement Ltd on September 28, 2017.

### Berhampur

- ❖ Celebrated '22nd Foundation Day' of the Centre on November 3, 2017.

### Coimbatore

- ❖ Lecture on 'Society Level Rain Water Harvesting Relevant to Coimbatore District' delivered by Mr K Varatharajan, Former Scientific Officer, IGCAR, Kalpakkam on November 13, 2017.
- ❖ Lecture on 'An Introduction to Acupuncture' delivered by Mr Healer N Thiyagarajan, Acupuncture Trainer, Sri Narayana Dharma Paripalan, Coimbatore on November 27, 2017.

### Ghaziabad

- ❖ Lecture on 'Origami Applications in Engineering' delivered by Mr K K Dixit, Retired Deputy Commissioner and a renowned Origami Scholar and Teacher on November 5, 2017

### Gwalior

- ❖ Lecture on 'Computer Networking' delivered by Eminent Lecturer Mr K G Pant on November 6, 2017.

### Kancheepuram

- ❖ Seminar on 'Data Science and Big Data Analytics' on October 31, 2017.
- ❖ Faculty Development Programme on 'Art of Scientific Manuscript Writing and Publication Skills' on November 2, 2017.

### Kochi

- ❖ Symposium on 'Materials Characterization and Quality Control' during October 12-13, 2017.

### Kollam

- ❖ Organized 'Ideation Contest' on October 25, 2017.
- ❖ Seminar on 'Prospects of Cashew Industry in Kollam' on October 27, 2017.
- ❖ Organized 'Entrepreneurship Orientation Programme' on November 3, 2017.

### Kota

- ❖ Lecture on "Engineering in Kitchen Garden & Organic Farming" delivered by Dr M L Parihar, Senior Scientific Officer, NFC, Kota on November 4, 2017.
- ❖ Celebrated 'World Quality Day' on November 9, 2017.
- ❖ Lecture on 'Smart City: Solid Waste Management' delivered by Mr V S Bhatnagar, Joint Manager, EHS, DCM Shriram, Kota on November 24, 2017.

### Kozhikode

- ❖ Lecture on 'Conservation of Temples from Chambal Dacoits' delivered by Architect Mohammed K K, Former Regional Director [North], Architectural Survey of India on November 11, 2017.

### Madurai

- ❖ Lecture on 'Waste Water Recycling and Reuse' delivered by Dr R Pannirselvam, Former Deputy Chief Engineer, TWAD Board, Chennai on November 11, 2017.

### Palghat

- ❖ Lecture on 'Nothing is Waste, Everything is Useful' delivered by Prof G Natarajan, Former Scientist, Council of Scientific and Industrial Research (CSIR) on November 11, 2017.

### Pilani

- ❖ Seminar on 'Mathematical Modelling: Development and Application' on September 25, 2017.
- ❖ Seminar on 'Total Productive Management' on October 13, 2017.

### Solapur

- ❖ Workshop on 'Foundation of Machine Learning Algorithm' on November 19, 2017.

### Tiruvallur

- ❖ Symposium on 'TECHASTRA17' during September 12-13, 2017.

## OVERSEAS CHAPTERS

### Kuwait

- ❖ Celebrated '50th Engineers Day' on September 15, 2017.



# IEI Celebrates World Standards Day

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efficiently from one point to another, a sense of safety and security and these are the kinds of promises modern cities should fulfill if they are to stay competitive and provide a decent quality of life to their citizens. He further explained that cities need to substantially increase the efficiency in which they operate and use their resources. 'Major efficiency improvements can be achieved by horizontally interconnecting individual systems, such as, electricity, water, sanitation and waste management, transportation, and also security, environmental monitoring or weather intelligence', he added. Mr Asim Mahapatra, Honorary Secretary of the Centre, proposed the vote of thanks.



## Palghat

Mr A Kesavan, Chairman of the Centre, presided over the function. The Guest Speaker, Prof (Dr) A K Raji, Department of Civil Engineering, NSS College of Engineering, Palakkad, while speaking on the theme, pointed out that objectives of the Day is to raise awareness among regulators, industries and consumers about the role standards play in our economy and



everyday life as a means of paying tribute to the collaborative efforts of the thousands of experts worldwide who develop the voluntary technical agreements that are published

as International Standards. She opined that combining the right set of resources with the respective suitable technology are the drivers that steer a city to become smart – from mobility to waste, energy to water supply and governance to buildings. Earlier, the guest speaker was formally introduced by Mr K Unnikrishnan, Honorary Joint Secretary of the Centre. Prof (Dr) E K K Nambiar, Honorary Secretary of the Centre, proposed the vote of thanks.

## Pilani

Dr P S Bhatnagar, Director, BKBIET, Pilani, in his inaugural speech, welcomed the guests and dignitaries present on the occasion. The Chief Guest, Dr

S P Kosta, Director General, Shri Ram Institute of Technology, Jabalpur, highlighted the importance of observing 'World Standards Day'. Dignitaries, namely, Mr R Kapoor, Mr Pasricha, Mr T R Vasudeva, Mr D R Nagpal and Mr Fateh Singh, Ex-Scientists, CEERI, Pilani graced the occasion with their benign presence and shared their experiences. Mr Shridhar Bhimarao Dandin, Chairman of the Centre, felicitated distinguished guests. The Programme concluded with the vote of thanks proposed by Dr Smita Pareek, Honorary Secretary of the Centre.



## Rourkela

Prof S K Sahu, Honorary Secretary of the Centre, welcomed the august gathering and presented a brief introduction on the theme of the day. The Guest Speaker, Mr Ajit Kumar Mahapatra, Head, Design Department, Rourkela Steel Plant, in his address, explained the salient features of Smart City Mission viz. drive for economic growth, improvement of quality of



life, retrofit slums, development of infrastructure, creation of green areas around the city, application of smart solutions, enhancement of income and employment. He further discussed in depth about core infrastructure required for a Smart City viz. robust IT network, E governance, sustainable

environment, solid waste management, safety and security, health and education, adequate water supply, assured electricity, sanitation and drainage, efficient urban mobility, affordable housing. Prof S K Sahu, proposed the Vote of thanks.

## Saurashtra

Mr Harshadrai A Kansagra, Chairman of the Centre, welcomed the guests and dignitaries present on the occasion. Prof (Dr) Sarang Pande, Principal, Faculty of P G Studies and Research Work, Marwadi University, Rajkot discussed on the theme 'Standards Make Cities Smarter' quoting several examples of standards viz. roads, gardens, building of societies, school and college buildings that are made up by using standard materials. Mr Navinchandra R Kalaria, Honorary Secretary of the Centre, proposed the vote of thanks.



# IEI DIARY

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One Day Workshop on "Communication and Personality Development for Engineers"

Ahmedabad, February 10, 2018

The Honorary Secretary, IEI Gujarat State Centre, Bhaikaka Bhavan, Law College Road, Ahmedabad 380006 [☎: (079) 26400811; Fax: (079) 26561825; e-mail: gujaratssc@ieindia.org]

All India Seminar on "Making India Self Reliant – Emerging Technologies"

Ranchi, February 24-25, 2018

The Honorary Secretary, IEI, Jharkhand State Centre, Engineer Bhawan, Nepal

Kothi Campus, Ranchi 834002 [☎: (0651) 2491344; web: ieijsc.org; e-mail: jharkhandsc@ieindia.org]

International Conference on "Emerging Technologies for Sustainable and Intelligent Technologies for HVAC & R Systems"

Kolkata, July 20-21, 2018

The Honorary Secretary, IEI, West Bengal State Centre, 8 Gokhale Road, Kolkata 700020 [☎: (033) 22238914; Fax: (033) 22233140; e-mail: wbsc@ieindia.org]

National Languages Promotional Committee

One Day Seminar on "The System of Running & Rectification of Defects of a Turbo Generator in Eastern India" (in Bengali)

Durgapur, January 15, 2018

The Honorary Secretary, IEI, Durgapur Local Centre, Nehru Avenue, 'B' Zone, Durgapur 713205, [Fax: (0343) 256 4770; e-mail: durgapurlc@ieindia.org]



# 32<sup>nd</sup> INDIAN ENGINEERING CONGRESS

Chennai, December 21-23, 2017

Theme:

**Innovation in Engineering : Competitive Strategy Perspective**

Organized by: **The Institution of Engineers (India)**

Hosted by: **Tamilnadu State Centre**

Contact : Organising Secretary, 32<sup>nd</sup> Indian Engineering Congress, The Institution of Engineers (India), Tamilnadu State Centre  
19 Swami Sivananda Salai, Chepauk, Chennai 600005, Tel: +91 94440 19091/ +91 72999 13060  
Web: [iec2017chennai.in](http://iec2017chennai.in); Email: [tncs@ieindia.org](mailto:tncs@ieindia.org)/[admin@iec2017chennai.in](mailto:admin@iec2017chennai.in)



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## Physical Computing using Arduino

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the brain of thousands of projects, from everyday objects to complex scientific instruments and applications. Mr R Ramdoss, Honorary Secretary of Tamilnadu State Centre, IEI, highlighted various activities of the Institution aimed for the development of students and opportunities that it presents to its members. Dr S R R Senthilkumar, Honorary Secretary of the Kanchepuram Local Centre, proposed the vote of thanks. The main aim of the Workshop was to know the importance and create an in-depth knowledge about physical computing and Arduino. Mr Durgesh Joshi, CEO and Co-Founder, KJP Automation, threw some

light on the types of Arduino, techniques and scenarios for its applications. Papers embracing the theme of the Workshop were presented and discussed during technical sessions. The hardware sessions included working with various peripherals including LED, Switches, Serial Port, Light Dependent Resistor, Intensity variation using PWM, Relay Control using TSOP Sensors and many more. A large number of presentations, projects, interactive discussions and real time applications on 'Physical Computing using Arduino' were held during the two-day All India workshop.

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