RAMAIAH UNIVERSITY
OF APPLIED SCIENCES

Conference Programme

International Conference on Photonics, Signal Processing and Communication Technologies (ICPSPCT)

Date: July 18th - 20th 2018

Important Dates

- Deadline for Submission of Research Paper   **01st March 2018**
- Notification of Acceptance of Research Paper   **30th April 2018**
- Camera Ready Submission of Research Paper   **01st June 2018**
- Conference Dates   **18th, 19th, 20th July 2018**

Springer

For More Details: **Visit** www.icpspct-ruas.org

For Technical Queries Contact:
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Call for Papers

The inaugural International Conference on Photonics, Signal Processing and Communication Technologies (ICPSPCT) is jointly organized by the Centre for Signal Processing and Communication System Research (CSPCSR) and the Photonics Research Centre (PRC) of Ramaiah University of Applied Sciences (RUAS), Bangalore, India.

The conference is scheduled from July 18th - 20th 2018 at RUAS, Bangalore. ICPSPCT serves as a platform for students, research scholars, academicians, industry professionals and researchers to publish their innovative research concepts as well as contributory research findings. This conference encourages submission of research papers highlighting analytical formulation, solution, simulation, algorithm development, experimental research and experimental investigations in the broad domains of Photonics, Signal Processing and Communication Technologies. This conference envisages and also encourages publication of research papers from allied fields of science and engineering depicting multidisciplinary research and industry - academia synergy.

The theme of the ICPSPCT includes Signal Processing, Image Processing, Communication, Microwave (Antenna/Measurements), Photonics, VLSI Circuits and Systems, Communication Networks, System Design and Systems Engineering.

The program of this three day conference will include invited talks, tutorials, exhibits and paper presentations (oral and poster). Select papers will be published in Springer book volume based on the publisher's criteria. This conference anticipates active participation from R&D Labs, Academia and Technology Development Groups from Industries.

Signal and Image Processing

- Array Signal Processing
- Biomedical Signal Processing
- Spectral Analysis
- Radar Signal Processing
- Adaptive Signal Processing
- Audio and Speech Processing
- Pattern Recognition
- Compressive Sensing
- Dimensionality Reduction Techniques
- Graph Signal Processing
- Statistical Learning and Estimation Schemes
- Medical Image Analysis
- Hyperspectral Image Processing
- Time-Frequency/Time-Scale Analysis
- Content-Based Image Retrieval
- Computer Vision Techniques
- Image and Video Compression
- Image and Video Processing Architecture
- Video Analysis and Event Recognition
- Video Surveillance and Monitoring
- 3D Image Modeling and Visualization
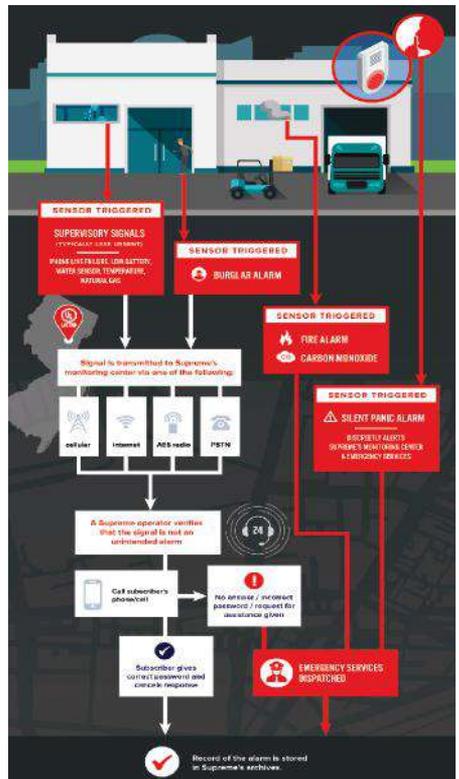
Communication Systems and Networks

- Cellular Communications
- Multicarrier Techniques
- MIMO Systems
- SDR and Cognitive Radio Systems
- Cognitive Radio Networks
- Digital Beamformers
- Next-Generation Network Architectures
- Future Internet
- Network Performance
- 5G Networks
- Internet of Things
- Cloud Computing
- Heterogenous Networks
- Machine to Machine (M2M) Communication
- Wireless Networks
- Self-Configurable Systems
- Green Communication Systems and Network
- Mobile Computing
- Smart Cities and Smart Grids
- Vehicular Networks
- Information-Centric Networks
- Opportunistic Networks
- Underwater Networks
- Software Defined Networks

Antennas and Microwave Engineering

- Antennas for Radar and Satellite Communication, Navigation and Remote Sensing
- Mobile Communication Antennas
- Wearable/Embedded/Nano Antennas
- Phased Array/Re-Configurable/Multi-Beam Antennas/Base Station Antennas
- Near Field/Far Field/Compact Range Measurements
- New Techniques in Antenna Measurements
- RF & Microwave Devices and Circuits
- Meta-Materials
- Optical Antennas
- Rectennas for Energy Harvesting
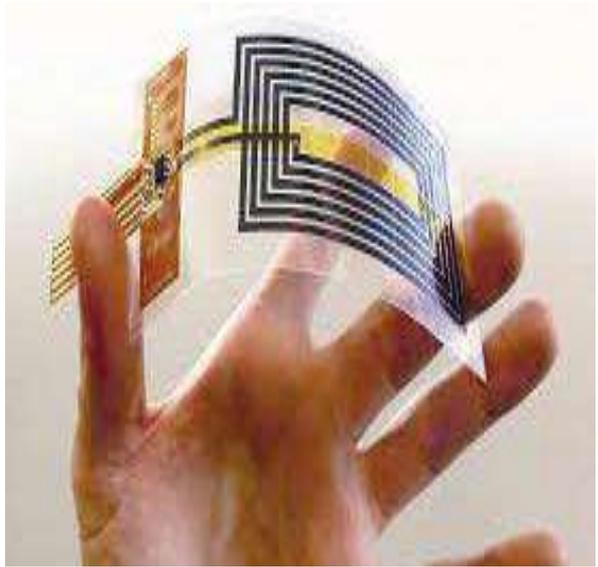
Photonics

- Organic LEDs
- Photonic Crystal Devices
- Micro-Opto Electro Mechanical Systems
- Optoelectronics and Integrated Optics
- Bio, Microwave and Nano Photonics
- High Power / Intensity Sources
- Non-Linear and Ultrafast Optics
- Optical Interconnects
- Optical Micro and Nano Resonators
- Optical Networks and Systems
- Photonic Integration and Packaging
- Photonic Materials
- Photodetectors and Optical Sensors
- Semiconductor Lasers
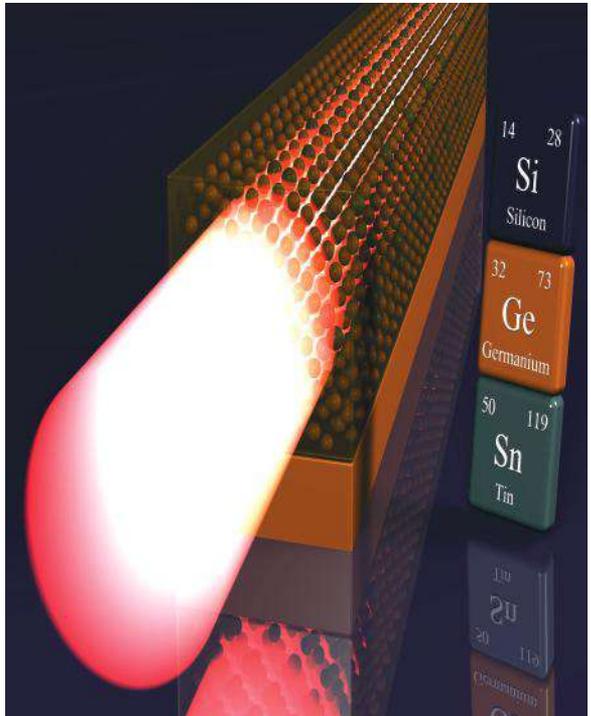
VLSI Circuits and Systems

- Pipeline/Parallel Architectures
- Multicore Architectures
- System on Chip and Network on Chip
- 3D ICs
- FPGA/GPU Hybrid Computing
- Hardware/Software Co-Design
- VLSI Testing, Verification and Reliability
- Nano Electronics
- Power Analysis
- Temperature Aware Design
- Physical Design, Layout and Packaging
- High Speed Board Design
- EMI / EMC
- PI and SI Analysis
- On Chip Antennas
- Low Power ASICs
- Low Power Processors
- CAD for VLSI
- Device Modelling
- IP Cores
- Analog VLSI Design Automation
- FinFET Technology

System Design and Systems Engineering

- Systems Engineering for Dynamic Systems
- Model Based Systems Engineering
- Systems Engineering Standards
- Engineering Design Management
- Dependable Systems

About the University

Ramaiah University of Applied Sciences (RUAS) is a Private University established by an Act of the State of Karnataka, India. The University is granted with 2f status by University Grants Commission (UGC) and NIRF-MHRD (NIRF - National Institutional Ranking Framework) has ranked the University as one among the top 100 Universities in India during 2016. The University is sponsored by Gokula Education Foundation, a public charitable trust owned by M. S. Ramaiah family. The Gokula Education Foundation has promoted more than 25 institutions in the last 55 years offering Quality Higher Education and Healthcare.

RUAS is established with a vision to be known as a modern, innovation-intensive University, where the University continuously interacts with the Industry, Business Communities and Government Organisations. The University aims to produce graduates who are confident, can think creatively and apply their academic learning along with practical skills to find innovative solutions for the problems faced by Society.

The University has Faculties of Engineering and Technology; Art and Design; Management and Commerce; Mathematical and Physical Sciences; Biological and Life Sciences; Pharmacy; Dental Sciences and Hospitality Management & Catering Technology. All the Faculties offer undergraduate, postgraduate and Ph.D. programmes. The University infrastructure supports 10,000 students. There are separate directorates like Training and Lifelong Learning; Sponsored Research; Techno Centre; Admissions; Student Affairs; Transferable Skills and Leadership Development; International Collaborations and Partnership Management, and Public Relations & Publicity to support the academic activities and interactions with Industry, Business, Communities, Government and other Universities in India and abroad. Further, the University has created various Cells and Centres like Quality Assurance; Pedagogy & Digital Learning Initiative; Social Media; Faculty and Academic Leadership Development and RUAS Innovation Centre to provide a wholistic experience to the students. The University has also invested in advanced design, simulation, manufacturing and testing facilities, all housed in modern buildings.

RUAS has implemented outcome based curriculum which focuses on equipping our youth with knowledge and understanding, cognitive abilities, practical skills relevant to industrial and societal needs. The University has adopted global best practices in teaching, learning and assessment to ensure all-round development of students for a happy and successful career. Being a comprehensive University, the courses are inter and multi-disciplinary in nature which is an essential characteristic of present day education. All courses are designed to train students to be creative, innovative and imaginative which are the fundamental requirements of the graduates of 21st Century.

In India, the IITs, IIMs, AIIMS, NIPER and NID are well known for technology, management, medical, pharmacy and design education respectively. It is envisioned that RUAS will evolve into a University that combines the successful features of all these institutions and become the Premier Innovation University in Asia in the coming decade.

Facts and Figures

Faculties	08	UG Programmes	17
Directorates	08	PG Programmes	57
Departments	33	Ph.D. Scholars	210
Research Centres	21	Proficiency & Vocational Programmes	25+
		Corporate Programmes	810

Faculty Members	375+	Research Projects	120
Technical and		Consultancy Projects	510
Administrative Staff	310	Publications	2286
		Patents Filed/Awarded	102/14
		Business Incubations	15
		Industry Partnerships	135+

Research @ RUAS

Ramaiah University of Applied Sciences aspires to grow as a modern innovative University with a greater emphasis on Applied Research where the University continuously interacts on contemporary Research topics with the Government Organisations, Industries and Business Communities. The University believes in Applied Research which aims to significantly contribute to the economic and social development of communities. The University is encouraging its Faculty Members to spend their considerable time in Research by creating 21 Research Centres in multi-disciplinary domains. The Research Centres of the University are:

- Automotive Technologies Research Centre
- Centre for Aeronautical and Micro Air Vehicles Research
- Energy and Power Systems Research Centre
- Sanitation, Waste Management and Environmental Engineering Research Centre
- Centre for Machine Learning and Computational Intelligence
- Centre for Control Systems and Robotics Research
- Centre for Biomedical Systems and 3D Printing Research
- Centre for Signal Processing and Communication Systems Research
- Structural Design and Analysis Centre
- Composite Materials and Technologies Research Centre
- Research Centre for Contemporary Tools and Techniques in Industrial Design
- Innovation and Entrepreneurship Development Research Centre
- Photonics Research Centre
- Centre for Batteries and Biofuel Research
- Software Engineering and Big Data Modelling Research Centre
- Nutraceutical and Nutrition Research Centre
- Oral Cancer Research Centre
- Biomaterials Research Centre
- Dental and Maxillofacial Modelling and Simulation Centre
- Drug Design and Development Centre
- Pharmacological Modelling and Simulation Centre
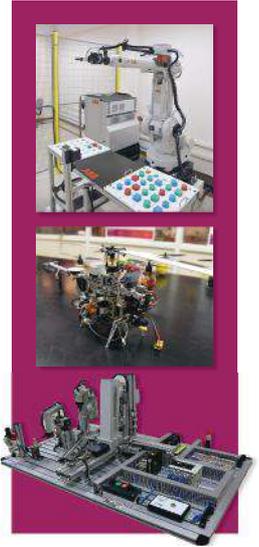
Doctoral Programme @ RUAS

Ramaiah University of Applied Sciences offers Ph.D. programme through full time and part time routes in the Faculties of Engineering and Technology, Art and Design, Management and Commerce, Science and Humanities, Dental Sciences, Pharmacy and Hospitality Management and Catering Technology. The admissions notice for the Doctoral Programme will be announced in the months of April and September - Every Year.

In-House Publications @ RUAS

Ramaiah University of Applied Sciences publishes three Journals every Six Months (January and August – Every Year) namely:

- SASTech Journal
- Journal of Dental and Orofacial Research
- UAS – Journal of Management and Commerce

Manuscripts are invited for all the above mentioned Journals and there is no publication charges for the same.

For More Details:

Visit   : www.msruas.ac.in/research
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         ad.dp@msruas.ac.in (Doctoral Programme)
         ad.sr@msruas.ac.in (Publishing in our University Journals)