RESEARCH AND TRAINING UNIT FOR NAVIGATIONAL ELECTRONICS

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Departement of ECE, OSMANIA UNIVERSITY - HYDERABAD 500 007



10-DAY WORKSHOP ON

AUTOMATIC SPEECH RECOGNITION AND SYNTHESIS

(Course Code: NERTU/SC/56)

Sponsored by Technical Education Quality Improvement Program (TEQIP Phase-II)

13-22, JUNE 2014

SPEAKERS

- 1. Prof.Peri Bhaskar Rao, IIITH
- 2. Prof.K.Narayana Murthy, HCU
- 3. Dr.Anil Kumar Vuppala, IIITH
- 4. Dr.A.V.Ramana, Ikanos
- 5. Dr.P.Laxminarayana, OU Some more experts from industry, research and academic Institutes.

DATES:

June 13-22, 2014

TIME:

08.30AM - 06.00PM

LOCATION:

Department of ECE, OU

REGISTRATION FEE

Rs. 4000/- for Full Time Students Rs. 6000/- for Teachers

Rs. 9000/- for Scientists/Engineers

from Research Organizations and Industries

DD/Cheque should be drawn in favor of **The Head, Department of ECE, OU**

Accommodation: Available for limited people on payment basis on first come first served.

LAST DATE FOR REGISTRATION 5th June 2014

For programme and registration www.osmania.ac.in

or contact:

Dr.P.Laxminarayana, Coordinator,ASR-14, plaxminarayana@yahoo.com, laxminarayana@osmania.ac.in

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Or

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Course Overview

Outstanding work in Automatic Speech Recognition (ASR) and Synthesis has produced the commercial speech recognition systems for voice-driven computing and word-processing systems in English and European Languages. Though some research work is happening in Indian languages too, ASR systems are not yet launched into the market at full level. Therefore there is a need to do the research and development of ASR based applications for Indian languages. The main objective of the course is to train and motivate the participants to learn the basics of Automatic Speech Recognition and synthesis and start research and development of applications of Speech Recognition and Synthesis for Indian Languages. The workshop will have theory sessions in the morning and lab practice in the afternoon. The topics to be covered in the theory are: Speech production, perception, Analysis, Fundamentals of ASR and speech synthesis, Feature Extraction, Dynamic Time Warping, Hidden Markov Models, Gaussian Mixture Models, Language Modelling, text normalization, ponetic analysis, labeling and segmentation, prosody analysis, waveform sysnthesis and ASR over VoIP and wireless networks. Lab practice will include, Feature Extraction, DTW and HMM for IWR using MATLAB. Continuous Speech Recognition using Sphinx.

Targeted Participants

This is an intensive instructional and practising workshop. Teachers, scientists, engineers and PG students from academic institutes, research organizations and industries, working in the area of speech signal processing or interested to do research in Speech Signal Processing are the expected participants. Participants have to bring their own laptops to practice in the lab sessions.

About NERTU

The Research and Training Unit for Navigational Electronics (NERTU) is established in 1982. It is the focal point for research and training in the areas of Electronic Navigation in India. Since its inception, NERTU has successfully executed **47** sponsored and consultancy projects funded by DRDO, ISRO, DST, MIT, ECIL, HAL, BEL, AICTE and ASL. Currently, several projects in different areas related to navigation, signal processing and communications are in progress. It has also conducted 56 short term courses/workshops/ conferences on various topics of signal processing, communications and Navigation.

About Department of ECE

The Department of Electronics & Communication Engineering (ECE) was established in the year 1959 with only two faculty members. It bears the indelible stamp of its founder Head of the Department, late Prof.K.Krishnan Nair. He exhorted ECE Department to become a byname for Excellence, Creativity and Enterprise. In his memory, The Commemoration Committee organizes an annual lecture by a distinguished professional. In the span of five decades the Department has grown to a complement of 16 members of teaching staff and about 500 students at UG, PG and Ph.D with the staff specialized in various fields of Digital Systems, Control Systems, Signal Processing, Microwaves, Microprocessor Applications, Computer Systems and Communication Engineering, Embedded Systems and VLSI Design etc. and most of them having Doctorates. The broad spectrum of subjects in the area of ECE is fully represented. The presents of research are on VLSI and Embedded System, Digital Signal Processing, Microwave Engineering, Modern Tele Communications.

Interested candidates can down load the registration form from www.osmania.ac.in or http://www.uceou.edu and send the filled form along with DD/Cheque, before 5th June 2014, to the following address.

The Coordinator, ASR-14, Department of ECE, Osmania University, Hyderabad 500007