CALL FOR PAPERS

Fortieth Annual Asilomar Conference on Signals, Systems, and Computers

Asilomar Hotel and Conference Grounds, Pacific Grove, California October 29 - November 1, 2006

URL: www.asilomarssc.org

Authors are invited to submit papers before June 1st, 2006, in the following areas:

A. Communications Systems and Networking:

1. Error Detection and Correction, 2. Signal Representation and Spectral Analysis, 3. CDMA, 4. Modulation and Detection, 5. Performance Bounds, 6. Synchronization, 7. Ultra Wideband, 8. OFDM / Multicarrier, 9. Networks, 10. Wireless Communications, 11. Optical Communications

B. Adaptive Systems and Processing: 1. Adaptive Filtering, 2. Fast Algorithms for Adaptive Filtering, 3. Frequency-domain and Subband Adaptive Filtering

C. Array Processing and Statistical Signal

Processing: 1. Array Processing and Beamforming, 2. Sonar and Acoustical Array Processing, 3. Radar Array Processing, 4. Sensor Networks, 5. Remote Sensing, 7. Signal Separation, 8. Estimation and Detection, 9. Non-Gaussian and Nonlinear Methods, 10. Identification

D. Biomedical Signal and Image Processing:

1. Medical Image Analysis, 2. Imaging Modalities, 3. Advances in Medical Imaging, 4. Biomedical Signal Processing, 5. Biomedical Applications, 6. Bioinformatics, 7. Image Registration and Multi-modal Imaging, 8. Image Reconstruction, 9. Computer Aided Diagnosis, 10. Functional Imaging, 11. Visualization



E. Multi-rate and Digital Signal Processing:

1. Filter Design, Theory, and Implementation, 2. Wavelets, 3. Quantization, 4. Sampling, 5. Signal Representations

F. Architecture and Implementation:

1. Programmable and Reconfigurable Architectures, 2. SOC Architectures, 3. Low-power Methods, 4. Compilers and Tools, 5. Integrated Algorithm and Architecture Implementation, 6. Computer Arithmetic, 7. Numerical Processing

G. Speech, Image and Video Processing:

1. Speech Processing, 2. Speech Coding, 3. Speech Recognition, 4. Narrowband / Wideband Speech and Audio Coding, 5. Document Processing, 6. Models for Signal and Image Processing, 7. Image and Video Coding, 8. Image and Video Segmentation, 9. Image and Video Analysis, 10. Image / Video Security, Retrieval and Watermarking, 11. Image and Video Enhancement / Filtering, 12. Biometrics and Security

H. MIMO Communications and Signal

Processing: 1. Space-time Coding and Decoding, 2. Channel Estimation and Equalization, 3. Multi-user and Multi-access Methods.

Submissions should include a 50 to 100 word abstract and an extended summary (500 to 1000 words, plus figures). Submissions must include the title of the paper, each author's name and affiliation, and the technical area(s) in which the paper falls with number(s) from the above list. Check the conference website (www.asilomarssc.org) for specific information on the electronic submission process. Submissions will be accepted starting February 1, 2006. No more than FOUR submissions are allowed per contributor, as author or co-author. All submissions must be received by June 1, 2006. Notifications of acceptance will be mailed by late August 2006, and author information will be available on the conference website by mid September 2006. Full papers will be due at the conference and published in the spring of 2007. All technical questions should be directed to the Technical Program Chair, Dr. Victor DeBrunner, e-mail: vdebrunn@ou.edu, or the General Chair: Dr. Scott Acton, e-mail: acton@virginia.edu. Prospective organizers are invited to submit proposals for special sessions to vdebrunn@ou.edu or acton@virginia.edu by January 15, 2006. Proposals must include a topical title, rationale, session outline, contact information, and a description of how the session will be organized.

CONFERENCE COMMITTEE

General Chair: Scott Acton, *University of Virginia*

Technical Program Chair: Victor DeBrunner, *The University of Oklahoma*Conference Coordinator: Monique P. Fargues, *Naval Postgraduate School*Publication Chair: Michael Matthews, *ATK Mission Research*Publicity Chair: Murali Tummala, *Naval Postgraduate School*Finance Chair: Frank Kragh, *Naval Postgraduate School*

The site for the 2006 Conference is at the Asilomar Conference Grounds, in Pacific Grove, CA. The grounds border the Pacific Ocean and are close to Monterey, Carmel, and the scenic Seventeen Mile Drive in Pebble Beach.

The Conference is organized in cooperation with the Naval Postgraduate School, Monterey, CA, ATK Mission Research, Monterey, CA, and the IEEE Signal Processing Society.