

CALL FOR PAPER – ECBS 2012

**19th Annual IEEE International Conference and Workshops on the
Engineering of Computer Based Systems (ECBS)
sponsored by the IEEE Technical Committee on ECBS**

Conference web site: [http:// tab.computer.org/ecbs/2012](http://tab.computer.org/ecbs/2012)

Date: 2012-04-11 to 2012-04-13

Location: Novi Sad, Serbia, Europe

ECBS 2012 will be the 19th formal IEEE sponsored meeting dedicated to formulating and advancing methods, techniques and tools for the engineering of computer-based systems.

The conference is devoted to the analysis, design, development, deployment, and evolution of complex systems whose behaviour is largely determined or controlled by computers. Such systems – also called cyber-physical systems –are characterized by functional as well as dependability requirements that mandate the tight integration of information processing and physical processes. Therefore, ECBS integrates several disciplines, including software, hardware, and communication into a complete systems engineering approach.

ECBS 2012 addresses many facets that include system modeling; requirements engineering; simulation, verification and validation; architectures, software and hardware platforms, and infra structures; dependability, safety, and security; human computer interfacing; large-scale systems and system integration; engineering processes; evolution.

The conference provides a bridge between industry and academia, blending academic research and industrial developments. Papers are sought which reflect this theme, according to the following thematic tracks:

- Adaptive Computing & Autonomic Systems
- Distributed Systems Design & Architecture
- ECBS Infrastructure (Tools, Platforms)
- Embedded Real-Time Software Systems
- Model-based System Development
- Model-based Simulation & Validation
- Verification & Validation
- Domain-Specific Modeling
- Reengineering & Reuse
- Evolution & Change

Reports of practical solutions, trends and new system characteristics for ECBS, taking an integrated systems approach, may include application domains such as: Aeronautics, Automotive and Telematics, Industrial Automation and Process Control, Medical Systems, Smart Energy Systems, Smart Sensor Networks and Environmental Systems, Telecommunication & Internet Technology and Applications.

Workshops:

As in the previous years, ECBS 2012 offers to host workshops. Please contact the organizers (ecbs2012-tcm@fortiss.org) for more information.

Poster Sessions:

Posters and abstracts presenting work in progress are invited for a poster session. Accepted abstracts will be published in the proceedings. Graduate students are especially welcome to participate.

Doctoral Symposium:

The Doctoral Symposium provides a forum for PhD candidates to present work in progress and get feedback from the research community while also publishing a full paper in the IEEE proceedings.

Industrial Track

The industrial track provides a forum for short papers on results of industrial research and development.

Submission of Papers

Full papers and Doctoral Symposium papers must be 6 to max 10 pages in Computer Society Format, posters 5 pages max and industrial track papers 2 to 4 pages. Papers must be submitted via EasyChair [tab.computer.org/ecbs/2012/submission.html] and are requested to be allocated to one of the defined ECBS tracks. For further information see the submission guidelines on the conference web site.

For Full Papers and Doctoral Symposium Papers, the Program Committee will select a best paper award.

Important Dates

Submission of titles and abstracts:	07 14 November 2011 (extended)
Submission of all papers:	14 21 November 2011 (extended)
Notification of acceptance:	19 23 December 2011 (extended)
Camera-ready material for publication:	16 20 January 2012 (extended)
Registration deadline for authors:	16 20 January 10 February 2012

Early registration deadline for non-authors ~~22-26 February~~ 17 February 2012

Submission dates for workshop papers may differ, so please check separate Calls for Papers on the workshop websites.