



The 8th International Symposium on
Applied Reconfigurable Computing

ARC

19-23 March 2012, Hong Kong

Web: <http://arc2012.hk>
E-mail: info@arc2012.hk

2012

Hosted by the Chinese University of Hong Kong and City University of Hong Kong

CALL FOR PAPERS

The ARC Symposium

Reconfigurable Computing technologies offer the promise of substantial gains in performance and power efficiency over traditional architectures via customising, even at runtime, the topology of the underlying architecture to match the specific needs of a given application.

Contemporary configurable architectures allow for the definition of specific functional and storage units, adapted to the functions, bit-widths and control structures of a given computation. This flexibility enabled by reconfiguration can also be seen as a basic technique for overcoming permanent and transient failures on emerging device structures.

ARC aims at bringing together researchers and practitioners of reconfigurable computing with an emphasis on practical applications of this promising technology. This year's symposium will also host a series of international invited speakers to share their insights into the future of reconfigurable technology.

The ARC 2012 proceedings will appear in the Springer Lecture Notes in Computer Science (LNCS) series and also be available in the SpringerLink on-line service. Additionally, the top papers will be invited to submit to a special section of a forthcoming journal issue of Elsevier Microprocessors and Microsystems (MICPRO).

Submission Information

Authors are invited to submit original contributions in English including, but not limited to, the areas of interest mentioned above. Submissions must be uploaded to the ARC website and identify the format of the contribution as either:

Long papers: (12 pages maximum) which should include mainly accomplished results (oral presentation)

Short papers: (6 pages maximum, or 8 pages maximum upon payment of a further charge of US\$100) to be composed of work in progress or reporting recent developments (poster presentation).

The format of the papers should be according to Springer-Verlag LNCS series (Lecture Notes in Computer Science) format rules. (guidelines at <http://www.springer.de/comp/lncs/authors.html>)

Important Dates

Submission Deadline

1 st November, 2011

Author Notification Deadline

1 st December, 2011

Camera-Ready Author Registration

20 December, 2011



Themes : ARC for Better Living

Submissions are solicited on a wide variety of topics related to applied reconfigurable computing, including but not limited to:

RC Design Methods & Tools

- High-Level Compilers
- Simulation
- Estimation
- Design Space Exploration
- Languages to program reconfigurable systems, etc
- Systems Software Support
- Compilation and Synthesis
- Other

RC Architectures

- Fine-grained
- Mixed-grained
- Multi-processor-based reconfigurable platforms
- Microprocessors with tightly-coupled reconfigurable hardware
- Reconfigurable Fabric Architectures
- System Architectures and Integration
- Other

RC Applications

- High-Performance Systems
- Embedded Computing
- Estimation
- Robotics
- Digital Signal Processing
- Other

Critical Issues in RC

- Teaching Reconfigurable Computing
- Surveys and Future Trends
- Benchmarks

General Chairs:

Oliver Choy, The Chinese University of Hong Kong

Ray C.C. Cheung, City University of Hong Kong

Program Co-Chairs:

Peter Athanas, Virginia Tech, USA

Kentarō Sano, Tohoku University, Japan

