



The 29th Annual IEEE International Conference on Application-specific Systems, Architectures and Processors (ASAP 2018) Politecnico di Milano, Milano, Italy, July 10 – 12, 2018

Website: http://asap18.necst.it/

CALL FOR PAPERS

The 29th IEEE International Conference on Application-specific Systems, Architectures and Processors 2018 will take place in Milan, Italy. The 2018 edition of the conference is organized by Politecnico di Milano.

The history of the event traces back to the International Workshop on Systolic Arrays, organized in 1986 in Oxford, UK. It later developed into the International Conference on Application Specific Array Processors. With its current title, it was organized for the first time in Chicago, USA in 1996. Since then it has alternated between Europe and North-America. The conference will cover the theory and practice of application-specific systems, architectures and processors. The 2018 conference will build upon traditional strengths in areas such as computer arithmetic, cryptography, compression, signal and image processing, network processing, reconfigurable computing, application-specific instruction-set processors, and hardware accelerators.

SUBMISSION OF PAPERS

All manuscripts will be reviewed by at least three members of the program committee. Submissions should be a complete manuscript or, in special cases, may be a summary of relevant work. Manuscript for full paper should be not exceeding 8 singlespaced, double-column pages using 10-point size font on 8.5X11 inch pages (IEEE conference style) including references, figures and tables. Manuscript for short papers should not exceed 4 single-space, double-column pages. Manuscripts for posters should not be not exceeding 2 sing-spaced, double-column pages. Papers are to be submitted through EasyChair. Submitted papers should not have appeared in or be under consideration for a different workshop, conference or journal. It is also expected that all accepted papers (regular, short or poster) will be presented at ASAP by one of the authors. Failure to present will result in the removal of the submission from the proceedings before publication in IEEE Xplore. All papers must be submitted electronically in PDF format.

Submission website: https://easychair.org/conferences/?conf=asap2018

IMPORTANT DATES

Submission deadline: April 22, 2018 Decision notification: May 22, 2018

- Big data analytics
- **Cloud Computing infrastructures** and acceleration
- Heterogeneous Computing in Data
- **Accelerating Data Center Workloads**
- FPGA-based Deep Learning
- Embedded systems and Domain-Specific solutions (Digital Media, Gaming, Automotive applications)
- **TOPICS OF INTEREST (but not limited) Accelerating Genomic Computations**
- Acceleration of Data Analytics
- Reconfigurable Computing in the IoT era
- **Applications in Finance**
- Wireless and Mobile Systems
- Application-aware controller synthesis
- Emerging Technologies (optical models, 3D Interconnects, devices)
- **Reconfigurable Accelerators**
- Hardware and software architectures for cyber-physical systems

- **Distributed Systems & Networks**
- Critical issues (Security, Energy efficiency, Fault-Tolerance)
- Autonomous and semi-autonomous largescale CPS
- Autonomic computing systems
- High-Level Design Methods (Hardware/Software co-design, Compilers)
- Simulations and Prototyping (performance analysis, verification tools)
- · Socio-technical systems

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