

GENERAL CHAIR'S WELCOME

Welcome to the vibrant city of New Orleans and the 39th Design Automation Conference (DAC). DAC yearly attracts thousands of engineers who are eager to understand the latest developments in electronic design automation (EDA) as well as to hear about the most exciting chip and system designs. DAC's primary mission is to facilitate technical interchanges among design automation researchers and developers, the engineers who use DAsystems and the vendors who provide both DA systems and silicon. This is primarily enabled by bringing together a wide variety of outstanding individuals in each of these areas, representing a true diversity of backgrounds - ranging from students to chief executive officers.

DAC is the premier conference for the presentation of research and development work on tools for designing chips and systems, and new methodologies for circuit and embedded system designs. It is the preferred conference for presenting next generation electronic circuits and system design experiences. DAC continues to be the forum where the EDA industry exhibits leading edge products and makes new product announcements. This year the conference continues to highlight the convergence of embedded systems software design tools and EDA hardware design tools in support of large complex systems-on-a-chip. Besides a strong presence in the technical program (through a special track, keynote speakers, panels, and invited presentations), the "Embedded System Showcase", on the exhibit floor, highlights companies with offerings in this area.

More than 225 companies will be exhibiting the latest commercially available products at DAC this year. Many of these companies are hosting demo suites to provide a more complete demonstration of their product offerings. For the first time this year, DAC is featuring "hands-on" tutorials in which vendors instruct attendees in the capabilities of their tools. Another first this year is the DAC Pavilion, a DAC sponsored booth which brings highlights of the technical program, interviews and lively discussion topics to those on the exhibit floor.

These Proceedings record an outstanding technical program which was assembled under the leadership of this year's Co-Program Chairs, Luciano Lavagno and David Blaauw, and Panel Chair, Sharad Malik. This year, 491 papers from around the world were submitted and reviewed by over 600 EDA and system design professionals. These reviews, along with a detailed examination by the Technical Program Committee, yielded the 147 papers included in these Proceedings and presented at the conference. These papers are complemented by eight panel sessions. A number of special sessions featuring renowned invited speakers embrace emerging and hot topics in the world of electronic design and its automation.

I want to express my sincere appreciation to all those who contributed to making DAC the premier conference for electronic design technology: the Authors, Speakers, Reviewers, Session Organizers and Session Chairs. A particular thanks to the DAC Executive Committee, the Technical Program Committee, and the Exhibitor Liaison Committee for their dedication. Also to the outstanding efforts of MPAssociates, Inc. who consistently ensure that the conference and the exhibits run like a well-oiled machine.

DAC is sponsored by ACM/SIGDA, IEEE Circuits and Systems Society, and the EDA Consortium. Their members represent the breadth and depth of the EDA community, and we are thankful for their continued and active support. Also this year, for the first time, the conference is being held in technical co-operation with the IEEE Solid State Circuits Society, further representing the designer community.

We wish you a very productive week in this vibrant and eclectic city. We trust that you will find these Proceedings to be a valuable resource and reference for many years to come.



Bryan Ackland
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39th Design Automation Conference