हाइपीसी HiPC

18TH INTERNATIONAL CONFERENCE ON HIGH PERFORMANCE COMPUTING (HiPC 2011)

December 18-21, 2011 | Bengaluru (Bangalore), INDIA | www.hipc.org

PROGRAM HIGHLIGHTS

The 18th International Conference on High Performance Computing (HiPC 2011), to be held in Bangalore, India, during December 18-21, 2011, will serve as a forum for presenting current work by researchers from around the world as well as to highlight activities in Asia, in the area of high performance computing.

KEYNOTE SPEAKERS

> **TAKAYUKI AOKI**
Deputy Director and Professor, Global Scientific Information and Computing Center, Tokyo Institute of Technology
Large-Scale Stencil Applications on GPU-rich Supercomputer TSUBAME2.0

> **ALOK CHOUDHARY**
John G. Searle Professor of Electrical Engineering and Computer Science and Professor,
Kellogg School of Management, Northwestern University
Discovering Knowledge from Massive Social Networks and Science Data - Next Frontier for HPC

> **MANISH GUPTA**
Director, IBM Research India and Chief Technologist, IBM India/South Asia
Computing Challenges for a Brave New World

CONTRIBUTED PAPERS

The technical program will consist of 40 contributed papers chosen from 206 submissions. The papers will be presented in 8 sessions covering important and timely topics such as performance, consistency, virtualization, fault tolerance and power management for large scale HPC and Cloud infrastructures, routing, and programming support, shared memory abstractions and applications for multi-core and GPU systems.

STUDENT RESEARCH SYMPOSIUM

The conference will feature the fourth student research symposium on High Performance Computing on Sunday, December 18, aimed at stimulating and fostering student research, and providing an international forum to highlight student research accomplishments. The one-day symposium will feature brief presentations by student authors on their research and a poster exhibit, and will be followed by a reception and industry-student mixer.

WORKSHOPS

As part of the conference, 4 workshops will be hosted on Sunday, December 18, 2011.
> Workshop on Energy Efficient High-Performance Computing (EEHiPC)
> Workshop on Next Generation Wireless Networks (WoNGeN)
> Workshop on Hybrid Multicore Computing
> Workshop on Parallel Algorithms and Software for Analysis of Massive Graphs (ParGraph)

US/INDIA WORKSHOP ON CDSE&E

The conference will also host the US/India Workshop on Computational and Data-Enabled Science & Engineering (CDSE&E), co-sponsored by the US National Science Foundation (NSF), on December 21 and 22.

INDUSTRY, RESEARCH AND USERS SYMPOSIUM

The symposium will bring together providers and users of HPC to provide a forum for presenting the state of-the-art in HPC platforms and technologies, for discussing best practices and for exchanging experiences. This two-day symposium, to be held on Monday, December 19 and Tuesday, December 20, will feature four special sessions with presentations from international experts focused on the role of HPC in Climate and Weather Modeling, Genome Sequencing, Computational Fluid Dynamics in Aerospace, and an industry led session on Cloud Computing Futures.

INDUSTRY/RESEARCH EXHIBITS

This two-day exhibition session, to be held on Monday, December 19 and Tuesday, December 20, will consist of exhibits/presentations from vendor companies and R&D laboratories.

CONFERENCE REGISTRATION

Conference registration includes admission to all workshops and technical sessions and a copy of the HiPC 2011 proceedings. The early registration deadline for discounted fees is November 16. International attendees are advised to start the process for their registration and application for a travel visa as soon as possible. Visit the conference website for further details.

INFORMATION FOR INDIA-BASED PARTICIPANTS

Registration at reduced rates is made possible for India-based faculty, students, and researchers through sponsorships from India-based industries and organizations. Travel scholarships for India-based students are available on a merit basis to promote HPC research in India.

SPONSORSHIP OPPORTUNITIES

The HiPC conference is sponsored by several Indian and international organizations, institutions, and companies. For sponsorship opportunities, contact the Industry Co-Chairs at industry@hipc.org.

For further details, visit the conference website at www.hipc.org.

CONFERENCE ORGANIZATION

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