

Call for Papers

The 7th International Workshop on Big Data in Cloud Performance (DCPerf'17)

Atlanta, GA, USA, May 1, 2017

http://infocom2017.ieee-infocom.org/workshop/dcperf-big-data-and-cloud-performance

Cloud data centers are the backbone infrastructure for tomorrow's information technology. Their advantages are efficient resource provisioning and low operational costs for supporting a wide range of computing needs, be it in business, scientific or mobile/pervasive environments. Because of the rapid growth in user-defined and user-generated applications and content, the range of services provided at data centers will expand tremendously and unpredictably. Particularly, big data applications and services, e.g., social, environmental sensing and IoT monitoring, present a unique class of challenges in Cloud. The high volume of mixed workloads and the diversity of services offered render the performance optimization of data centers ever more challenging. Moreover, important optimization criteria, such as scalability, reliability, manageability, power efficiency, area density, and operating costs, are often conflicting to some extent and require trade-off. In addition, the increasing mobility of users across geographically distributed areas adds another dimension to optimizing big data and cloud performance.

The goal of this workshop is to promote a community-wide discussion to find and identify suitable strategies to enable effective and scalable performance optimizations. We are looking for papers that present new techniques, introduce new theory and methodologies, propose new research directions, or discuss strategies for resolving open performance problems on big data in clouds.

Topics of interest include (but are not limited to)

- Big data applications and services
 - o Social/environmental/IoT sensing
 - o Programing paradigm
 - o Platforms
 - o Empirical studies
- Data center systems
 - o Novel architectures
 - o Resource allocation
 - Content distribution
 - o Evaluation/modeling methodology

- Big data and cloud performance
 - Cost/pricing design
 - o Power/energy management
 - o Reliability/dependability
 - o Performance evaluation/modeling
- Big data in cloud
 - o Intra/Inter communication
 - o Network protocols
 - o Security
 - o Real-time analytics

Important Dates

Paper Registration and Submission: January 17, 2017 (extended)

Notification of Acceptance: February 22, 2017 Final Manuscript Due: March 12, 2017

Submission Guideline

Manuscripts must be limited to 6 pages in IEEE 8.5x11 format. Accepted papers will be published in the combined INFOCOM 2017 Workshop proceedings and will be submitted to IEEE Xplore. Submitted papers may not have been previously published in or under consideration for publication in another journal or conference. The reviews will be single blind. Manuscripts should be submitted as PDF files via EDAS: https://edas.info/newPaper.php? c=23059&track=82666.

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