# The International Workshop of Software-Defined Data Communications and Storage (SDDCS) 2016 in conjunction with IEEE ICDCS 2016

on June 27, 2016, in Nara, Japan

http://stlab.wnlo.hust.edu.cn/csyhua/sddcs2016.htm

#### Overview

The future infrastructures of the data centers and cloud computing are becoming more software defined. Although networking infrastructures consist of communications and storage resources, they are generally studied separately. Hence, applications and platforms have to precisely define the virtual environment in which they wish to run, and the communication performance decreases because we have been ignoring the properties of storage devices. The software-defined methodology offers opportunity to bridge this gap and to deliver higher and improved performance. The SDDCS workshop provides the forum for researchers of multi-disciplinary fields: networks, systems research which spans data communications, networking, storage systems and devices, as well as the applications, to discuss and exchange idea on how to take this opportunity to bridge the performance gap.

SDDCS aims to bring together industry and academia to jointly explore recent progresses related with the potential performance bottleneck and the gap between communications and storage in the software-defined context. We particularly encourage contributions which contain highly original ideas, new approaches, and/or groundbreaking results.

#### **Topics**:

Topics of interest in SDDCS include but are not limited to:

- Software-defined communication protocols
- Software-defined storage devices
- Convergent design for communications and storage
- Non-volatile storage support for network transmission
- Storage deduplication for cloud backups
- Data collection and analytics for system

optimization

- Dynamic workload redistribution and scheduling
- Non-volatile devices in network switches
- Cross-layer coordination
- Storage virtualization in network end systems
- Security for SDDCS schemes
- Programmable interfaces for convergent design
- User studies and experiences of real-world applications

### **Submission Instructions**

Submitted papers must be no longer than 8 single-spaced 8.5" x 11" pages, including figures, tables, and references; two-column format, using 10-point type on 12-point (single-spaced) leading; and a text block 6.5" wide x 9" deep. Author names and affiliations should appear on the title page.

The submitted papers should present original theoretical and/or experimental research in any of the areas listed above that has not been previously published, accepted for publication, or is not currently under review by another conference or journal.

## **Important Dates**

Paper submission due: January 20, 2016 Notification to authors: March 5, 2016 Final paper files due: April 5, 2016

# **Workshop Organizer**

# **Steering Committee:**

Qing Yang, University of Rhode Island Hong Jiang, University of Texas at Arlington Peng-Jun Wan, Illinois Institute of Technology Xue Liu, McGill University

## **Program Co-chair:**

Yu Hua, Huazhong University of Science and Technology

John C.S. Lui, The Chinese University of Hong Kong