



## The International Workshop of Software-Defined Data Communications and Storage (SDDCS) 2015, in conjunction with IEEE INFOCOM 2015

<http://stlab.wnlo.hust.edu.cn/csyhua/sddcs2015.htm>

### Overview

The future infrastructures of data centers and cloud computing are becoming software defined. Although these infrastructures consist of both 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. The communication performance decreases due to overlook of the properties of storage devices while storage performance may also get impacted by communication system. The software-defined methodology offers an opportunity to bridge their gap and deliver high performance. The SDDCS workshop provides a multi-disciplinary forum for networks and systems research spanning data communications, networking, storage systems and devices, as well as applications.

SDDCS aims to bring together industry and academia to jointly explore recent progresses related to the potential performance bottleneck and the gap between communications and storage in the software-defined context. We particularly encourage contributions containing 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 applications

### Submission Instructions

Submitted papers must be no longer than 6 single-spaced 8.5" x 11" pages, including figures, tables, and references. The submitted papers should present original theoretical and/or experimental research 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: December 20, 2014

Notification to authors: January 20, 2015

Final paper files due: February 10, 2015

### Workshop Organizer

#### Steering Committee:

Qing Yang, University of Rhode Island

Hong Jiang, University of Nebraska-Lincoln

Peng-Jun Wan, Illinois Institute of Technology

Xue Liu, McGill University

#### Program Co-chair:

Yu Hua, Huazhong Univ. of Sci. and Tech.

Wenbo He, McGill University