

## CALL FOR PAPERS

# **Journal of Modern Power Systems and Clean Energy**

# **Special Section on Energy Storage System and Operational**

## **Flexibility in Power Systems**

The advantages of renewable generation in a broad range of environmental, economic, social and political aspects have inspired dramatic integration of renewable generation into modern power systems, including wind, solar, biomass, geothermal, and marine energies, etc. The incorporation of such volatile resources induces frequent power flow fluctuations in real-time dispatch, thus challenging the planning, operation and control practices of power systems. In this regard, new tools for managing these forms of intermittent generations as well as innovative methods for analyzing the impact of their variability on power systems are desired. Currently, building grid scale energy storage system is becoming an important practice to tackle intermittent renewable generation. However, storage devices driven by different technologies can have specific characteristics when connected to the grid.

This special section aims at addressing the challenges in renewable energy generation and power system operation, as well as opportunities brought by energy storage applications to enhance the power systems' efficiency and reliability. We invite original submissions discussing energy storage technologies and flexibility issues in power system planning, operation and stability control.

The topics of interests include, but are not limited to:

- Related technologies associated with multi-type grid scale energy storage system, such as the compressed air energy storage system, flywheel energy storage system, superconducting energy storage system, etc
- Optimal management of grid scale energy storage systems to improve the lifetime
- Planning and economic issues associated with grid scale energy storage systems integrated into power systems with high penetration of intermittent renewable generation
- Modeling and control of multi-type grid scale energy storage systems
- Efficient operation strategies with grid scale energy storage systems in supporting the integration of intermittent renewable generation with the grid
- Stability assessment and control of the power system integrated with grid scale energy storage systems
- Contribution of energy storage on providing reserve and flexibility for power system operation with high penetration of intermittent renewable generation

### **Submission Guidelines**

http://www.editorialmanager.com/mpce or link via http://www.springer.com/40565 http://www.mpce.info

The article templates can be downloaded from http://www.mpce.info

### **Important Dates**

Paper Submission Deadline: June 30, 2016

Acceptance Notification: July 1,2016- September 30, 2016

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#### **CONTACT INFORMATION**

For more information, please do not hesitate to contact

Ms. Ying ZHENG

Tel: 86 25 8109 3060; Fax: 86 25 8109 3040

Email: <u>zhengying1@sgepri.sgcc.com.cn</u>; <u>mpce@alljournals.cn</u>

## About Journal of Modern Power Systems and Clean Energy (MPCE)

MPCE sponsored by State Grid Electric Power Research Institute (SGEPRI) is open accessed, peer-reviewed and quarterly published journal in English. It is indexed in Science Citation Index Expanded (SCI-E) and Scopus. It is the first international power engineering journal originated in mainland China. MPCE publishes original papers, short letters and review articles in the field of modern power systems with focus on smart grid technology and renewable energy integration, etc. MPCE is dedicated to presenting top-level academic achievements in the fields of modern power systems and clean energy by international researchers and engineers, and endeavors to serve as a bridge between Chinese and global researchers in the power industry. It is published by SGEPRI Press and Springer-Verlag GmbH Berlin Heidelberg commencing from June, 2013.