

CALL FOR PAPERS

Journal of Modern Power Systems and Clean Energy

Special Issue on Wide Area Monitoring, Protection and Control in

Future Smart Grid

Security and stability have always attracted the major interests of power system planners, designers and engineers responsible for reliable system operation. In last two decades, a number of blackouts occurred all over the world and significantly impacted national economies, as well as the approaches for ensuring secure power delivery. The North American August 2003 blackout, as well as the recent July 2012 Indian blackout, have provoked a number of debates across the global society. The analysis of these blackouts has concluded that the traditional protection and control principles cannot prevent and cope with cascading failures and limitations of approaches based on the usage of local information without a global co-ordination of control actions. It is likely that the application of Wide Area Monitoring, Protection and Control Systems can significantly contribute to a more secure and reliable operation of future power systems, efficiently coping with a number of system changes expected in future. The development of smart grid, communication technology and Phasor Measurement Units (PMUs) provide a strong technology support for this kind of future applications. That is why it is considered that the dissemination of this kind of ideas, solutions and demonstrations is of crucial importance today.

MPCE has invited Professor Vladimir Terzija from The University of Manchester, Manchester, UK and Professor Yutian Liu from Shandong University, Jinan, China as guest Editors-In-Chief to organize a special issue on 'Wide Area Monitoring, Protection and Control in Future Smart Grid'. The special issue is aimed to discuss theoretical problems, technical challenges and hotspots, as well as practical demonstrations of novel applications. The issue is in particular dedicated to the latest novel ideas in the area of methods, tools and technologies for Wide Area Monitoring, Protection and Control.

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

- Adaptive identification and correction techniques for power system operation modes based on wide area information
- Wide area measurements supported power system dynamic security assessment
- Online stability analysis methods of power systems based on wide area information
- Wide area protection principles
- Wide area stability and control methods

- Coordination between wide area protection and wide area control applications
- Fault location and partition methods for power systems based on wide area information
- Adaptive setting techniques for wide area protection
- Information exchanging mechanisms of wide area protection and control systems
- Transmission and processing techniques of wide area measurements
- Wide area load optimization and control techniques
- Active intentional and controlled power system islanding (splitting) techniques
- Self-healing control of power systems
- Development and application of wide area monitoring, protection and control systems
- Applications of Synchronized Measurement Technology in Distribution Networks.

Submission Guidelines

http://www.editorialmanager.com/mpce or link via

http://www.springer.com/40565

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(The paper template can be downloaded from http://www.mpce.info)

Deadlines

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