SOFA 2018
8th International Workshop on Soft Computing Applications
14-15 September 2018 – Arad, Romania

Special Session: *Soft Computing & AI Techniques in Power Engineering*

Important Dates:

- Submission of full papers: 2 April, 2018;
- Notification of acceptance: 4 June, 2018;
- Submission of final paper and early payment: 30 July, 2018.

Scope:

This special session aims to bring together researchers to share, review and discuss most recent developments in Power Engineering (methods, algorithms and techniques). Hopefully, these discussions will open a debate on new opportunities and new challenges in the area, unifying the efforts toward the development of new adequate tools, protocols and databases for evaluating and monitoring the progress in area of interest.

Topics:

- **Computational intelligence methods for power engineering:** neural networks, vector support machines for energy prediction;
- **Bio-inspired optimization algorithms for power engineering:** artificial neural networks, evolutionary algorithms, swarm intelligence and their hybridizations;
- **Fuzzy multiple criteria decision-making (FMCDM) for power engineering**: fuzzy TOPSIS, AHP/ANP, fuzzy comprehensive evaluation method for energy issues;
- **Smart grids;**
- **Computational sustainability**: computational methods for a sustainable energy and environment;
- **Computational methods in energy economics:** forecasting models for energy prices, pricing models in energy policy and electrical energy marke, investment analysis models in energy projects, modeling strategic behavior for energy security, hybrid energy-economy models for energy policy simulation, statistical analysis of energy cost, energy consumption and economic growth, energy risk management, etc;
- **AI based software tools for power systems analysis and optimization**: OPF, state estimation, stability;
- **AI based transmission & distribution networks static and dynamic expansion planning**;
- **AI based FACTS devices location and sizing**;
- **Application of AI techniques for distributed generation systems and renewable sources integration**.

Publication:

- All accepted papers of SOFA 2018 will be published by Springer, Advances in Intelligent Systems and Computing (ISSN 2194-5357);
- The books of this series are submitted to ISI Proceedings, SCOPUS, EI-Compendex, DBLP, Google Scholar and Springerlink.

For more information visit: http://www.sofa2018.org/index.html

Special Session Organizers:
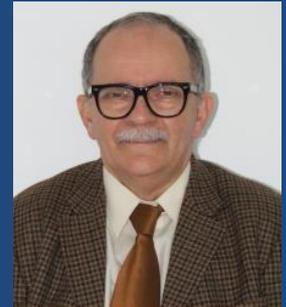
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