



**Twelfth International Conference on  
Ecological Vehicles & Renewable Energies  
EVER'2017, April 11-13, 2017, Monte-Carlo (Monaco)**

**Call for Contributions to the Special Session on  
Advances in Charging Infrastructure Systems for  
Vehicles: V2G and G2V**

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(VUB)- MOBI**

**Thematic:** Recently, there is a strong trend towards sustainable energy and mobility solutions in order to significantly reduce the greenhouse emissions. Thus, renewable energy sources (RES) (i.e. wind, solar, etc.) and electric vehicles (EVs) have received a growing interest to provide sustainable solutions towards ecological and energy-efficient systems.

In light of this growing trend, charging infrastructure systems play a key role not only in the growth of the electric vehicles, but also in the expected extension of smart (DC) grid comprising more and more renewable energy sources. In the latter, the vehicle battery system, as a Virtual Mobile Energy-Storage Plant (VMESP), could be used to improve the grid stability, power quality, reliability and to optimize the energy-efficiency thanks to vehicle-to-grid (V2G) solutions. The goal of this special session is to bring the recent ideas and insights of the worldwide research community and of the experts together into common platform in order to present and discuss the recent advances in charging infrastructure systems not only for vehicles, but also for grid systems.

Topics of interest of this special session include, but are not limited to:

- Conductive and inductive charging systems;
- New V2G and G2V concepts,
- Efficient integration of (vehicle) battery storage into renewable energy systems (i.e. PV, Wind) for smart (DC) microgrid;
- Modeling and simulation of charging systems and EVs and forecasting their demand-supply;
- Energy storage systems for vehicles and grid systems;
- Grid stability, power quality analysis and location optimization;
- Charging and discharging energy-management methods;
- Environmental and socio-economical aspects and consequences of bidirectional charging of electromobility (Life Cycle Assessment, Total Cost of Ownership, Levelised cost of energy storage);
- Business Models, value added services and barriers to implement V2G concepts.

**Submission:** Prospective authors are invited to submit comprehensive abstracts of three A4 pages each, written in English. Abstracts should be sent by e-mail to the special session organizers: [omar.hegazy@vub.ac.be](mailto:omar.hegazy@vub.ac.be) & [mmessagi@vub.ac.be](mailto:mmessagi@vub.ac.be). The outstanding papers from this SS will be selected to be published in Energies Journal: [http://www.mdpi.com/journal/energies/special\\_issues/HEV\\_2017](http://www.mdpi.com/journal/energies/special_issues/HEV_2017).

<b>Important Dates:</b>	November 01, 2016	Submission of abstracts
	December 01, 2016	Notification of Provisional acceptances
	January 05, 2017	Submission of full papers
	January 31, 2017	Notification of final acceptances