

Announcement
Special Section of the IEEE Transactions on Vehicular Technology on
Sustainable Transportation Systems

The past few decades have seen a dramatic increase in the number of vehicles being used across the globe. This has resulted in an increased demand for energy and raised serious concerns over decreasing conventional fossil-fuel based energy sources, in addition to environmental concerns. These issues have been a major driving force towards the electrification of the transportation industry for a sustainable transportation infrastructure. This special section intends to focus on state-of-the-art research and development as well as future trends in the modeling, design, control, and optimization of advanced power electronics, energy storage, motor drive, and power train systems for future electric vehicles (EV), hybrid electric vehicles (HEV), fuel cell vehicles (FCV), and plug-in hybrid electric vehicles (PHEV). In order to further promote the state-of-the-art research, the potential authors of accepted and presented high quality papers in the 7th annual IEEE Vehicle Power and Propulsion Conference (VPPC 2011) are invited to submit a paper to this Special Section. The paper submitted should offer substantial new contents over the corresponding conference paper, in terms of novelty and scientific contributions. A thorough peer review will be conducted to select top manuscripts for this special section.

Topics of interest include, but are not limited, to the following:

- Modeling, simulation, analysis, design, dynamics, stability, and control of vehicular systems;
- Novel electric machines and motor drive systems for propulsion;
- Innovative power electronic circuits, converters and inverters for advanced vehicular systems;
- Modern energy storage and management systems for PHEVs and EVs;
- Fuel cell hybrid vehicles and range extended electric vehicles with onboard fuel reformers;
- Advancements in PHEV and EV architectures;
- Smart Grid and Electrical Infrastructures for vehicle-to-grid (V2G), vehicle-to-building (V2B); vehicle-to-home (V2H).

Time Line:

Paper Submission Deadline:	December 1, 2011
First Reviews:	February 1, 2012
Revised Paper Deadline:	April 1, 2012
Second and Final Reviews:	June 1, 2012
Final Manuscripts:	August 1, 2012
Publication:	September 2012

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