

Institution of Engineering and Technology

Hybrid and Eco-Friendly Vehicles Conference

HEVC 08

IET Conference Publications 546

December 8-9, 2008
Coventry, United Kingdom

Printed from e-media with permission by:

Curran Associates, Inc.
57 Morehouse Lane
Red Hook, NY 12571
www.proceedings.com

ISBN: 978-1-60560-963-8

Some format issues inherent in the e-media version may also appear in this print version.

Copyright© (2008) by the Institution of Engineering and Technology
All rights reserved.

For permission requests, please contact the Institution of Engineering and Technology
at the address below.

Institution of Engineering and Technology
P.O. Box 96
Stevenage, Hertfordshire
U.K. SG1 2SD

Phone: 01-441-438-767-328-328
Fax: 01-441-438-767-328-375

www.theiet.org

TABLE OF CONTENTS

Affordable Hybrid Electric System for Urban Commercial Vehicle Applications, Using Advanced VRLA Battery	1
<i>C.M. Harrington, J. Marco, N.D. Vaughan, M. Kellaway, A. Cooper, A. Eastlake</i>	
H4V - Hybrid Four Wheel Drive Vehicle	9
<i>D. Charters, M. Watkinson, D. Wykes, B. Simpkin</i>	
Controlled Cooling in Hybrid Electric Vehicles	13
<i>N. Staunton, R. Maughan, V. Pickert</i>	
Generic Integrated Systems Modelling for Low Carbon, Zero Emission and Concept, Whole Vehicle, Simulation	17
<i>A.J. Allen, R. Beardmore, R. Nash</i>	
VRLA Batteries Match the Performance of NiMH Batteries in Power-assist Hybrids	25
<i>A. Cooper, P.T. Moseley</i>	
Development of a Hybrid Electric Racing Car	29
<i>S. Lambert, S. Maggs, P. Faithfull, A. Vinsome</i>	
High Speed Flywheel Based Hybrid Systems for Low Carbon Vehicles	34
<i>D. Cross, J. Hilton</i>	
A Simple Mechanical Transmission System for Hybrid Vehicles Incorporating a Flywheel	39
<i>U. Diego-Ayala, P. Martinez-Gonzalez, K.R. Pullen</i>	
Comparative Study of Rectifier Circuits for Series Hybrid Electric Vehicles	47
<i>A. Al-Busaidi, V. Pickert</i>	
Disc Motors for Automotive Applications	53
<i>M.U. Lamperth, A. Beaudet, M. Jaensch</i>	
Development of a Hybrid Electric Vehicle (HEV) Model for Interactive Customer Assessment of Sound Quality	58
<i>J. Poxon, P. Jennings, M. Allman-Ward</i>	
Hydrogen Hybrid Vehicles for University of Birmingham Campus	62
<i>K. Kendall, B. Pollet, J. Jostins</i>	
Prospects of New Energy Vehicles for China Market	65
<i>Z. Xiang, W. Jia, Y. Jianzhong, C. Zhibiao, H. Qinglin, H. Yuanzhang</i>	
Author Index	