

Mechanical Engineering and Green Manufacturing

Part 1

Edited by
Shengyi Li, Yingchun Liu, Rongbo Zhu,
Hongguang Li, Wensi Ding

Mechanical Engineering and Green Manufacturing

PART 1

Selected, peer reviewed papers from the International Conference on
Mechanical Engineering and Green Manufacturing (MEGM) 2010,
November 19-22, 2010, in Xiangtan, China

Edited by

Shengyi Li, Yingchun Liu, Rongbo Zhu,
Hongguang Li, Wensi Ding

藏 书 章

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Trans Tech Publications Ltd
Laubisrutistr. 24
CH-8712 Stafa-Zurich
Switzerland
<http://www.ttp.net>

Volumes 34-35 of
Applied Mechanics and Materials 2-vol.-set
ISSN 1660-9336

Full text available online at <http://www.scientific.net>

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PREFACE

Dear Distinguished Delegates and Guests,

International Conference on Mechanical Engineering and Green Manufacturing 2010 (MEGM 2010) was held in Hunan Institution of Engineering in Xiangtan, China, from November 19-22, 2010, serving as a platform for expertise exchange. MEGM 2010 had drawn the attention of researchers from various disciplines: Mechanical Engineering Design, Green Manufacturing Technology, Applied Mechanics, Sustainable Materials, etc.

Persons who attended the conference were engineers, scientists, managers of various companies and professors of the universities abroad and home. There were a very large number of paper submissions (941) this year. All submissions were reviewed by at least two Program or Technical Committee members or external reviewers. It was extremely difficult to select the presentations for the conference because there were so many excellent and interesting submissions. In order to allocate as many papers as possible and keep the high quality of the conference, we finally decided to accept 390 papers, which have been accepted for presentation at the conference and will be published by TTP, in Applied Mechanics and Materials (AMM) Journal (ISSN: 1660-9336), and is online available in full text via the platform www.scientific.net. AMM should be indexed by EI according the previous TTP index results. We believe that all of these papers and topics not only provided novel ideas, new results, work in progress and state-of-the-art techniques in this field, but also stimulated the future research activities in the area of mechanical engineering and green manufacturing.

There is one keynote speech. The keynote speech is kindly provided by Professor G. Meng (Shanghai Jiao Tong University, China), on field of "Rotor dynamics of rotating machinery", "Vibration theory and vibration control", "Intelligent mechanical, structural and control". He is internationally recognized experts in his research fields, who have demonstrated outstanding proficiency and have achieved distinction in their profession.

We express our special gratitude to all the members of the General Committee Chairs, Program Committee Chairs, Technical Program Committee and Steering Committee who worked so hard to prepare the conference and who supported the conference so professionally.

Our deep thanks also go to the sponsors: National Natural Science Foundation of China, Shanghai Jiao Tong University, South China University of Technology, National University of Defense Technology, Central South University (CSU), Hunan University, Xiangtan University, Hunan University of Science and Technology, Hunan Institute of Engineering as was as the organizers: Hunan Institute of Engineering, Hunan University of Science and Technology and Trans tech publications inc. their kind support in making MEGM 2010 possible.

Finally, we would like to thanks all the authors, speakers and participants of this conference for taking part in and contributing to the International Conference on Mechanical Engineering and Green Manufacturing 2010.

We hope you have a unique, rewarding and enjoyable week at MEGM 2010 in Xiangtan.

With our warmest regards,

MEGM2010 Organizing Committees

November 19-22, 2010

Xiangtan, China

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