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Foreword

This special issue of Materials Science Forum is dedicated to a selection of papers presented at MATERIAIS 2007 - 13th Conference of Sociedade Portuguesa de Materiais, IV International Materials Conference Symposium - A Materials Science Forum: *“Global Materials for the XXI Century: Challenges to Academia and Industry”*.

From the 600 papers presented at the Conference, 450 remained for the review procedure according to Materials Science Forum rules and 200 were finally selected for publication. In this issue, the papers are integrated in chapters according to the type of materials, its application, characterization or simulation. The number of papers per chapter is as follows:

- Chapter 1 - Biomaterials (19 papers)
- Chapter 2 - Ceramics (16 papers)
- Chapter 3 - Composite Materials (15 papers)
- Chapter 4 - Electronic, Magnetic and Photonic Materials (20 papers)
- Chapter 5 - Metals and Alloys (17 papers)
- Chapter 6 - Nano and Microstructural Materials (12 papers)
- Chapter 7 - Polymers (17 papers)
- Chapter 8 - Paper, Textiles, Wood and Cork (7 papers)
- Chapter 9 - Smart Materials (6 papers)
- Chapter 10 - Advances in Materials Characterization (7 papers)
- Chapter 11 - Materials and Processing Modelling (9 papers)
- Chapter 12 - Recycling (10 papers)
- Chapter 13 - Surfaces, Interfaces and Membranes (12 papers)
- Chapter 14 - Materials for Civil Engineering Applications (12 papers)
- Chapter 15 - Materials for Energy Production, Transport, Storage and Mechanical Engineering Applications (14 papers)
- Chapter 16 - Foresight, Materials and Art, Generic (7 papers)

This Special Issue covers a wide range of Materials and Applications, presenting updated information regarding the challenges for materials, as well as a contribution to a better understanding of materials behaviour and characterization.

The Editors wish to thank all the authors and reviewers for their contributions to the success of this Special Issue.

The Editors

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