Preface

This special issue presents the research results and engineering developments in the area of silicon carbide semiconductor materials for power electronics and the latest composite and polymer materials for machinery and textile production.

Composite materials and structures for machinery applications such as crashworthiness structures in vehicles, bio-reinforced structural composite materials, special polymer fibres for textile production and analysing of the sensing capability of the armchair nanotube are topics of the first two chapters.

The modern issues in the area of the use of silicon carbide metal oxide semiconductor materials in the development of recent power electronic devices based on them are analysed and investigated in the last chapter.

The special edition will be useful to engineers whose activity is related to research and developments in the area of power electronics and modern composite and polymer materials.