

Preface

This special edition includes articles that reflected the latest research results in materials science, materials processing and geochemistry.

The first chapter contains the research results on parametric optimisation of processes of aluminium alloy friction stir welding and drilling of aluminium matrix composites. The results of computer modelling of the influence of crystal lattice friction stress on the dislocation annihilation process are also presented here.

The second section is devoted mainly to the investigation of hybrid metal-organic frameworks from the position of their application in opto- and microelectronics and also as supercapacitor material. The synthesis method and study of spectral properties of red-emitting phosphor material are also presented in this section.

The last chapter presents some studies in the field of geochemistry of dam sediments and modified diatomite.

The special issue will be helpful to many specialists in applied materials science and engineering chemistry.