

# Preface

## Conference Nanophysics and Nanomaterials NaN-2019

The Conference Nanophysics and Nanomaterials was held in St Petersburg, Russia, on 27-28 November 2019. The event was organized by St Petersburg Mining University, one of the most famous and the oldest technical university in Russia. The Mining University often referred to as the museum university for empire aesthetics of its buildings and its brilliant historical background. Today the Mining University is Eastern Europe leading academic institution in such fields of engineering as mineralogy, mining and geology.

The conference on Nanophysics and Nanomaterials is the newly established event that specifically dedicated to the discussion of novel approaches in material science and geoscience. The most impressive discussion this year was on applications of coating and surface modification technologies for making alloys to be used in mechanical and mining engineering. However, a decent number of quality studies in nanophysics were also presented.

The full list of the conference topic consists of

- nanopowders and nanostructured materials,
- alloys and metals enhancement,
- composite materials design and synthesis,
- nanomineralogy,
- physical and chemical methods of study modern materials and natural minerals,
- applied nanophysics,
- environmental application of nanophysics.

All the papers submitted to the conference were evaluated by the editors and reviewed by two external referees. Only the most valuable manuscripts among the materials related studies were selected into the volume. All qualified research items have a significant result that would be of interest for academics who expertise in such fields as materials science and geoscience. The results introduced in the papers on material science topic are practically applicable and should be useful for mechanical engineers and mining equipment designers.

We hope that you find this book useful!

**With the best regards,**  
*Editorial Board*