

PREFACE TO THE FIRST ISSUE OF THE “COPERNICAN LETTERS”

The title “Copernican letters” is related to Nicolaus Copernicus, the best known Polish “Renaissance Men” and patron of our Alma Mater, who was interested not only in Astronomy, but also in Law, Economy, Medicine and fortification Architecture.

The first issue of “Copernican Letters” contains the graduate students reports on biology, chemistry, physics, technology and life sciences, which are the part of their original research towards Ph. D. degree. The annual book is edited in order to promote the achievements of Ph. D. students in their efforts to complete this stage of academic carrier. Because majority of Ph. D. students research is in the new areas of science or focused on new subjects, hence the need for fast publication of the results is expected. Publication in the renown journals is difficult when preliminary results are presented, therefore this annual reports are printed. The purpose of this publication is to present results from various areas of research, from different fields and using appropriate research methods. Therefore the report gives the opportunity for the young reader to compare the various ways of solving scientific problems. The new ideas and solutions from biology, chemistry, physics, technology and life sciences presented in this book can inspire the young researcher to find a solution of their problems using new research methods. Such approach nowadays is rare, due to the reverse tendency to publish only specialized articles. Therefore the content of the book should be useful for Ph. D. students, who besides the publishing can extend their knowledge in different areas of science. Manuscripts are grouped in the chapters with similar or common areas of research.

All manuscripts were reviewed and technically corrected by the editors in order to achieve best possible scientific level. The editors wish to acknowledge the reviewer who provide the references for the manuscripts and Nicolaus Copernicus University Foundation “Amicus Universitatis Nicolai Copernici” for the financial support.

The Editors