

## PREFACE

The volume you have in your hands is the Book of Abstracts of the XIX Congress of the Carpathian-Balkan Geological Association, known as CBGA 2010 (Thessaloniki, Greece, 23-26 September 2010). Being one of the largest in the long-lasting series of CBGA Congresses, CBGA 2010 offered the authors the choice of a dual submission mode: either full papers (published after peer reviewing) or abstracts. This allowed for greater flexibility from part of the authors as they more easily adjust their presentation and publication needs.

The contents of the Book of Abstracts include both the stand-alone abstracts and the abstracts of the submitted full papers. They are ordered alphabetically based on the first author's surname. The Editors have edited the text of certain abstracts, either for clarity, or to comply with the requirements set by the Organizing Committee. In any case though, the meaning has not been changed and the final outcome is the respective authors' responsibility.

In total, 540 abstracts are published in this volume, including 3 of invited speakers that gave a plenary talk to all delegates. Of those, 130 correspond to full papers and 410 to stand-alone abstracts. Authors come from tens of countries, including the 14 CBGA countries, Eastern and Western Europe, Turkey, but also from countries far away from the geographical core of CBGA, such as Japan, U.S.A., Canada, New Zealand, Australia, etc. The total number of contributing authors has exceeded 1,400 researchers.

The presentations in CBGA 2010 cover nearly the whole spectrum of Earth and Environmental Sciences including Geophysics and Meteorology/Climatology as well as some related disciplines.

We all know that Earth operates as a constantly changing complex, dynamic system which, however, has not yet been fully understood. The Earth system comprises a lot of interdependent components that interact in complex ways. Planet Earth is changing in all spatial and temporal scales. Our Planet has been investigated in many respects and a huge amount of knowledge, both basic and applied, has been accumulated. However, much more has to be done. The understanding of our Planet system and its reaction to natural and anthropogenic changes must be of predominance concern. Water shortage, environment protection, mineral resources, climate changes, natural hazards, and the Earth's origin and evolution are some of the priorities. The XIX CBGA Congress hopes to contribute with its works towards this direction.

The Organizing Committee CBGA 2010 is grateful to the editing team of *Geologica Balcanica* (Sofia, Bulgaria), one of the official journals of CBGA, as well as the Geological Institute of the Bulgarian Academy of Sciences for the publication of this volume and would like to thank all participants and sponsors that made the XIX Congress of the Carpathian-Balkan Geological Association such an exciting meeting.

The President of the Organizing Committee would like to express his gratitude and his sincere thanks to all members of the Organizing Committee and the team of post-graduate and graduate students of the School of Geology of the Aristotle University of Thessaloniki, for the excellent organization of the Congress which was the result of a hard, systematic and conscientious work.

On behalf of the Organizing Committee  
Prof. Georgios Christofides  
CBGA 2010 President

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## **Abstracts of invited talks**