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Cartography from Pole to Pole

Selected Contributions to the XXVIth International Conference of the ICA, Dresden 2013

Springer
Preface

The theme of the 26th International Cartographic Conference, “Cartography from Pole to Pole”, illustrates the global importance of cartography in the analysis and presentation of spatial- and time-related issues. Many hundreds of years ago cartography may have had an impact on selected groups of a society only, it has, however, gradually and undisputedly evolved into something indispensable for the majority of mankind a long time ago. We might even speak of something indispensable on a nearly every-day basis.

Through the monitoring of an astonishing range of phenomena on earth from ground, from air and from space is obviously needed to react on natural dynamics and anthropogenous changes of environment to assess the impact of new technologies and economic activities on a globalised planet, geo-data are produced and recorded in an incredible volume. But spatial patterns cannot be understood as lists and tables of numeric data. It may be a commonplace for cartographers, however, only the knowledge, techniques and skills, which cartography has developed over its long history, will master the important step from data to understandable information. Cartographic products are ubiquitous nowadays, on paper, but even more so in the Internet. Cartography is the discipline which is concerned that these presentations will be more than colourful graphics. Contributions from more than 70 countries to the Dresden ICC conference clearly document that there exists a wide field of research, a strong demand for education, for practical realisation and for a dialogue with the users of cartographic products. The cartographic community will certainly do their best to accept this challenge and keep reporting on the progress.

By now it is the second time after the 25th International Cartographic Conference (ICC) 2011 in Paris that on the occasion of this biannual world congress for cartography a volume of the renowned Springer Lecture Notes on Geoinformation and Cartography (LNGC) is published. The Local Organising Committee (LOC) of the 26th ICC in Dresden, and in particular the editors of both the Digital ICC Proceedings and the Springer LNGC Volumes are proud, that out of approximately 820 entries submitted for this event the authors of some 170, who had right from the beginning written full-length papers, were obviously interested in having their typescripts published there.
Finally, a total of 34 have been selected for this book, based on a double-blind reviewing process organised by the LOC and coordinated by the ICA Commission Chairs. Around 180 international experts in certain thematic areas took up the major load of evaluating the abstract and full paper submissions. Those who have been concerned with the papers published in this book are listed right after this preface.

The articles were finally grouped into the 9 parts starting with Cartographic Applications, followed by Cartographic Tools, Generalisation and Update Propagation, Higher Dimensional Visualisation and Augmented Reality, Planetary Mapping Issues, Cartography and Environmental Modelling, User Generated Content and Spatial Data Infrastructure, Use and Usability, concluding with Cartography and GIS in Education. Since the book series of the Springer LNGC volumes have been experiencing a high international reputation, we can only hope that the papers published therein will be read by a multitude of not only cartographers.

It is the editors’ pleasure to express their gratitude to Juliane Hermann, Daniel Horn, Peter Klengler, Steffi Sharma and Peggy Thiemt, all Dresden, for their support in the time-critical production of this volume. Without the experience of Agata Oelschläger from Springer Heidelberg, however, we would certainly not have succeeded to finalise this volume in due time. Many thanks go also to her.

Dresden, Summer 2013

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