Preface

This volume contains the proceedings of MPC 2002, the sixth international conference on the Mathematics of Program Construction. This series of conferences aims to promote the development of mathematical principles and techniques that are demonstrably useful and usable in the process of constructing computer programs (whether implemented in hardware or software). The focus is on techniques that combine precision with conciseness, enabling programs to be constructed by formal calculation. Within this theme, the scope of the series is very diverse, including programming methodology, program specification and transformation, programming paradigms, programming calculi, and programming language semantics.

The quality of the papers submitted to the conference was in general very high, and the number of submissions was comparable to that for the previous conference. Each paper was referred by at least four, and often more, committee members.

In addition to the 11 papers selected for presentation by the program committee, this volume contains three invited talks: Implementing Algebraic Dynamic Programming in the Functional and the Imperative Programming Paradigm by Robert Giegerich (Technical University of Bielefeld, Germany), and abstracts of Some Results in Dynamic Model Theory by Dexter Kozen (Cornell University, USA) and Mathematics in Computer Science Curricula by Jeannette Wing (Carnegie Mellon University, USA).

The conference took place in Dagstuhl, Germany. The previous five conferences were held in 1989 in Twente, The Netherlands, in 1992 in Oxford, United Kingdom, in 1995 in Kloster Irsee, Germany, in 1998 in Marstrand near Göteborg in Sweden, and in 2000 in Ponte de Lima, Portugal. The proceedings of these conferences were published as LNCS 375, 669, 947, 1422, and 1837, respectively.

Three international events were co-located with the conference: the IFIP WG2.1 working conference on *Generic Programming*, the third workshop on *Constructive Methods for Parallel Programming*, and the workshop on *Types in Programming*. We thank the organizers of these events for their interest in sharing the atmosphere of the conference.

May 2002 Eerke Boiten Bernhard Möller

Acknowledgments

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Sponsoring Institutions

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Deutsche Forschungsgemeinschaft University of Augsburg, Germany University of Kent at Canterbury, UK

External Referees

All submitted papers were reviewed by members of the program committee and a number of external referees, who produced extensive review reports and without whose work the conference would lose its quality status. To the best of our knowledge the list below is accurate. We apologize for any omissions or inaccuracies.

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