Program Chairs Preface

Dear Colleagues,

We are pleased to welcome you to PDP 2007, the Fifteenth Euromicro Conference on Parallel, Distributed and Network-based Processing. The international Euromicro Conference series on PDP is one of the most relevant conference series on all the aspects of parallel and distributed computing in Europe and we are honoured to serve as Program Chairs of its 15th edition, organized by the Naples branch of the Institute for High Performance Computing and Networking (ICAR) of the Italian National Research Council (CNR), together with the University of Naples “Parthenope” and with the Department of Mathematics and the Faculty of Sciences of the Second University of Naples.

The Conference is intended to provide a framework where ideas, approaches and methods can be confronted and compared in the perspective of recent developments in the area of parallel and distributed computing, from advances in scientific, engineering and business applications to new proposals in programming and problem solving environments, models, languages and architectures. The Program Committee has selected 56 full presentations and 12 short presentations out of a total of 105 submissions coming from 24 countries in Europe, Asia, North and South America. Each paper has been given at least three reviews provided by the Program Committee members or the Special Session Committee members and by additional referees who contributed to raise the quality of the Conference Program. Two distinguished researchers have been invited to give a plenary talk during the conference: Dr. Mike Heroux, from Sandia National Laboratories (USA), on recent advances in high-performance numerical software for scientific and engineering applications, and Prof. Domenico Talia, from University of Calabria (Italy), on recent perspectives in grid computing for science.

The Conference Program includes six regular Sessions addressed to well-established topics within the scope of PDP 2007 and six Special Sessions focused on particularly active fields in the area of parallel and distributed computing. It is our firm belief that all the contributions do provide novel ideas and results, giving a comprehensive vision on the current state-of-the art and a cross-section of the work actually in progress in high-quality research.

We wish to express our gratefulness to the people whose contribution made for the good outcome of the Conference's fifteenth edition: authors, members of the Program and Special Session Committees, and reviewers as well. PDP 2007 is mainly the result of their dedicated work. We also thank Andrea Clematis, Chair of the Euromicro Technical Committee on “Parallel and Distributed Processing”, who invited us to chair PDP 2007, as well as the Euromicro staff people for their availability and helpful advice. A particular credit is due to the Organizing Committee for the hard work done in handling all the tasks carried out to attain an enjoyable conference. We acknowledge the support of the Department of Agricultural Engineering and Agronomy of the University of Naples “Federico II”, for giving us the opportunity of hosting the conference in the Congress Centre “Federico II”. Finally, we would like to thank the corporate sponsors of the Conference, namely AMD and STMicroelectronics.

We hope that all the participants to PDP 2007 find an interesting and rewarding Conference and enjoy their stay in Naples.

Pasqua D'Ambra and Mario Rosario Guarracino
February 2007