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Object Technologies for Advanced Software

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Preface

This volume is the Proceedings of the International Symposium on Object Technologies for Advanced Software (ISOTAS). Currently object technologies are attracting much attention in diverse areas of research and development for advanced software. Object-oriented programming holds great promise in reducing the complexity of large scale software development, and recent research in this field opens up new paradigms for parallel and reflective computing. Object-oriented databases are expected to serve as a model for next-generation database systems, by overcoming the limitations of conventional data models. Furthermore, recent research in software object bases is aimed at developing a uniform approach to the management of software artifacts produced in the software development process, such as specifications, manuals, programs, and test data, which traditionally were managed in a very ad hoc and arbitrary manner.

Active research and experimentation on object technologies in these diverse areas suggest that there are some underlying, fundamental principles common to a wide range of software development activities. The first of the JSSST (Japanese Society for Software Science and Technology) international series of symposia focuses on this topic. The aim of this symposium is to bring together leading researchers in the areas of object-oriented programming, object-oriented databases, and software object bases. We hope to promote an understanding of object technologies in a wider context and to make progress towards the goal of finding better frameworks for future advanced software development.

The Program Committee received 92 submissions from 18 different countries in Europe, America, Asia, and Australia (including 31 domestic submissions). Each submission was reviewed by at least three members of the Program Committee and sometimes by external referees. This volume contains 25 contributed papers and 6 invited papers presented at the symposium. The contributed papers were selected by a highly competitive process, based on referee reports and painstaking deliberations by members of the Program Committee.

We would like to thank all the people who made the symposium possible, including the object technology researchers who submit their works to this symposium and all those who contributed their expertise and time in reviewing the submissions.

August 1993

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