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Ambient Intelligence

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Preface

This volume of the LNCS is the formal proceedings of the 2nd European Symposium on Ambient Intelligence, EUSAI 2004. This event was held on November 8–10, 2004 at the Eindhoven University of Technology, in Eindhoven, the Netherlands.

EUSAI 2004 followed a successful first event in 2003, organized by Philips Research. This turned out to be a timely initiative that created a forum for bringing together European researchers, working on different disciplines all contributing towards the human-centric technological vision of ambient intelligence. Compared to conferences working on similar and overlapping fields, the first EUSAI was characterized by a strong industrial focus reflected in the program committee and the content of the program. As program chairs of EUSAI 2004 we tried to preserve the character for this event and its combined focus on the four major thematic areas: ubiquitous computing, context awareness, intelligence, and natural interaction. Further, we tried to make EUSAI 2004 grow into a full-fledged double-track conference, with surrounding events like tutorials and specialized workshops, a poster and demonstration exhibition and a student design competition. The conference program included three invited keynotes, Ted Selker from MIT, Tom Rodden from the University of Nottingham and Tom Erickson from IBM.

Out of 90 paper submissions received for the conference, 36 were selected for inclusion in this volume. Papers were submitted anonymously and 3–5 anonymous reviewers reviewed each. The review committee included experts from each of the four thematic areas mentioned above representing both academia and industry. The four program co-chairs made the final selection of papers for the proceedings. In this process, special attention was devoted to divergent reviews that arose from the multidisciplinary nature of this emerging field. We are very confident of the rigor and high standard of this review process that safeguarded the quality of the final proceedings and ensured fairness to the contributing authors.

The papers in this volume are clustered into four groups:

- ubiquitous computing: software architectures, communication and distribution.
- context sensing and machine perception,
- algorithms and ontologies for learning and adaptation,
- human computer interaction in ambient intelligence.

We hope the result of this collective effort shall be rewarding for readers. We wish to thank all authors who submitted their articles to EUSAI and especially the authors of the selected papers for their efforts in improving their papers according to the reviews they received in preparation of this volume. We thank the members of the review committee for their hard work and expert input and especially for responding so well when their workload exceeded our original expectations.

We gratefully acknowledge the support by the JFS Schouten School for Research in User System Interaction, the Department of Industrial Design at TU/e, IOP-MMI Senter, the Royal Dutch Academy of Arts and Sciences (KNAW), Philips and Océ.

We wish to thank all those who supported the organization of EUSAI 2004 and who worked hard to make it a success. Specifically, we thank Harm van Essen, Elise van de Hoven, Evelien Perik, Natalia Romero, Andres Lucero and Franka van

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Neerven for their work and commitment in organizing, publicizing and running this event. We thank also the special category co-chairs Wijnand IJsselsteijn, Gerd Kortuem, Ian McClelland, Kristof van Laerhoven and Boris de Ruyter. We note here that an adjunct proceedings including extended abstracts for posters, tutorials, demonstrations and workshops was published separately.

Closing this preface, we wish to express our hope that this volume provides a useful reference for researchers in the field and that our efforts to make EUSAI 2004 possible contributed to the building of a community of researchers from industry and academia that will pursue research in the field of ambient intelligence.

Eindhoven August 2004 Panos Markopoulos Berry Eggen Emile Aarts James Crowley

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