

Seventh International Bi-Conference Workshop on Agent-Oriented Information Systems (AOIS-2005)

In Conjunction with ER2005, October 24-28, Klagenfurt, Austria

Call for papers

Note: Submission Deadline extended to June 20

Agent concepts hold great promise for responding to the new realities of active information systems. They offer higher level abstractions and mechanisms which address issues such as knowledge representation and reasoning, communication, coordination, cooperation among heterogeneous and autonomous parties, perception, commitments, goals, beliefs, intentions, etc. On the one hand, the concrete implementation of these concepts can lead to advanced functionalities, e.g., in inference-based query answering, transaction control, adaptive workflows, brokering and integration of disparate information sources, and automated communication processes. On the other hand, their rich representational capabilities allow more faithful and flexible treatments of complex organizational processes, leading to more effective requirements analysis and architectural and detailed design. The workshop will focus on how agent concepts and techniques will contribute to meeting information systems needs today and tomorrow.

The workshop encourages submissions on all topics related to AOIS, including (but not limited to) the following:

- * agent-oriented modeling and design methods
- * models and architectures for agent-oriented/active information systems
- * novel information system technologies based on software agents
- * agent-oriented requirements engineering
- * agents and knowledge management
- * agent-oriented approaches to data integration
- * agent-based workflow modeling
- * agent orientation and e-services/web services
- * agent orientation in web information systems
- * agent-oriented enterprise and business process modeling
- * agent communication languages for business communication
- * ontologies and agents
- * managing trust and reputation
- * automated business-to-business interaction (including negotiation and contracting)

Special Track on: Agent-Oriented Methodologies and Conceptual Modeling

Following the tradition of previous AOIS workshops, AOIS at ER-2005 will include a special track on a narrowly focused topic, which, for this edition, will be: "Agent-Oriented Methodologies and Conceptual Modeling", in response to the need to be fundamentally focused on the modeling principles of agent-orientation.

Agent Orientation (AO) has emerged, in the last years, as an interesting paradigm to deal with real world abstraction and organization representation, since it allows for a better

understanding and communication of the users' requirements, the design artefacts, the system architecture, and the final information system implementation, deployment, and usage evaluation. The privileged link between concepts from real organizations (where actors and objectives play the primary role) and design and implementation elements (based on agents and goals, as well) makes of AO a favourable tool to foster communication between technology experts and stakeholders. Several Agent-Oriented Requirements and Software Engineering Methodologies (such as i*, AAIL, Gaia, MaSE, Message/UML, OPEN/Agent, PASSI, Prometheus, AORML, Tropos and REF, among others), and their embedded modeling languages, rely on this capability, to propose approaches which deal with the difficult process of IS development ---from requirements elicitation to system deployment--- aimed at having a higher level of uniformity, manageability, understandability and acceptability than traditional component based on OO approaches. To this end, the proposed conceptual modeling languages need to appropriately incorporate the very notions of agent, role, goal, task and the like. This is accomplished either by extending OO notions or by introducing somehow specialized or ad-hoc representations.

The aim of this special track is to promote a deeper understanding of the agent-based conceptual notions and the impact they have on conceptual modeling languages and methods adopted by or created for Agent-Oriented Methodologies. Papers on conceptualization and representation of agent notions, on ontological description of agent-oriented modeling, on technical issues raised by agent modeling related languages definition, management and processing, on agent modeling languages and processes meta-modeling are sought. As well, comparisons, along these lines, among the different approaches in the AO community as well as with the more traditional OO conceptual modeling mainstream are welcome.

Submission

Papers should be limited to 10 pages, Springer LNCS format (<http://www.springer.de/comp/lncs/authors.html>). Accepted papers will be published as part of the ER2005 Workshop volume, planned for publication by Springer in their LNCS series and distributed during the workshop.

Paper submission is by emailing a PDF file to aois@itc.it. The deadline for receiving papers is 20 June 2005 (extended deadline). We also ask authors to notify the workshop organizers of their intention to submit by emailing a title, list of authors, and an abstract to aois@itc.it. Notification of intention to submit should be received by 15 June 2005.

Similarly to AOIS 04 and AOIS 03, there are also plans to propose the best papers of the AOIS @ ER2005 workshop for publication (after revision and additional refereeing) in a specific LNCS volume together with papers from AOIS @ AAMAS 05. For these post-proceedings, authors of selected papers will be invited to extend their papers, which will be re-reviewed for the LNCS publication.

Papers for the special track (*Agent-Oriented Methodologies and Conceptual Modeling*) should be clearly identified.

Important Dates

Abstract, title, and authors due: 15 June 2005
Paper submission due: 20 June 2005
Notification of Acceptance: 25 July 2005
Camera Ready papers due: 15 August 2005

Co-Chairs:

Manuel Kolp
IAG/ISYS - Information Systems Research Unit
University of Louvain
Email: kolp@isys.ucl.ac.be

Paolo Bresciani
Institute for Scientific and Technological Research (IRST)
Trento, Italy
Email: bresciani@itc.it

Steering Committee

Yves Lesperance, York University, Canada
Gerd Wagner, Eindhoven University of Technology, The Netherlands
Eric Yu, University of Toronto, Canada
Paolo Giorgini, University of Trento, Italy

Program Committee

C. Bernon (University Paul Sabatier, Toulouse, France)
B. Blake (Georgetown University Washington, DC, USA)
P. Bresciani (ITC-irst, Italy)
J. Castro (Federal University of Pernambuco, Brazil)
L. Cernuzzi (Univ. Católica Nuestra Señora de la Asunción, Paraguay)
M. Cossentino (ICAR-CNR, Palermo, Italy)
L. Cysneiros (York University, Toronto)
J. Debenham (University of Technology, Sydney)
S. DeLoach (Kansas State University, USA)
F. Dignum (Univ. of Utrecht, Netherlands)
P. Donzelli (University of Maryland, College Park, USA)
B. Espinasse (Domaine Universitaire de Saint-Jérôme, France)
S. Faulkner (University of Namur, Belgium)
B.H. Far (U. Calgary, Canada)
I.A. Ferguson (B2B Machines, USA)
A. Garcia (PUC Rio)
C. Ghidini (ITC-irst, Italy)
A.K. Ghose (Univ. of Wollongong, Australia)
M.-P. Gleizes (University Paul Sabatier, Toulouse, France)
C. Gonzalez-Perez (University of Technology, Sydney, Australia)
G. Guizzardi (University of Twente, The Netherlands)
I. Hawryszkiewicz (University of Technology, Sydney, Australia)
B. Henderson-Sellers (University of Technology, Sydney, Australia)

C. Iglesias (Technical University of Madrid, Spain)
M. Kolp (Université catholique de Louvain, Belgium)
D.E. O'Leary (Univ. of Southern California, USA)
C. Li (University of Technology, Sydney, Australia)
C. Lucena (PUC Rio, Brazil)
G. Low (UNSW, Australia)
Ph. Massonet (CETIC, Belgium)
H. Mouratidis (University of East London, UK)
J.P. Mueller (Siemens, Germany)
J. Pavón (Universidad Complutense Madrid, Spain)
O. F. Rana (Cardiff University, UK)
O. Shehory (IBM Haifa Labs, Israel)
N. Szirbik (Technische Universiteit Eindhoven, The Netherlands)
K. Taveter (VTT Information Technology, Finland/Univ. Melbourne, Australia)
N. Tran (UNSW, Australia)
V. Torres da Silva (PUC Rio, Brazil)
M. Winikoff (RMIT, Australia)
C. Woo (Univ. British Columbia, Canada)
B. Yu (North Carolina State University, USA)
A. Zeid (American University of Cairo, Egypt)
Z. Zhang (Deakin University, Australia)