



## Guest Editorial: 7th Ibero-American Workshop in Multi-Agent Systems (Iberagents 2008)

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Since 1994, the Iberagents workshop provides a discussion forum to the Ibero-American community on Multi-agent systems. The seventh Ibero-American Workshop in Multi-Agent Systems, has been organised as a part of the eleventh IBERAMIA conference, in Lisbon, on October 2008, in a close collaboration between LabMAG/University of Lisbon and the Grasia Research Group at Universidad Complutense de Madrid. This time the workshop has been structured along three working sessions, with the purpose of analysing different aspects that contribute to the application of agent technology, taking into account the degree of maturity of the discipline nowadays, which is represented by the contributions of the participants.

The first session, *Theories and Architectures*, started by considering several issues on the fundamentals of agent technology. Some of them are quite general, looking at the relevance of specific characteristics of agents in the conception of distributed intelligent systems. In this sense, there were contributions related with the contribution of agents to improve software engineering practices. Other works provide insight on how agents can contribute to modelling real complex systems: Is it possible to study emergent behaviour of real systems by modelling as multi-agent systems?

The second session was devoted to *Applications*. The purpose was to analyse at which point there is more than prototypes by using agent technology. The agent paradigm, because of intentional and social characteristics, is appropriate to solve coordination problems involving heterogeneous parties. In this line, all the works presented highly collaborative systems in different settings: video conferencing, airport management, and crisis management.

The third session, *Mechanisms*, provided insight on techniques associated to multiagent systems, this year looking especially at those issues that are derived from the social nature of multi-agent systems. Along those lines, the notion of adaptivity is very important, and the presentations emphasised it through several different approaches: auctions, topologies, local interactions, reputation and trust.

Although there were no definitive conclusions, the diversity of works and points of view shows, as in previous editions, the increased interest of this area in the research community in Iberoamerica and at international level. It is clear the need to integrate results from diverse areas such as software engineering, distributed computing and artificial intelligence. At the same time, it is necessary to consider multi-disciplinary approaches by integrating results from other sciences such as Sociology, Psychology, Economics or Biology.

The workshop programme was completely integrated within IBERAMIA, covering a full day of the conference. Fifteen papers were submitted to the workshop, each one receiving three or four reviews, either from the Workshop's Programme Committee members or by their appointment. From these papers, twelve were selected and presented at the workshop. This special issue publishes six representative papers that have been selected in a sec-

ond review after the workshop. We would like to thank all Programme Committee members, as well as all of the reviewers, who took upon most of the burden in reviewing the papers enabling their accurate evaluation. Finally, we would like to thank all the authors who submitted their work to the workshop and those attending it, contributing together to the success of Iberagents 2008.

The organising committee:

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