



ISACS 2013

6th International Symposium on Attention in Cognitive Systems

In conjunction with International Joint Conference on Artificial Intelligence (IJCAI 2013)



Beijing, China

August 3-5, 2013

Call for Papers - Dates

Full Paper Submission: April 20, 2013

Acceptance Notification: May 20, 2013

Final Paper Submission: May 30, 2013

Workshop Day: August 3-5, 2013, TBD

isacs2013.joanneum.at

The Symposium

The capacity to attend to the relevant has been part of Artificial Intelligence (AI) systems since the early days of the discipline. Currently, with respect to the design and computational modelling of artificial cognitive systems, selective attention has again become a focus of research, and one sees it important for the organization of behaviours, for control and interfacing between sensory and cognitive information processing, and for the understanding of individual and social cognition in humanoid artefacts. One may consider selective attention as part of the core of artificial cognitive systems. Within the context of the engineering domain, the development of enabling technologies such as autonomous robotic systems, miniaturized mobile - even wearable - sensors, and ambient intelligence systems involves the real-time analysis of enormous quantities of data. These data have to be processed in an intelligent way to provide "on time delivery" of the required relevant information. Knowledge has to be applied about what needs to be attended to, and when, and what to do in a meaningful sequence, in correspondence with visual feedback.

Suggested symposium topics include, but are not limited to:

- Computational architectures for attention
- Modelling of visual and auditory attention
- Biologically inspired attention
- Attention in robotic / mobile / wearable systems
- Aspects of attention in cognitive psychology, neuroscience, and philosophy
- Attention and control of machine vision processes
- Performance measures for attention enabled artificial systems
- Applications of machine attention

Objectives

The goal of this symposium is to provide an international forum to examine computational methods of attention in cognitive systems from an interdisciplinary viewpoint, with the focus on computer vision in relation to robotics, psychology, and neuroscience.

Organisers

Lucas Paletta Joanneum Research, Graz, Austria lucas.paletta@joanneum.at

Laurent Itti University of Southern California, CA, USA itti@pollux.usc.edu

Björn Schuller Technische Universität München, Germany schuller@tum.de

Fang Fang Peking University, China xrsh@pku.edu.cn

Program Committee

Minoru Asada University of Osaka, Japan

Christian Balkenius Lund University, Sweden

Anna Belardinelli University of Tübingen, Germany

Ali Borji University of Southern California, CA, USA

James J. Clark McGill University, Toronto, Canada

Ralf Engbert University of Potsdam, Germany

Fang Fang Peking University, China

Simone Frintrop University of Bonn, Germany

Horst-Michael Gross Tech. Univ. Ilmenau, Germany

Dietmar Heinke University of Birmingham, UK

Laurent Itti University of Southern California, CA; USA

Ilona Kovacs Université Paris Descartes, France

Eileen Kowler Rutgers University, NJ, USA

Minho Lee Kyungpook National Univ., South Korea

Michael Lindenbaum Technion, IIT, Israel

David Melcher University of Trento, Italy

Giorgio Metta Italian Institute of Technology, Italy

Lucas Paletta Joanneum Research, Austria

Fiora Pirri University of Rome, La Sapienza, Italy

Ron Rensink Univ. of British Columbia, BC, Canada

Erich Rome Fraunhofer IAIS, Germany

Albert Rothenstein York University, Toronto, Canada

Björn Schuller Techn. Univ. München, Germany

Jochen Triesch Frankfurt IAS, Germany

Yizhou Wang Peking University, China

Hezy Yeshurun University of Tel Aviv, Israel

Chen Yu University of Indiana, IN, USA

Authors

Between **10** (short) and **14** (long) **pages** Springer – style blind paper submission is handled via easychair.

Springer LNAI publication in terms of post-conference proceedings of selected, revised and invited papers.

The **ISACS Best Paper Award**, funded by SMI, will be given to the best paper submission.