



5th International UJI Robotics School

IURS-2005

“Robotics and Neuroscience”

<http://www.robot.uji.es/research/events/iurs05/>

September, 19-23, 2005

Bonaire Hotel, Benicàssim, Spain

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Programme

Main topics of the school will be:

- Sensorimotor transformations:
 - Perception and Sensor Fusion
 - Motor Control
 - Vision-guided Manipulation and Grasping
- Hybrid bionic systems:
 - Non-invasive Brain-Robot Interfaces
 - Invasive Brain-Robot
 - Neuroprosthetics
- Neural correlates of cognitive functions
 - Perceptual-motor systems
 - Imitation and social robots
 - The neural mirror system

Call for Participation

For the 5th edition of its well-known summer school, the Robotic Intelligence Lab at Jaume-I University, in collaboration with the Imperial College London (UK) and Duke University (USA), organizes a tutorial on the interplay between the research fields of robotics and neuroscience.

The school instructors are leading world experts in neuroscience and robotics, who also have experience in past and present cross-disciplinary projects involving partners from technology and life sciences:

- Melvyn Goodale (Univ. Western Ontario, Canada)
- Paolo Dario (Scuola Superiore Sant'Anna, Italy)
- John Hallam (University of Southern Denmark)
- Luciano Fadiga (Università di Ferrara, Italy)
- Joseph McIntyre (College de France)
- Andrew H. Fagg (University of Oklahoma, USA)
- Luc Berthouze (Neuroscience Res. Inst., Japan)

Aims and scope

Recent progress in biologically-inspired robotics suggests that the interplay between robotic research and the current understanding of the neural mechanisms underlying the behavior of living organisms is a very promising track to be followed.

According to this trend, the school will provide to an audience with an engineering or computer science background the basic insights about cognition in living organisms and the neural mechanisms that may be instrumental in solving problems in robotics.

Students will have a unique training opportunity in this emergent and fast-evolving domain, closely interacting for one week with some of the top-level researchers in the world in this field, as well as with fellow students. Life sciences students with technical interests are more than welcome.

Organization

The school will take place in a cosy hotel on the Mediterranean coast for one complete week September 19-23.

Attendance is limited to 40 students. Registration fee is 300 euros, covering course material, accommodation and meals.

The official language of the school is English.

