

# Research Assistant Position Available

The Intelligent Systems Laboratory at the School of Computer Science and Software Engineering is accepting expressions of interest from highly motivated computer science and engineering students, from second year and above, to undertake a paid position as Research Assistant during the 2007 - 2008 Summer.

## Skills required:

1. Candidates must be able to design, build and program a prototype of an electronic device. This device includes a camera, microprocessors, sensors, and advanced motion sensing and wireless communication modules.
2. Computer programming skills for the development of a user interface and of algorithms to gather the data acquired by the device and display it in 2D and 3D will be highly regarded.

## Period of employment:

This position is available immediately and it is estimated that the project will be finished within two months.

## The project:

The first stage of this project, which has been completed, concentrated on the development, construction and deployment of a wireless communication and control system of a mobile localization platform. The current stage concentrates on the development of a robust localisation system that combines data acquired by means of several displacement, orientation and positioning sensing techniques and makes use of the most recent wireless technologies and protocols. This system must work efficiently under very adverse situations (e.g. when the sensor platform is under the rubble of a collapsed building where steel and other construction materials render communications practically unusable)

## The research team:

The successful candidate will be part of a team comprising two other researchers under the direction of Dr. Jo Abrantes.

## Project outcomes:

This research project has an immediate application in the localisation of victims under collapsed structures in a project pioneered by an international NGO. This is amenable to the publication of several research papers.

## Salary:

The salary will be the University of Wollongong Casual Rate 3 (\$25.67 per hour)

## How to apply:

Send your CV and a letter addressing the required skills listed in this advertisement to Dr Jo Abrantes ([jo@uow.edu.au](mailto:jo@uow.edu.au)).

If you require further information email Dr Abrantes or contact her on 4221 3872.