



Welcome to the third VICOROB-UdG<sup>TEAM</sup> Newsletter. We are two months before the competition and the hardware of our AUV prototype is almost ready. During next weeks the software architecture of the system is going to be updated and a first version of the control architecture is going to be tested at the water tank.

#### Who is Who?

**Emili Hernàndez** is a Computer Engineer who is starting his phd. in Information Technologies at the University of Girona. He is the developer of the NEPTUNE AUV simulator. In the SAUC-E project, he is responsible of the software integration as well as the hardware in the loop simulator being used for the simulation of the ICTINEU<sup>AUV</sup>

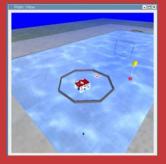
#### News

- o VICOROB-UdG<sup>TEAM</sup> will lecture a conference, about the SAUCE project, in the award wining ceremony for the research projects of high school students.
- Campus33, a documental about universities, covers the SAUCE project and presents VICOROB-UdG<sup>TEAM</sup>. The video can be downloaded from <a href="http://eia.udg.es/sauce/files/campus33.avi">http://eia.udg.es/sauce/files/campus33.avi</a>.

# 1st Water Tank Test

ICTINEU<sup>AUV</sup> went through it first wet test. The thrusters were driven directly from a power source and no electronics were onboard. The next test including all the electronics is scheduled for second week of June. The new computers donated by EUROTECH are being installed with robot software system and will be integrated soon.





### **Tools: NEPTUNE**

NEPTUNE is hardware in the loop simulator which allows for the simulation of multiple AUVs. It uses the hydrodynamic equation of motion of the robot to simulate the movement which results from the force exerted by the thrusters. NEPTUNE can simulate sensors like a camera, a DVL, a compass, an echosounder, or an imaging sonar. With this tool, it is possible to develop the software to be used in the prototype before it is ready to be deployed.

# **Sponsor of the Month**

During these months we have received the support of two new sponsors: Diputació de Girona and Patronat EPS. We also want to thanks AvC for lending us, temporally, an industrial PC104 board. To all of them thanks for believe in our project!



























