AMT-Newsletter February 2012

1. Underwater Fuel Cell System with Hydrogen/H_2O_2

The VEM cooperation project with the partners AMT Analysenmesstechnik GmbH, ATI Küste GmbH, Enitech Energietechnik Elektronik GmbH, LIKAT, MET GmbH, INP and TU Berlin was supported by the German Ministry BMBF under contract No. 03F0466A-G. The aim of this project was to develop an Underwater Fuel Cell system with hydrogen as fuel and hydrogen peroxide as oxidant. In the meantime this prototype of an underwater fuel cell system was tested for 8 weeks in the Baltic Sea near the German coast in order to demonstrate the working principle as a first step. For this purpose a small system was selected with low output power and small fuel and oxidant amounts. At the moment there are some further improvements in development like more cells, the extension of the electrode surface and other fuels.

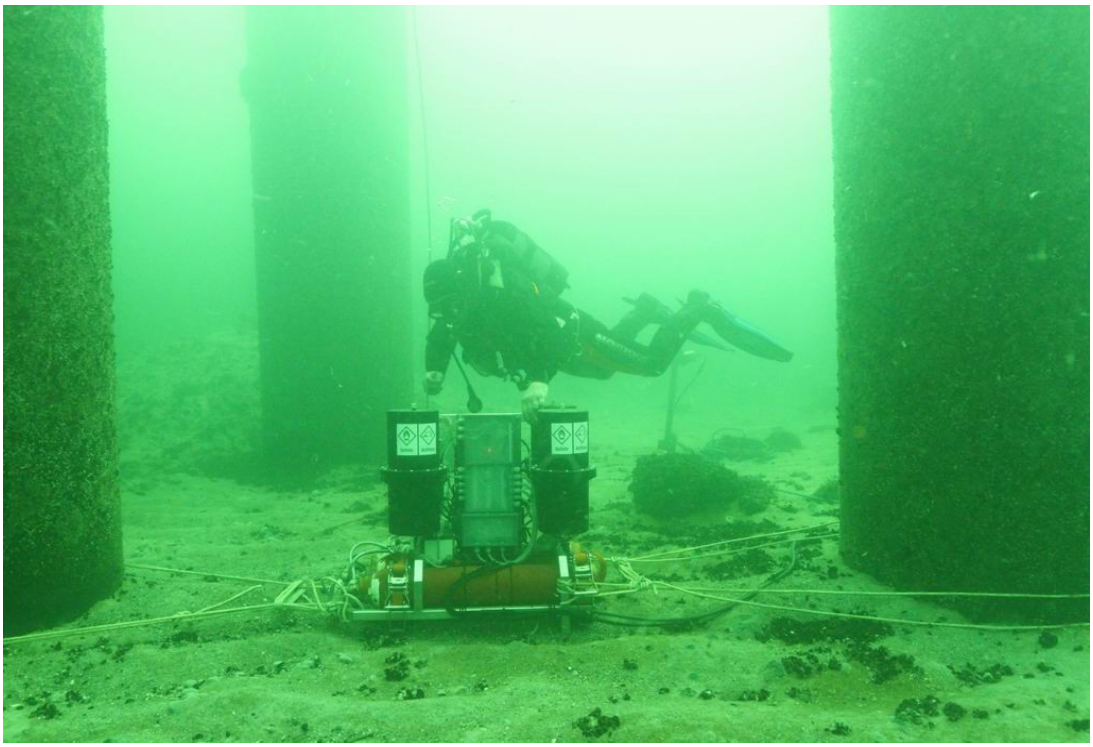

Fig. 1: Fuel cell system in the artificial reef Nienhagen in the Baltic Sea in July 2011.

2. Oceanology International 2012

AMT Analysenmesstechnik GmbH is exhibiting at the Oceanology International Exhibition 2012 taking place from 13-15 March 2012 in London, ExCeL. AMT is sharing the booth 300 with ASD Senstortechnik GmbH.

AMT Analysenmesstechnik GmbH will show OEM-underwater sensors, electrochemical measuring and calibration devices for the use in laboratory, industry, research and development and for environmental monitoring. As a reliable partner for probe manufacturing companies, AMT is interested in making new contacts in this business field. Furthermore AMT is a manufacturer of underwater fuel cell stacks and will show some new development results.

3. New project started for a liquid-liquid fuel cell for underwater use

AMT Analysenmeßtechnik GmbH has started a new cooperation project for the development of a new underwater liquid-liquid fuel cell stack supported by the local Minsitry of Economics of Mecklenburg-West Pomerania. Partners of this project are the Leibniz Institute for Plasma Science and Technology and the Leibniz Institute for Catalysis at the University of Rostock. This project will be finished in December 2013.