



Analog 16-hydrophone vertical line array for the Acoustic Oceanographic Buoy - AOB

F. Zabel, fredz@wireless.com.pt

C. Martins, cvmartins@ualg.pt

A.J. Silva, asilva@ualg.pt

SiPLAB - FCT, University of Algarve
Campus de Gambelas,
PT-8005-139 Faro, Portugal

Comments: download file ([cintal rep](#))

Ref.: SiPLAB Report 03/06, FCT, University of Algarve, 2006.

Abstract:

This report contains the user guide and the system reference for the analog 16-hydrophone AOB vertical line array. The array is a 67.5m long cable with 16 4m-spaced hydrophones and 17 digital thermistor sensors, distributed along its length. Each module has a dedicated preamplifier to increase signal strength at the hydrophone output and drive a balanced line to transmit the signal to the surface buoy's electronics. The thermistor sensors are digital devices that transmit the temperatures values through a 1-wire digital serial bus. This report presents the system user guide and the system reference guide. The user guide has instructions for system deployment, everyday usage and maintenance. The system reference guide is intended for specialized technicians for system repairing and/or upgrade.

ACKNOWLEDGMENT: this work was partially supported by projects RADAR (POCTI/CTA/47719/2002) and UAB (POCI/MAR/59008/2004) from FCT, Portugal.