

Challenging 6G Demo



Sonardyne's 6G (Sixth Generation) acoustic positioning technology was demonstrated to industry professionals during in-water demonstrations in Stonehaven Harbour on the east coast of Scotland. For three days last week, a Long BaseLine (LBL) positioning network of six Compatt 6 transponders was set up against the walls of the harbour, in depths of as little as two metres. A Dunker 6 LBL and telemetry transceiver was then used to perform an array calibration and collect acoustic range data.

Chief surveyors, project managers and equipment rental specialists were able to get hands-on with 6G by controlling the system from a demonstration vehicle set up on the

quayside.

The event was organised to showcase 6G's speed and reliability in a simulated offshore scenario. Harbour environments like Stonehaven are a difficult place to demonstrate acoustics. Very shallow water, high walls and noise from vessels coming and going, present major causes of signal interference that conventional acoustic positioning systems struggle to overcome.

6G equipment uses Sonardyne's Wideband 2 digital ranging and telemetry protocols. This makes any acoustic positioning system operating with new technology, significantly more reliable and easier to operate thereby minimising operational risk, saving vessel time and reducing training requirements for offshore personnel.

In addition to the LBL demonstration, an overview of Autonomous Monitoring Transponder (AMT) technology was provided. A unit was deployed within the harbour, logging temperature and depth at regular intervals throughout the week. "Monitor" software was utilised to configure, command and recover the data set for analysis.