



## **NUCLEAR SUBMARINE**

In October 2013, MCL were invited to tender for a pipe freeze on a nuclear submarine in dry dock. A freeze isolation was to be achieved within tight physical constraints and held for between two and three weeks.

At short notice, MCL fabricated a temperature control system and pipe freeze jacket to allow the freeze to be monitored and controlled from outside the boat, once the equipment had been installed. Extensive equipment testing and pressure testing of a freeze isolation was conducted prior to site mobilisation.

The freeze was maintained for a period of 5 weeks, considerably longer than originally planned, maintained by a three man support team, twenty four hours a day, without any problems. MCL believe that this duration, holding a freeze, could be a record on a submarine.



**We welcome evaluating your application and advising on the most suitable process for pipework isolation.**

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