

Marine HydraWrap (Carbon Fiber Reinforced Polymer)

Project

Helix Energy Solutions Group
Mobile Offshore Drilling Unit (MODU) Quantum 4000
No 5 Main Generator Cooling Water Pipe Repair

Installer

MODU Quantum 4000 personnel

Engineered Solution

Marine HydraWrap - (1) 4" Elbow Kit

Substrate

Carbon Steel

Installation

October 2009

The Challenge

A pipe failure onboard the MODU Quantum 4000 occurred on the No. 5 main generator cooling water system. The leak caused by corrosion occurred on a carbon steel 4" SCH 80 short radius flanged elbow which is part of the salt water discharge from a titanium plate heat exchanger. The system pressure is 40PSIG (2.75 bar) and temperature is 105°F (40°C).

The Solution

The Chief Engineer was made aware of Marine HydraWrap, which is Design Approved by the American Bureau of Shipping for shipboard piping repairs. A 4" Marine HydraWrap elbow kit was ordered, the surface prepared and the product was applied according to directions.

The crew was pleased with how well the product was packaged and how easy the directions were to follow for application. The repaired piping has been in operation and leak free for over a month and was critical in preventing downtime.



HydraWrap