

Belzona Repairs and Protects the Sea Strainer

ID: 9685

Industry: Marine
Application: SOS-Ships and Offshore Structures

Customer Location: Seattle Washington
Application Date: March 2019

Substrate: Carbon steel
Products: Belzona 1111 (Super Metal), Belzona 1321 (Ceramic S-Metal)

Problem

The two sea strainers had heavy erosion/corrosion including metal loss and holes between chambers.



Original condition, note the light passing through into the inner chamber through heavy corrosion.



Applying the Belzona 1321 inside the sea strainer.



Belzona 1321 applied to the internal chamber lid.



Sea strainer application complete.

Application Situation

The sea strainer is designed to strain sea water to remove all objects to allow the use of sea water to cool the engine of the ship. This was a one-time design that utilized the hull of the ship as the bottom of the sea strainer. When erosion and corrosion was discovered inside the sea strainer, including on the section utilizing the hull, the customer required a reliable repair, and cutting the hull open and designing a new sea strainer that did not include the hull was not an option for many reasons including the need to get back to sea to resume operations and the cost of the dry dock. Since Belzona materials have been used over and over in many places on this vessel, Belzona was called in to consult on the situation and the Belzona solution was chosen.

Application Method

Grit blasting to the standards set forth in the instructions for use, washed thoroughly with acetone, and then the first coat of Belzona 1321 was applied by brush. Belzona 1111 was applied to repair the eroded damage and areas of deep pitting before the second coat of Belzona 1321 was applied by brush.

Belzona Facts

This repair was completed in just a couple of days working within the overcoat window of the Belzona 1321. This quick turnaround allowed the sea strainer to be put back together sooner than was originally planned. This Belzona solution did not require any extra time or specialized tools and gave the customer an improved repair with better protection than it had originally.

For more examples of Belzona Know - How In Action, please visit <https://khia.belzona.com>

ISO 9001:2015
FS 695214
ISO 14001:2015
EMS 695213

Belzona products are
manufactured under an ISO
9000 Registered Quality
Management System.

www.belzona.com


BELZONA[®]
Repair • Protect • Improve

Copyright © Belzona International Limited 2025