



Large mild steel pipe racks

Case study #2

Progress
Engineering
Limited

t 01208 261210

Bespoke machining
and fabrication

Fabricating large pipe racks for maritime use proved PEL's capacity in terms of workspace and heavy lifting. More importantly, the quality of its work met the most stringent of independent testing standards.



Seacore and PEL

Fugro Seacore designs, fabricates and operates offshore drilling platforms and other specialist solutions, all over the world, for the marine construction, renewables, oil, gas and mining industries.

While many of its structures are manufactured in-house, the company often turns to PEL to provide extra capacity. High levels of skill and certification in welding, together with extensive knowledge in other aspects of metal fabrication, place PEL in an ideal position to meet the stringent DNV approval standards demanded internationally for this work.

The challenge

When asked to produce two of Seacore's R140 pipe racks, which are built to support offshore pipework, there was no complex design to follow. The carbon steel structure in this case was quite simple, but the challenge lay in its size and weight.

Each rack measured approximately 4 x 4 x 2.5 metres and weighed between 8 and 10 tonnes. The individual uprights, with 8-inch channels, each weighed over a tonne.

The solution

In addition to a team of qualified welders, fabrication of the racks required use of PEL's heavy lifting gear, including an overhead crane and a rail-mounted bogie, as well as plenty of space.

On completion, the two large racks were moved via rails to the loading area and loaded onto a Seacore lorry using a hired mobile crane.

"We always feel very confident in passing work to PEL. Its expertise in fabricating with mild steel is beyond doubt – and is backed by rigorous independent inspection of the final products. We can also count on PEL to administer projects efficiently and to respond positively to any request."

Steve White, Technical Buyer, Fugro Seacore

The results

"Before leaving our premises the fabrications had to be independently inspected and tested," says PEL Managing Director David Cottam. "Reliability and safety are crucial in maritime and offshore structures, for obvious reasons, so everything we make for Seacore has to have all welds NDT tested before it can be released."



Coded welders, with up-to-date certification, ensure a very high standard of work.



Each upright is about four metres high and weighs over a tonne.