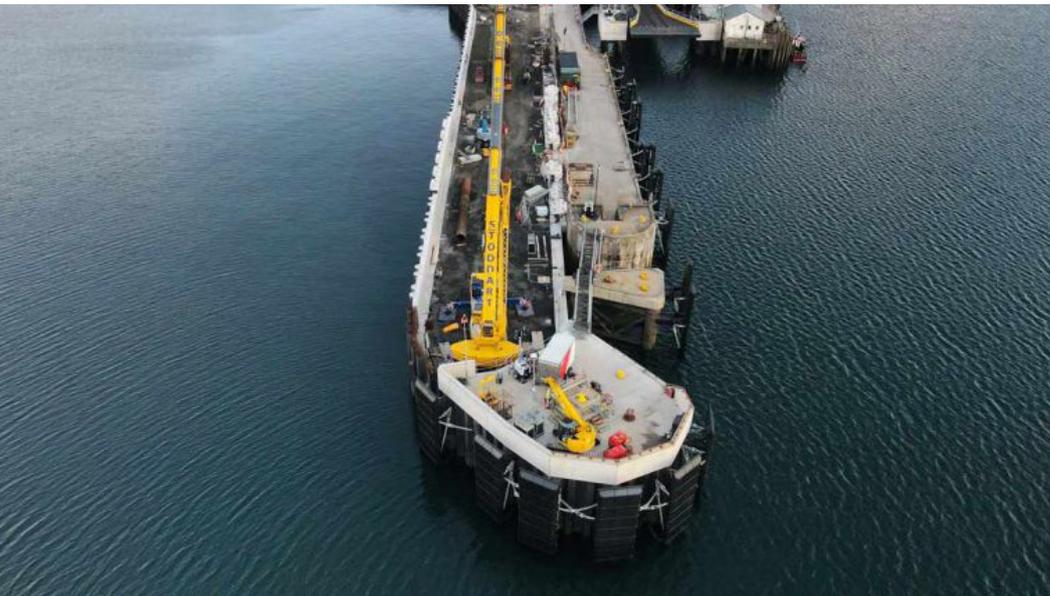


## Fender System Modernization

Ferry Terminal Uig, Isle of Skye, United Kingdom



### Application

Ferry & RoRo Terminals

### Type

SPC Cone Fenders

**Date** 2024

**Reference** 0178

## A CLOSER LOOK AT THE CASE

The Uig Ferry Terminal, a key gateway for Western Isles ferry services, underwent a major modernization. The improvements included strengthening the berthing structure, expanding the marshalling area, replacing the linkspan, repairing and widening the approach road, adding a new waiting shelter and conducting dredging and utilities works. The **modernization made the port a more efficient and resilient travel hub**, benefiting both the region's economy and the local community. The contractor company RJ McLeod **phased the project to reduce local disruption**. In close collaboration with them, we designed and delivered a custom solution comprising 7 sets of Double Cone Fender Systems, each with two Cone Fenders (SPC 1100, G2.3) and a large closed-box panel (9080x3000 mm), 8 sets of Element Fender Systems (FE 1000x1000 G2.8), and 7 sets of Element Fender Systems (FE 100xL1150, G2.9). The project scope also included 18 Horn Bollards with various load capacities.

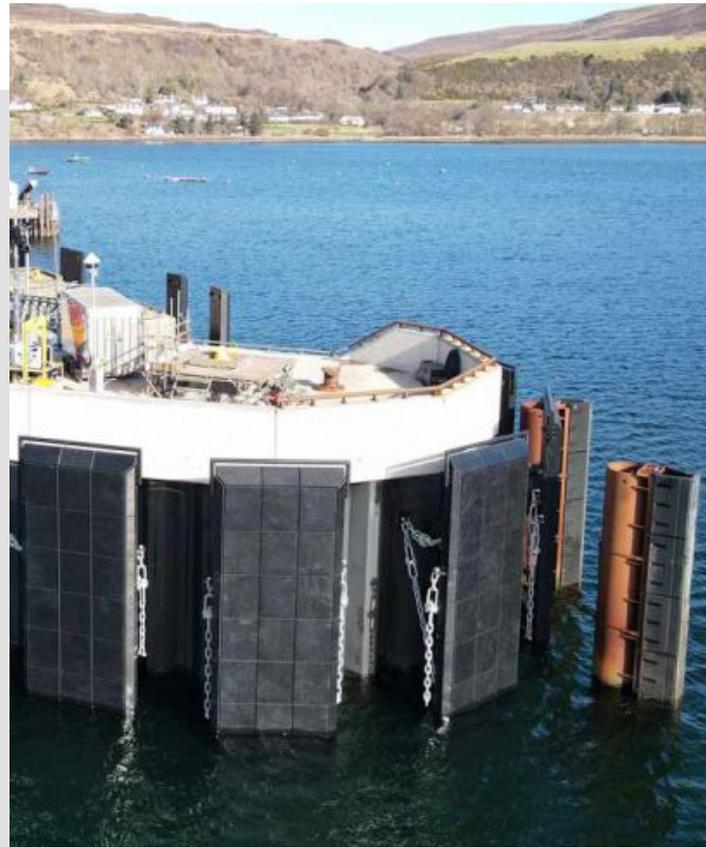
### Project Scope

- ▶ 7 Double Cone Fender Systems (2 Cone Fenders (SPC 1100, G2.3) and 1 closed box panel (9080x3000 mm))
- ▶ 8 Element Fenders Systems (FE 1000x1000 G2.8)
- ▶ 7 Element Fender Systems (FE 100xL1150, G2.9) with pile jackets and steel panels

## CHALLENGE AND SOLUTION

The area's tidal range, which varies from 4.2 meters to 1.6 meters during neap tides, significantly influenced the fender system design. Our in-house engineering team **customized 9-meter-high panels to ensure consistent energy absorption and optimal performance**, regardless of sea level fluctuations. Shear chains were also incorporated to provide stability and reliable side berthing at the pierhead.

Additionally, due to the challenging conditions on the Isle of Skye, our engineering experts tailored the design to streamline the fender installation process. **Pile jackets allowed all fender components to be prefabricated onto a tubular pile**, which could then be easily positioned over the driven pile in the seabed, eliminating the need for welding after pile driving.



Ferry Terminal Uig | Isle of Skye | United Kingdom

The modernization of the Uig Ferry Terminal provide a **safer and enhanced experience for all ferry and harbor users**. This project is yet **another example of ShibataFenderTeam's signature holistic approach**, which we have long advocated and is now officially endorsed by the new PIANC Fender Guidelines 2024.

The custom-built 7 Double Cone Fender Systems and 15 Element Fender Systems, along with significantly large panels, accommodate the increasing demand for ferry travel between the Western Islands. Explore more SFT Case Studies or Contact Your Nearest Office.

