

BERTLING PRESS RELEASE

Addressed To	All Target Media
Release Date	For Immediate Release

Bertling Logistics ships a massive 909-tonne Intervention Tower from Middlesbrough to Singapore

Sub-headline: A tailor-made in-house technical engineering solution for a successful project shipment from start to end

<u>Middlesbrough UK – 23.12.2022 –</u> Beyond general project forwarding. This is a story of a tailored engineered solution developed together with the client's engineering team and led by the engineering team of Bertling Logistics. With the great teamwork of all parties involved, Bertling Logistics delivered a safe, practical, cost-effective heavy-lift transport solution.

In the autumn of 2019, Bertling Logistics started with the client FTAI Ocean to discuss the transportation of the Intervention Tower in the north of England. This new Smart Tower System will facilitate integrated riser-less and riser-based well intervention operations on FTAI Ocean's flagship DP3 Well Intervention Vessel the PRIDE.

The developed solution was to transport the massive tower from UK to Singapore for installation onto the PRIDE.

To find the best technical and commercial solution, Bertling Logistics performed a study for all possible shipment modes, including heavy lift vessels, gearless vessels with shore/floating cranes, and ro-ro vessels.

The Tower located at Port Clarence on the river Tees in Middlesbrough, near to the home of Bertling Logistics' Heavy-Lift and Engineering Team. The two known operational limitations for the location were available draught alongside the yard and a headroom restriction downstream in the form of the historic Tees Transporter Bridge.

Addressing these two issues; to pass under the bridge, the Tower had to be stowed inside the hull of the HL vessel and to mitigate the draught issue, the Tower would need to be "lightered" by barge across the river to alongside the HL vessel where much deeper draught was available at the Port of Middlesbrough.

Bertling Logistics advised the best method of jacking the Tower up to SPMT height, a challenging task for a structure of almost 1,000Te and over 40m high.

4 x 500Te capacity perpetual climbing jacks were proposed, and Bertling Logistics provided design assistance to allow the retrofitting of the required jacking lugs that would ultimately allow the insertion of the SPMT's beneath the Tower to allow it to be site moved to quay edge.



The selected vessel type had an open dock hull arrangement. Although width-restricted in the hold by the aft vessel crane, a stowage plan was agreed upon

During discussions between Bertling Logistics and the Harbour Master, safe passage under the Transporter Bridge at a certain tide height was confirmed as feasible and suitable draught and tidal curves were confirmed to be available during neap tides on six days per calendar month.

Additional OOG cargo had been added to the scope of Bertling, which include the transportation to their Middlesbrough base and stowage of general cargo into $20 \times SOC$'s as well as loading 5 x items of additional OOG cargo.

On 18/10/22, the OOG cargo was loaded using vessel's gear alongside the berth at Port Clarence and the vessel laid by at Port of Middlesbrough overnight. On 19/10/22, the Towerwas ro-ro loaded to the vessel and following 10% securing having been applied to the Tower, the vessel relocated to Port of Middlesbrough to complete sea fastening and load the containerised cargo.

On the evening of 22/10/22, the vessel sailed, passing under the Transporter Bridge with just over 1.0m clearance. Due to the height of the tower close monitoring of the sea passages and weather routing have been required to keep the acceleration forces in with the design parameters of the tower. Following passage via Suez Canal, Indian Ocean, and strait of Malacca's, it arrived in Singapore on 20/11/22 after 28 days of ocean passage.

In preparation for the loadout, the Singapore-based engineering team from Bertling Logistics prepared the required installation of an elevated ramp on the shipyard quay and spacer barges to mitigate the limited draught at the receiving jetty.

On 24/11/22, the Tower was successfully reloaded onto SPMT trailers and rolled out of the vessel on the yard.

The transportation project was completed because of careful planning and cooperation between Bertling Logistics' Heavy-Lift & Engineering Team and key first-class subcontractors.



ABOUT FTAI OCEAN

FTAI OCEAN is a wholly owned subsidiary of FTAI AVIATION LTD (NASDAQ: FTAI). FTAI owns and maintains commercial jet engines. FTAI owns and leases jet aircraft which often facilitates the acquisition of engines at attractive prices. FTAI owns and operates DP2 and DP3 Subsea construction vessels.

FTAI Ocean provides vessel-based well intervention, well enhancement, plug & abandonment, and well-related subsea services to the offshore Oil & Gas industry. FTAI Ocean delivers world-class operational performance providing safe, professional, and cost-effective solutions for our clients. Experienced project management, highly skilled subsea and well intervention engineers, industry-proven equipment and techniques that can carry our Riser and Riser-less Well Intervention in up to 1500m of water depths.

http://ftaiocean.com/

ABOUT BERTLING

Bertling was founded in Germany more than 157 years ago and has since then developed from a local chartering and ship-owning business to a globally recognized logistics and shipping company offering complex project freight forwarding, GFF and resupply transport solutions as well as worldwide leading ship-owning, chartering and brokerage services to its global clients. Bertling's value add in-house IT services encompass state-of-the art transport management tools, real-time tracking/tracing, reporting and overall digitalization solutions to build sustainable, highly visible and efficiently-run supply-chains for transports and projects of any scale.

Working with an international network of 50 offices in 30 countries and dedicated partners plus 700 logistics employees, Bertling is ideally positioned to provide end-to-end turnkey logistics and shipping services to the power generation, oil & gas, mining & construction, infrastructure, renewables and petrochemical industry. To Bertling's highly specialized logistics services also belong Bertling Enviro, Bertling Bulk Liquids, Bertling Class 1 and Bertling Trucking solutions.

https://www.bertling.com/

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Picture description: All pictures were taking in the Port of Middlesbrough showing Bertling Logistics' in-house Engineering Team supervising the ro-ro operations of the Tower System onto the heavy-lift vessel until successful passage of the Tees Transporter Bridge - a stunning operation that attracted both local press and spectators



Bertling Press Release Pic 21.12 (3)

