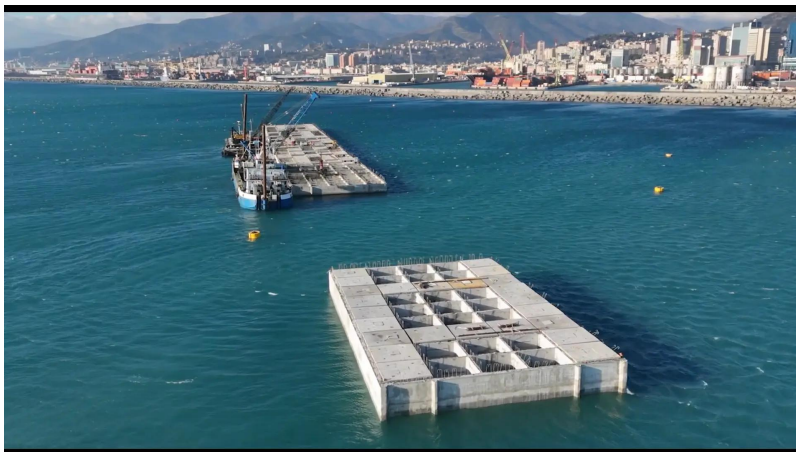


New Breakwater: sixth caisson installed in place

20 January 2025



The installation of the sixth caisson of Genoa's new open-sea breakwater has been completed. A team of over 400 people are working on the project, including 150 offshore.

The reinforced-concrete cellular box, built in Vado Ligure's floating dock, has been successfully aligned with the others which are already in position to form the future 6,200-metre breakwater. At 10,000 tons and 30 metres high, the caisson was towed by the tugboat Gianemilio to the Genoa-Sampierdarena basin and has been set on the solid underwater base, composed of a sequence of giant gravel columns sunk into the seabed. To date, 17,800 columns have been installed to enhance the stability of the breakwater's foundation. The process is conducted with the aid of a fleet of six vibroflots, advanced hydraulically driven vibratory tools for ground compaction, operated by specialised personnel using cranes up to 100 metres high. Plans underway to accelerate the construction works in progress call for the deployment of an additional two units.

Commissioned by the Western Ligurian Sea Port Authority, the new open-sea breakwater will play a vital role in the local, Italian and European economy. Co-funded by the government, with resources released by the PNRR (National Recovery and Resilience Plan) Complementary Fund, the breakwater has been designed to improve accessibility by sea to the Port of Genoa and to consolidate the strategic position of the port as a modern logistics platform serving the North Sea-Rhine-Mediterranean corridor of the TEN-T Trans-European network. Genoa's New Breakwater, a unique sophisticated feat of engineering, will replace the existing structure further out at sea, to ensure safe access to the port on the part of the ultra-large vessels which require wider navigation channels and turning basins.