

POWER BARGE POSEIDON 60 MW

Project: FCF (Studio Cichero Srl; Ferrari & Partner srl; S.P.R.G. srl.)

Design: Studio Cichero Srl

Engineering Design: Ferrari & Partner srl; S.P.R.G. srl.http://www.aldocichero.it/

The barge has been designed to be placed from 2 to 10 miles offshore in a medium or low sea bed, and at a depth of 10 to 100 metres, without the necessity of protective structures like breakwaters or embankments on the coast.

The diesel/generator sets on board will supply a power of 60 MW, and use bio fuel/gas/black oil. The barge will be connected to the electrical network on shore by means of a submersible cable and, if requested, by a fuel supply pipe. Another one will carry the fresh water produced to the water network on shore.

The barge is designed to be towed and installed at the generation site, and to be able to run in a fully automatic way without technical staff on board.

For environmental reasons, the barge, has been designed as to increase the vessel draft, by embarking ballast water.

Its form is such as to optimize stability and its structure to be able to resist the force of the sea..

The barge has a double hull, for protection against damage and environmental risks, The space between the two hulls is used for ballast water, in order to compensate fuel consumption and keep a constant trim.

The hull is a robust construction in all-welded steel with scantlings in excess of the minimums of any Classification Society.

Main characteristics:

Length: 76.00 m. (249.00 ft.) Beam: 38.00 m. (125.00 ft.)

Height at deck level: 12.20 m. (40.00 ft) Max height at funnel: 23.70 m. (78.00 ft.)

Draft: 4.50 m. (14.76 ft.)

Max. height at funnel from sea level: 19.20 m. (63.00 ft.)

Deck height from sea level: 7.70 m. (25.26 ft.)

Barge weight, tanks included: 1991 t.