

WAVE POWER GENERATOR

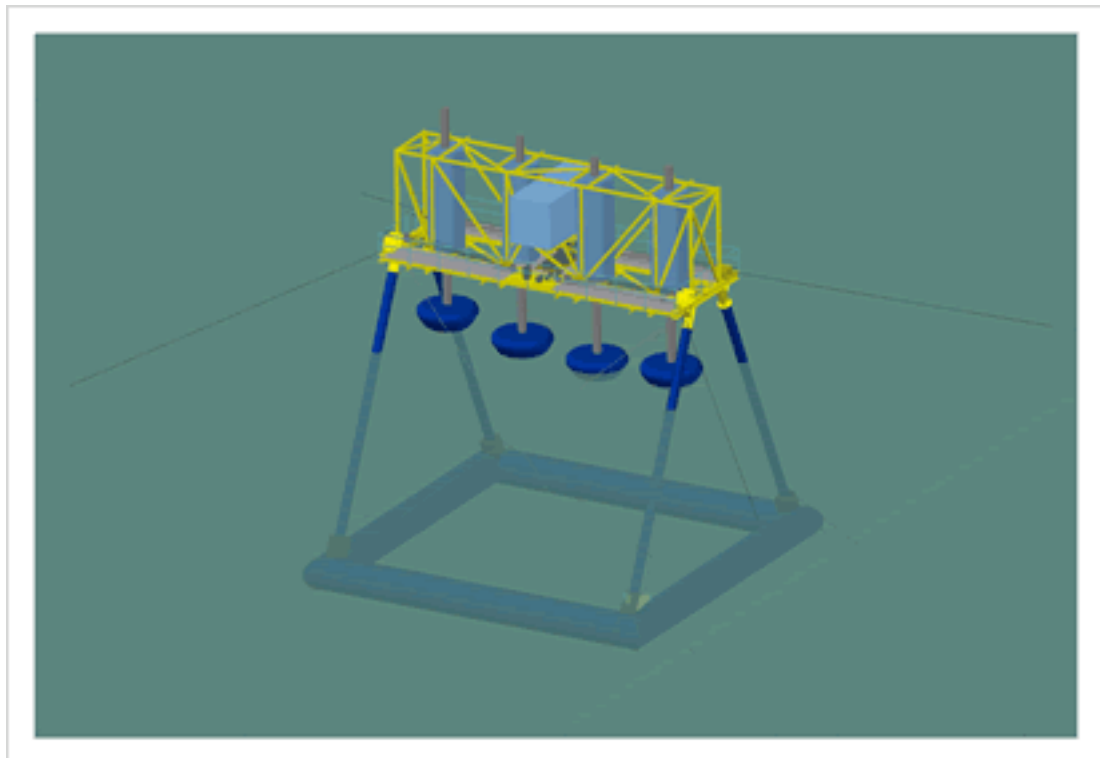
Intro:

Southend-based Trident Energy launching its wave energy test rig in December. It'll be sited just off Southwold...more

Trident Energy's experimental wave energy rig designed to produce energy from wave power stands 8m high with 10m below the sea level, measures 17m² and weighs 80 tonnes. It will be anchored at 52°17'.9N 01°46'.5E (five miles ESE of Southwold Harbour entrance close to a charted dredging area).

The 'platform', which is developed from a survey drilling rig, will be held by 12 anchors; the superstructure, which consists of a gantry on four spread legs, is painted yellow, is fitted with a light beacon, and an AIS beacon and top marks.

Steel floats suspended from the gantry, will rise and fall with the waves driving vertical linear generators that convert the motion into electricity, which is piped via sub-sea cables onshore and linked to the national grid. The £700,000 test equipment will be left in the North Sea initially for three months for monitoring purposes, and could provide energy for up to 30 homes. The company will then increase the size of the rig to test out a full-size model. A full-size commercially operated unit covers 1.5 square miles of sea!



Drawing of test rig, flooded bottom tanks rest on seabed. Wave action moves floats to operate vertical linear motor generators.