TEST OPERATION BEGINS FOR 2MW FLOATING OFFSHORE WIND POWER FACILITY

A group of companies and others undertaking a test project for a floating offshore wind power facility sponsored by the Ministry of the Environment (MOE) announced on October 28, 2013, the start of its experimental operation off the coast of Kabashima Island, Goto City, Nagasaki Prefecture, southern Japan. The facility, with its 2000-kilowatt wind turbine, is Japan's first commercial-scale floating offshore wind power facility, and is also the world's first hybrid spar-type facility on this scale. The project group includes Toda Corp., Hitachi Ltd., Fuyo Ocean Development & Engineering Co., Kyoto University, and the National Marine Research Institute. They have been working on selecting suitable seawaters, assessing environmental impacts
s, and installing and operating a 100-kilowatt wind turbine since fiscal 2010. The 2000-kilowatt test model was designed, constructed and installed to make use of previous research.

The floating structure of the test model consists of steel on the upper part, and concrete at the lower part, which was developed in Japan as a hybrid-spar type. The test model is hooked to the seabed by three chains. It is 172 meters long in total, 96 meters above the sea and the rotor is 80 meters in diameter. It is known as named "Haen-kaze."

By operating the test model, the group aims: 1) to gather information on the environmental impacts, as well as safety; 2) to make further investigations into full-scale operation, including operation and maintenance costs; and 3) to investigate ways to establish co-existence between fisheries and floating offshore wind power facilities.