

DETAILS OF INTERESTING CLAIM

No: DOIC 55

Type of Insurance:

EAR

Description of damaged item:

A normal loss incurred during erection of offshore wind farm

Cause of Loss:

(9) Other external causes

Claim Cost:

Description of Incident and Loss Prevention Measures initiated:

Some characteristics of the project:

- The wind farm consists of 80 2 MW wind turbines
- The wind park is located 14-20 km off the coast at a water depth of 6-12 metres
- In winter, weather conditions are often severe, with strong winds and waves of up to 14 metres
- The distance between the wind turbines is just over 500 metres
- The time of erection was estimated at two years with limited activities during the winter period

The project was not completed on time, and the erection all risks insurance cover was extended several times.

During the period of erection, eight recoverable claims were reported, of which six related to the erection phase, one resulted from a stroke of lightning, and one from storm damage. Of the erection claims, one claim was for damage to the sea cable to the wind turbine, by far the largest individual claim to have occurred during the erection of the wind farm. Total claims incurred amounted to approx. 2.5 €Mio, of which the storm and lightning claims accounted for approx. 3.5%.

Total claims incurred:

- Repair costs – direct payroll costs and costs for new component or repair of damaged property 12 %
- Costs incurred in connection with the disassembly and reassembly of damaged parts 3 %
- Costs incurred in connection with mobilisation and demobilisation of contractor ships 31 %
- Costs incurred in connection with the hiring of contractor ship with crew 54 %

Outline the interesting or unusual aspects of this claim or problems experienced during settlement:

These costs are representative of the wind farm mentioned above, however, wind farms get bigger and bigger and are erected in different locations. The price of a wind turbine has increased considerably within the past year.

All of these factors contribute towards another claims picture. Some of the erection claims could have been avoided if due care had been exercised in the work. Most of the erection claims were a result of human error or miscalculation.

As contractors gain more experience in the field of offshore wind turbine erection, the risk will decrease. However, it seems that wind farms are erected far from the coastline and at water depths of up to 30 metres. This represents a bigger challenge for contractors and their equipment.

Contractors' equipment for erecting offshore wind turbines has also improved and is now more than previously designed specifically for this purpose.

Wind turbines are getting bigger and bigger, also offshore turbines. This places great demands on the quality control, design, manufacturing and erection. It is important to keep in mind that the design life is 20 years!

Know-how, wind conditions and insight continue to be key words in relation to offshore wind turbines.

Based on experience gained so far from the erection of several offshore wind farms, the risk of damage to sea cables seems to be the greatest by far. Such cables are damaged very easily, and repair costs may amount to as much as 4 €Mio.

This information was taken from WGP 45, where additional details can be read:

http://www.imia.com/downloads/imia_papers/wgp45_2006.pdf