

# The Jurassic Petroleum System in the Danish Central Graben

## The PETSYS Project

In 2011 the Geological Survey of Denmark and Greenland (GEUS) launched a 3 year project on "The Jurassic Petroleum System in the Danish Central Graben" financed by oil companies active in Denmark. The short title of the project is PETSYS (PETroleum SYStem).

The study is carried out through collaboration agreements between GEUS and participating Oil Companies. Throughout the project period results will be made accessible to participating Companies through a restricted web-site and discussed during workshops, which are held twice a year.



### Aims

Establish a consistent seismic-sequence stratigraphic framework of the Jurassic in the Danish Central Graben.

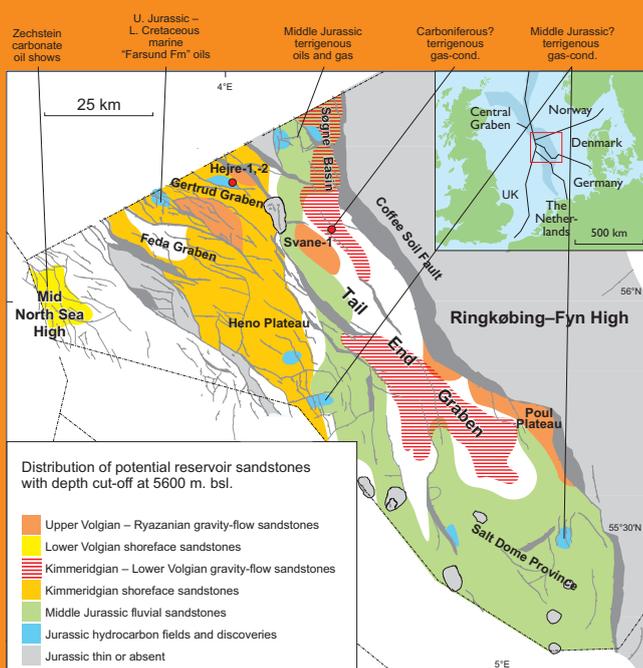
Provide a series of paleogeographical maps, showing the depositional environments, distribution of lithologies and potential sand source areas through time.

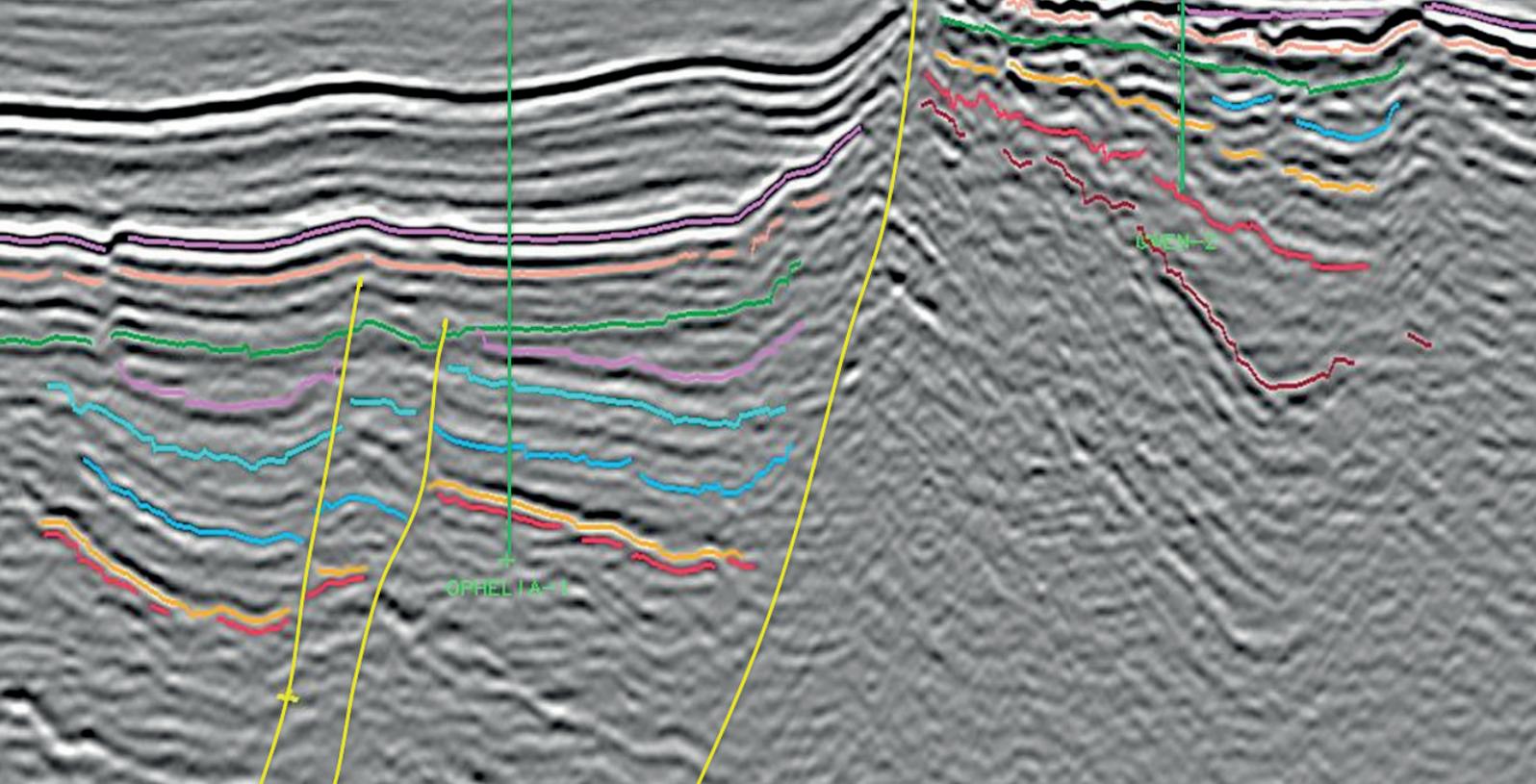
Provide an overview of reservoir sandstone characteristics, i.e. porosity, permeability, net sand, sediment petrography and diagenetic alterations.

Outline the regional variation of source rocks/petroleum characteristics such as quality/type, maturity, likely kitchen areas and migration fairways.

Present basin modelling studies in areas where proper source rocks and reservoirs can be anticipated.

Present a synthesis of the Jurassic Petroleum System, covering prospectivity and hydrocarbon plays in the Jurassic of in the Danish Central Graben.





Upper Jurassic/Kimmerian shallow marine Heno sands directly on Rotligende in Ophelia-1, and on Triassic in Gwen-2

## Activities

The Study will comprise the following activities:

### Activity 1:

Establish a GIS platform for presenting study results on a restricted web-site.

### Activity 2:

Integration of seismic interpretation, stratigraphy and reservoir characterization. Construction of paleogeographic maps and interpretation of depositional environments.

### Activity 3:

Evaluation of Jurassic source rock properties and composition of petroleum.

### Activity 4:

3D basin modelling studies.

### Activity 5:

Synthesis of activities 2-4.

More information  
[www.oilgasin.dk](http://www.oilgasin.dk)



## More information

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