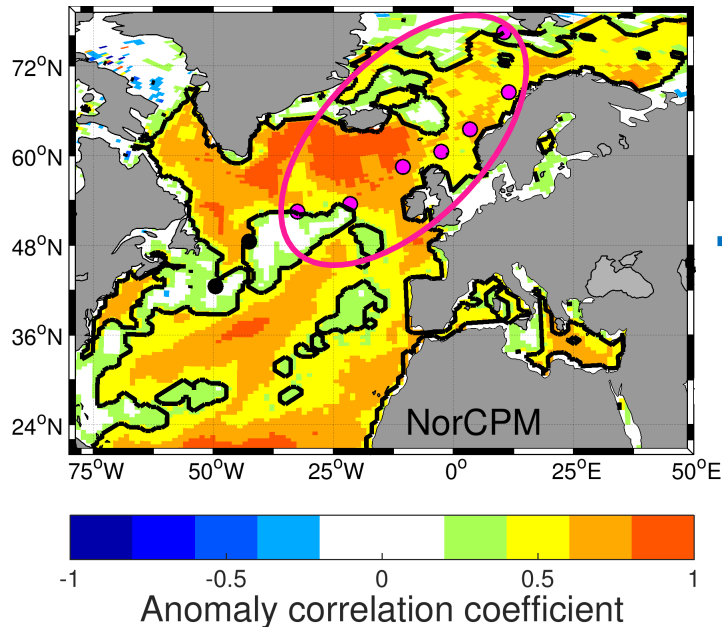
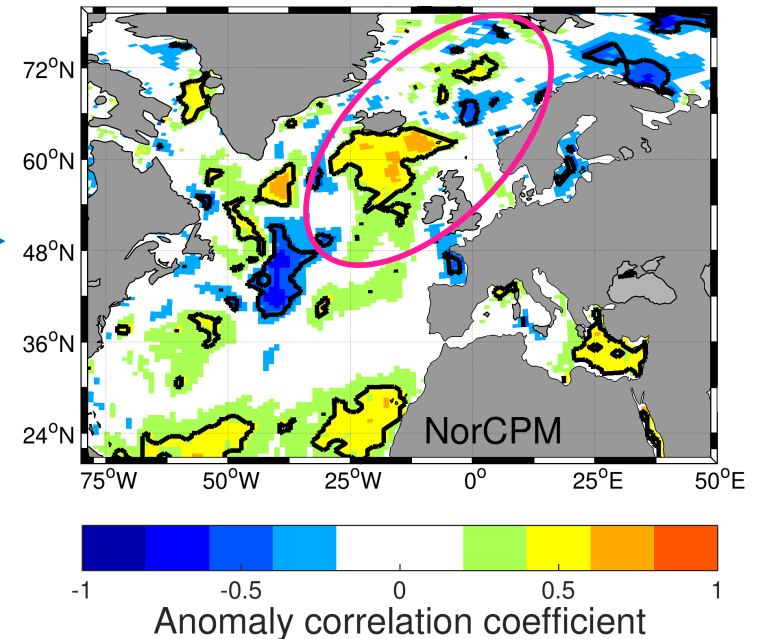


## Predictive skill along the extension of the North Atlantic Current in the Norwegian Climate Prediction Model

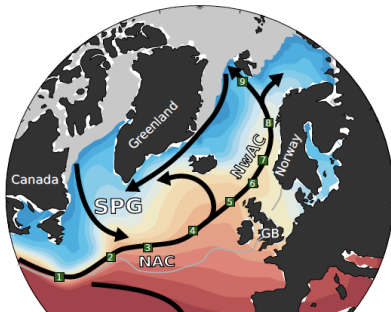
Skill in predicting winter SST at lead time=1yr



Skill in predicting winter SST at lead time=4yrs



Why is there lack of skill at longer forecast times?



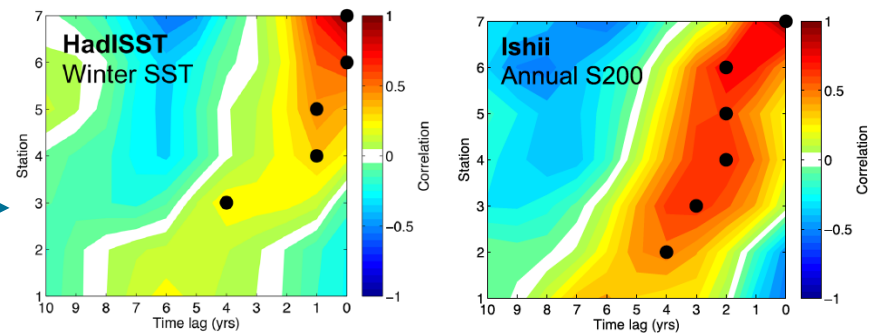
According to observations, there is predictability along the **warm current**

Årthun et al. 2017

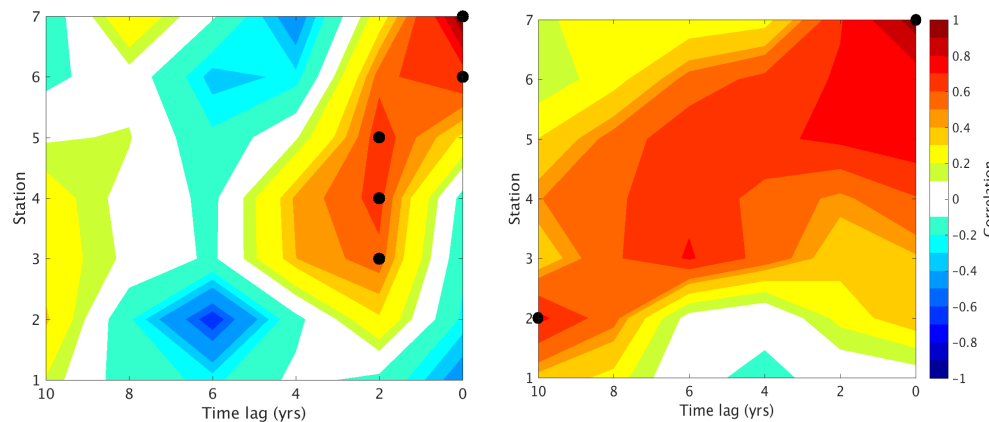
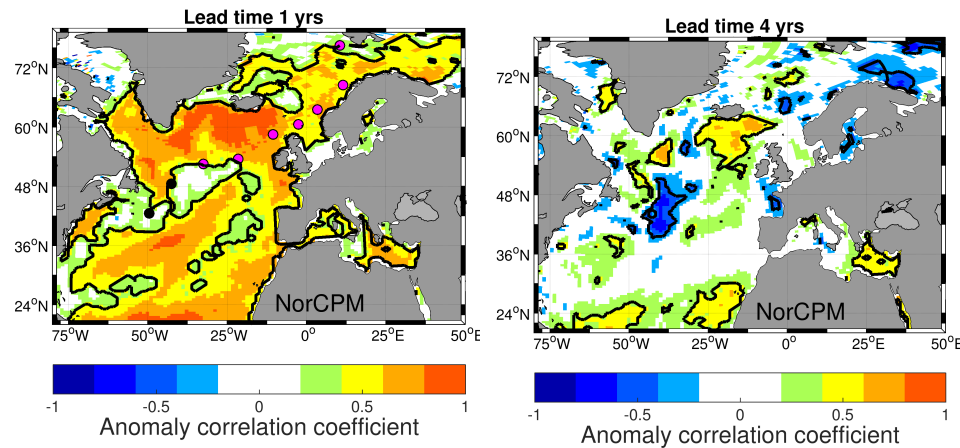
# Confronting the prediction systems with mechanism identified from observations



Langehaug et al., Work in progress...will include other prediction systems...



Årthun et al., 2017; Langehaug et al., 2018



**Only SST initialization, 1960-2010**

## The Prediction group in Bergen:

We have investigated ways to enhance predictive skill of our system by:

- Assimilation of SST and hydrographic profiles
- Assimilation of sea ice concentration