

# Weather Briefing HALO-(AC)<sup>3</sup>

Saturday, 2022-04-09, 17:00 LT

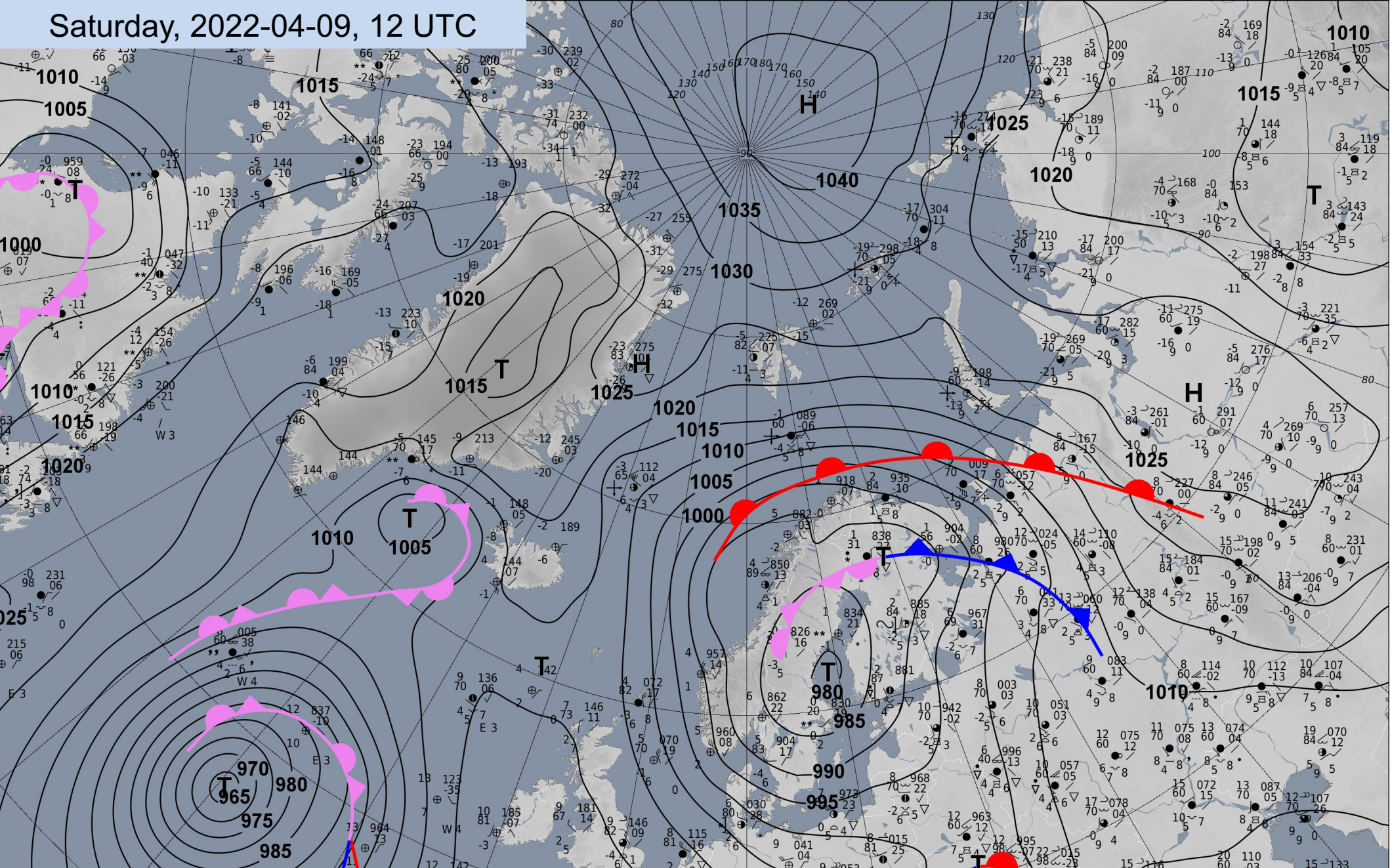
Presenter contact: [irina.gorodetskaya@ua.pt](mailto:irina.gorodetskaya@ua.pt)

## **Surface Analysis**

Saturday, 2022-04-09 12 UTC

DWD

Saturday, 2022-04-09, 12 UTC



## **Surface wind development and precipitation**

2022-04-09 00 UTC:

Forecast: 32 – 108h

ECMWF & ICON

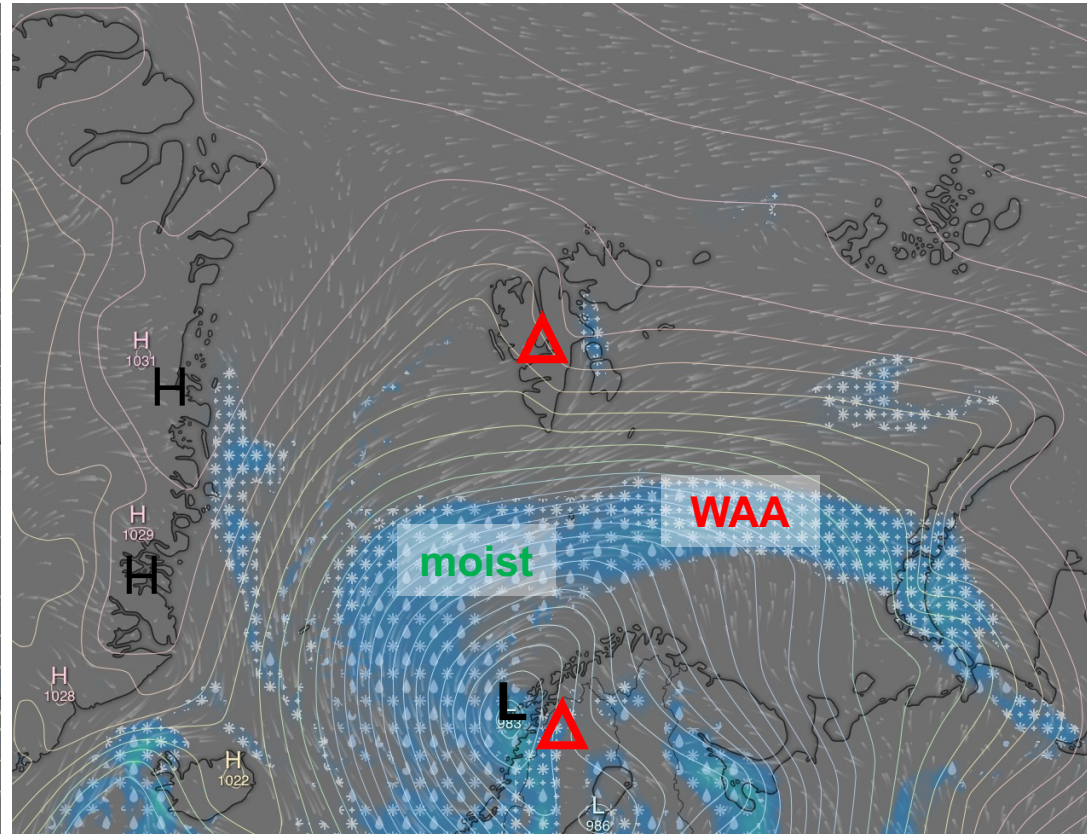
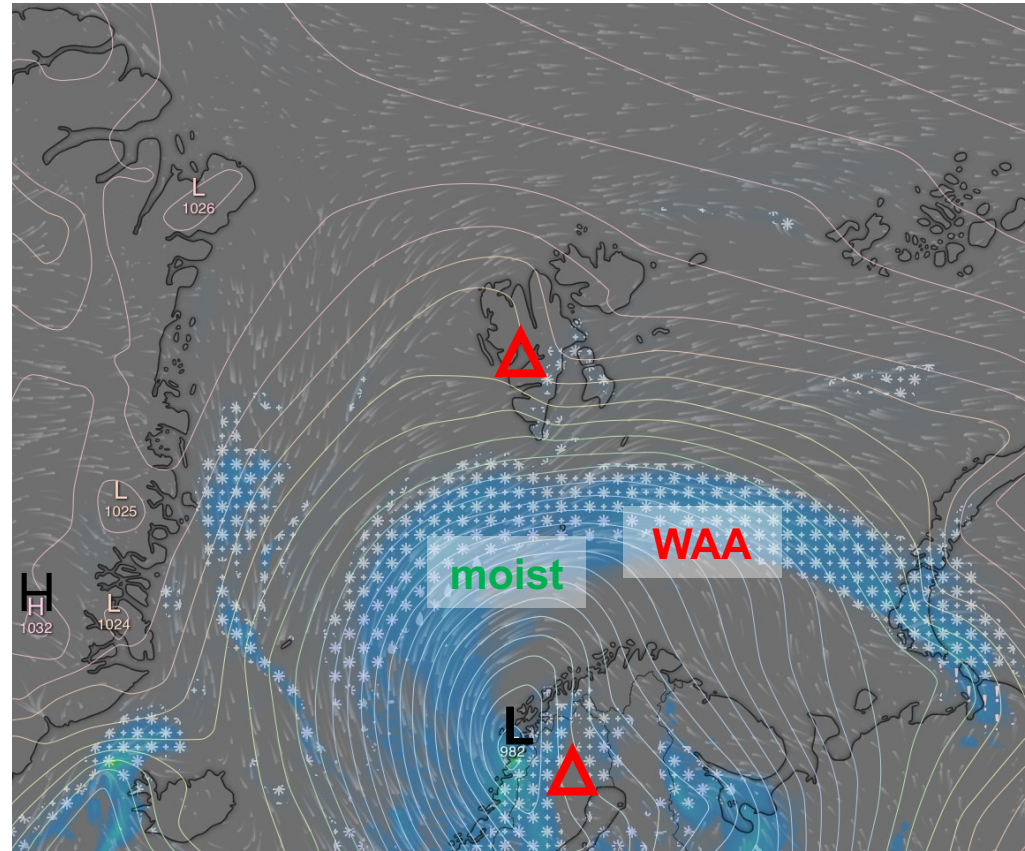
**CAA: Cold Air Advection**

**WAA: Warm Air Advection**

Sunday, 2022-04-10 08 UTC  
(+32 h, init 2022-04-09 00 UTC)

ECMWF

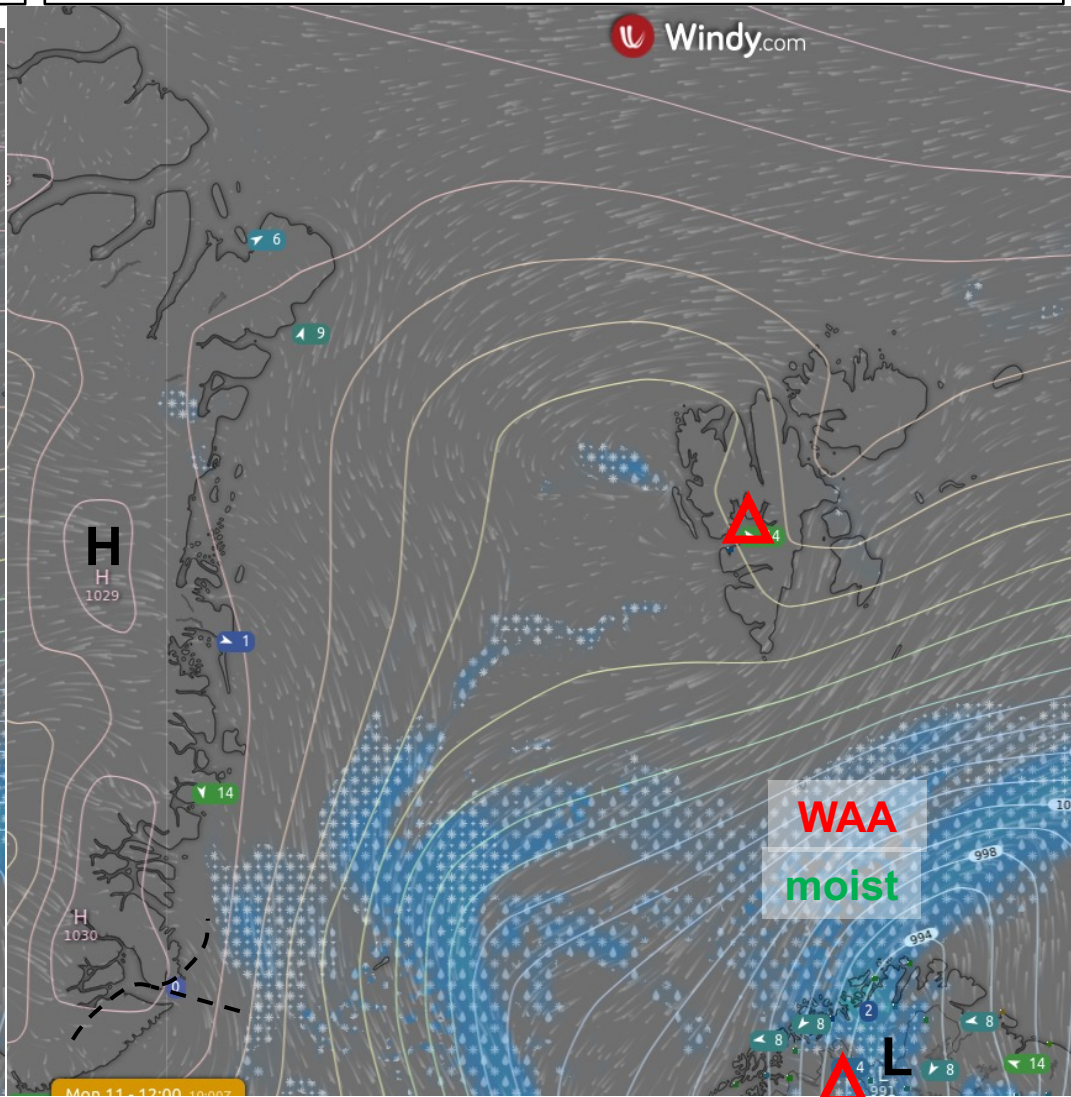
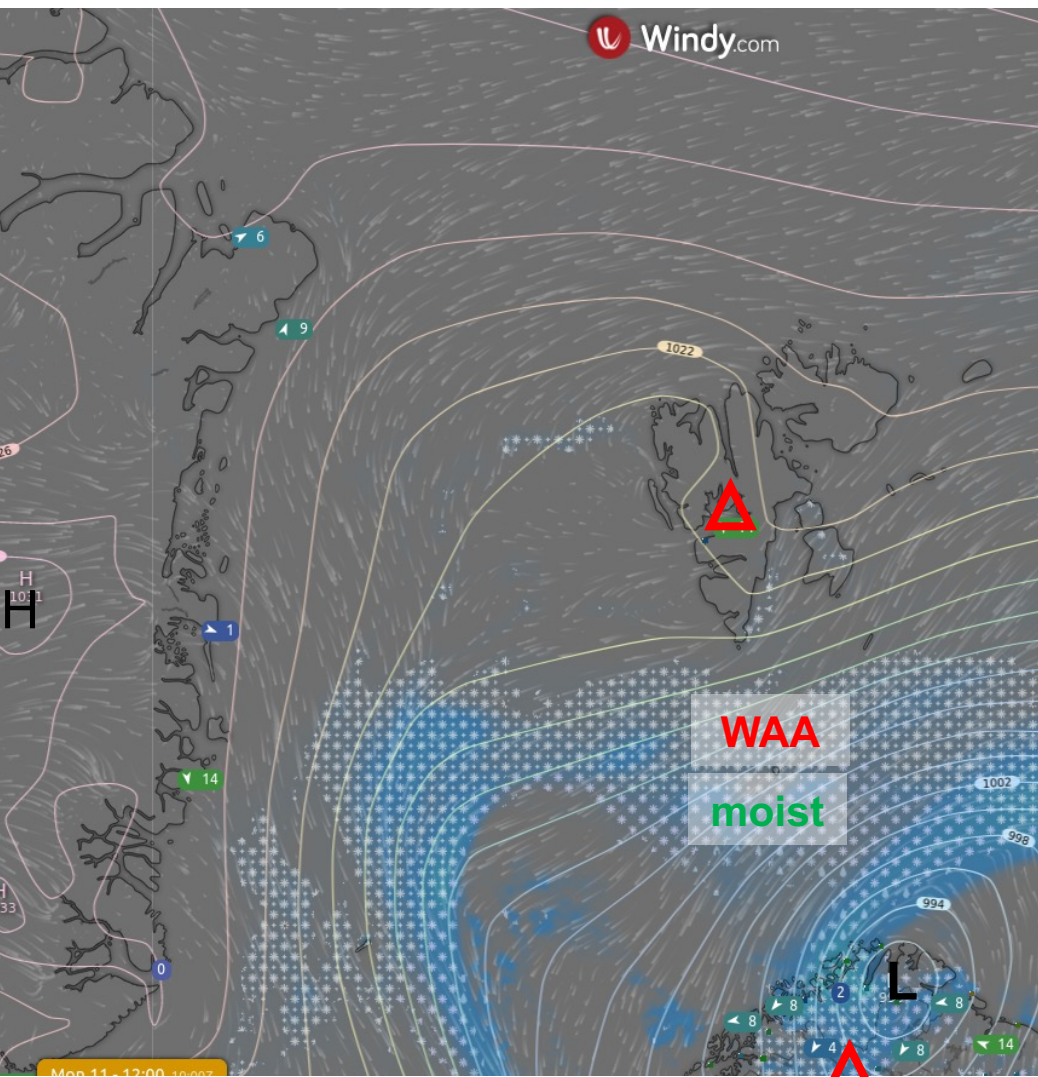
ICON



# Monday, 2022-04-11 12 UTC (+60 h)

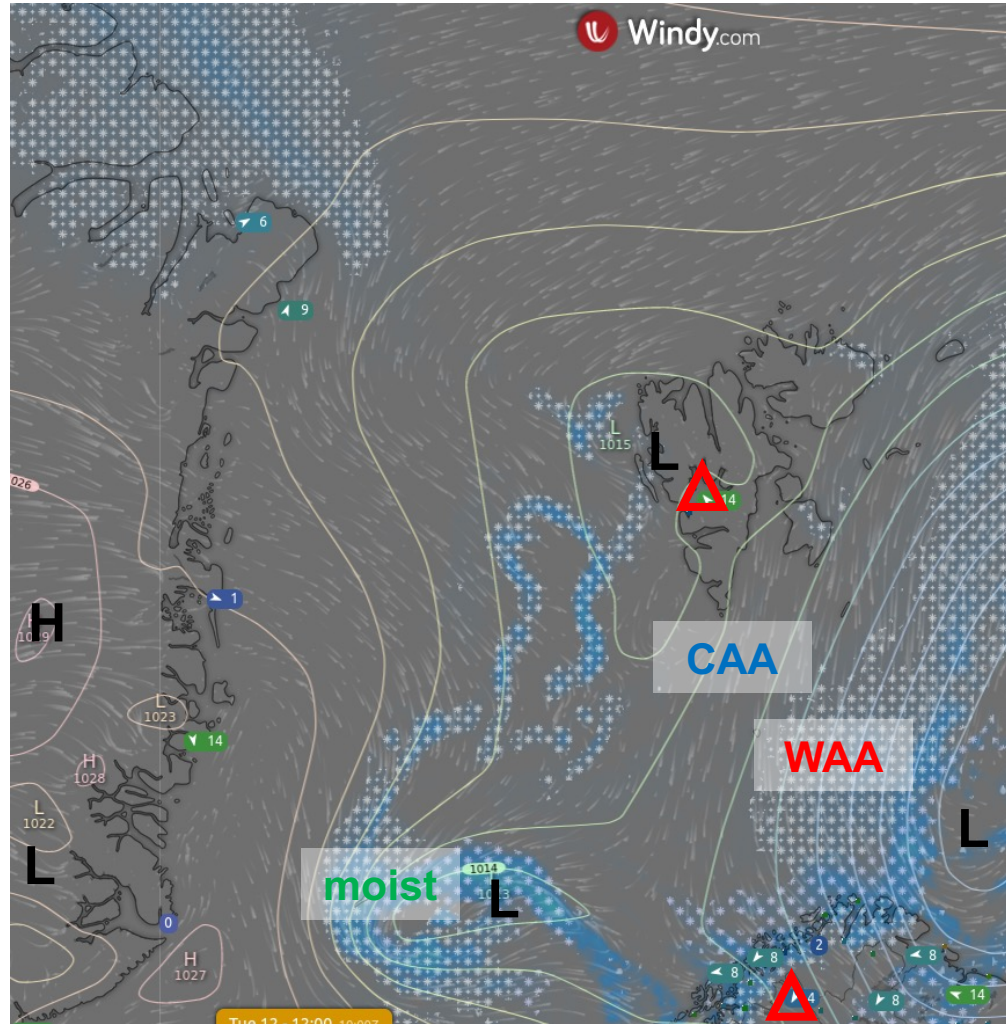
ECMWF

ICON

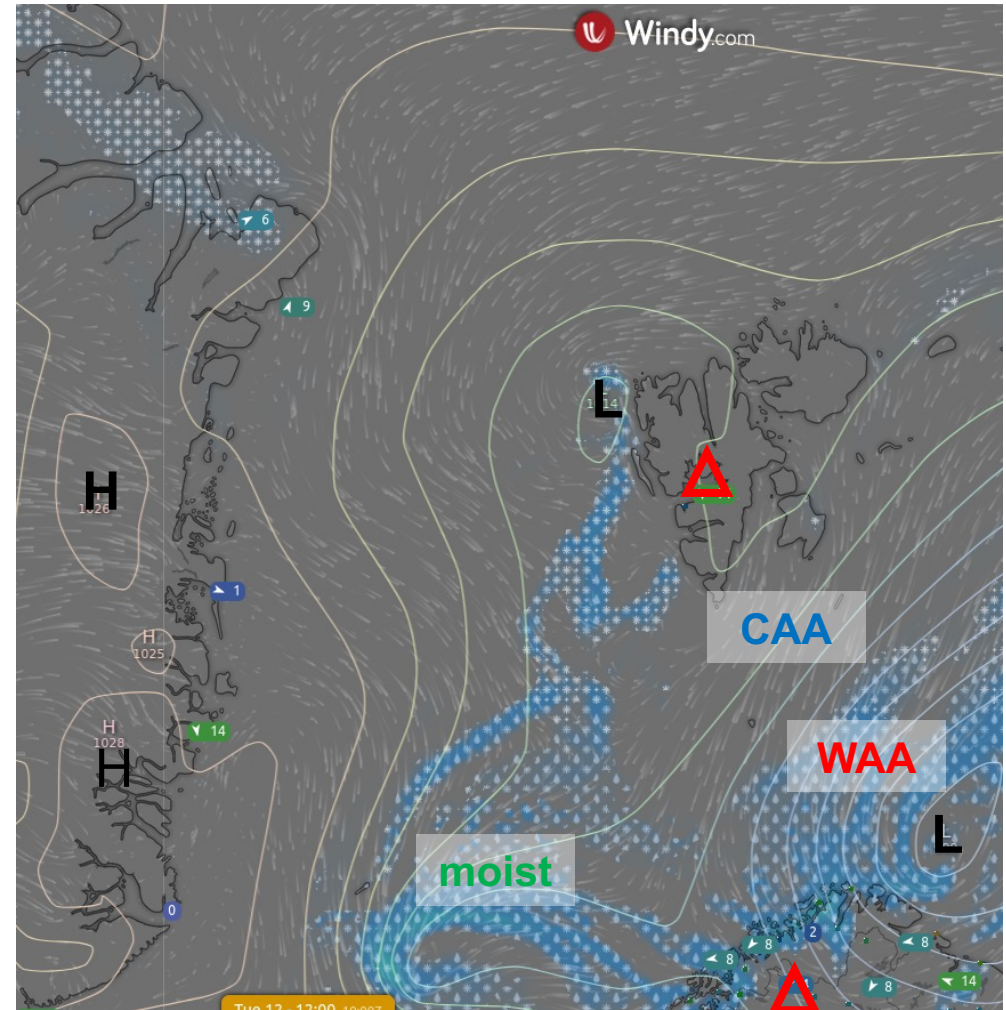


Tuesday, 2022-04-12 12 UTC (+84 h)

ECMWF



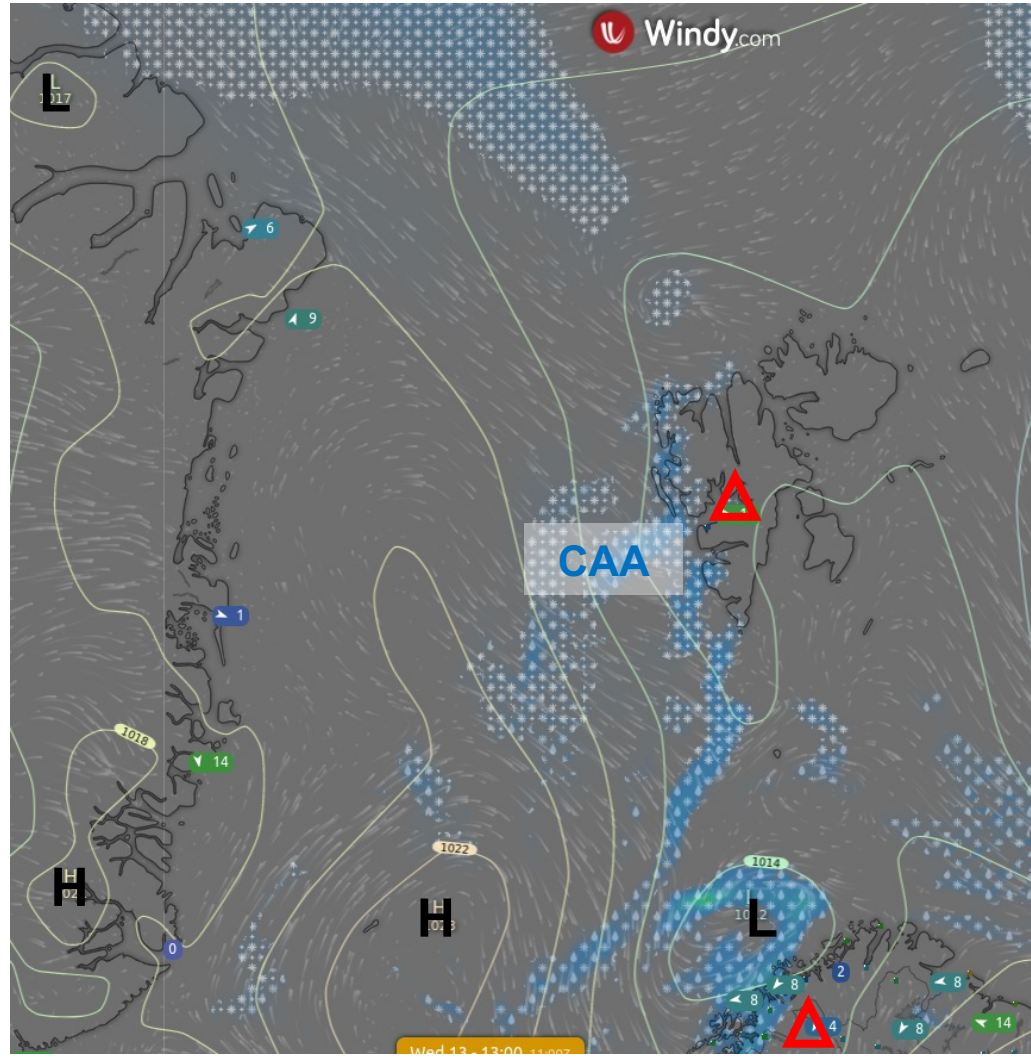
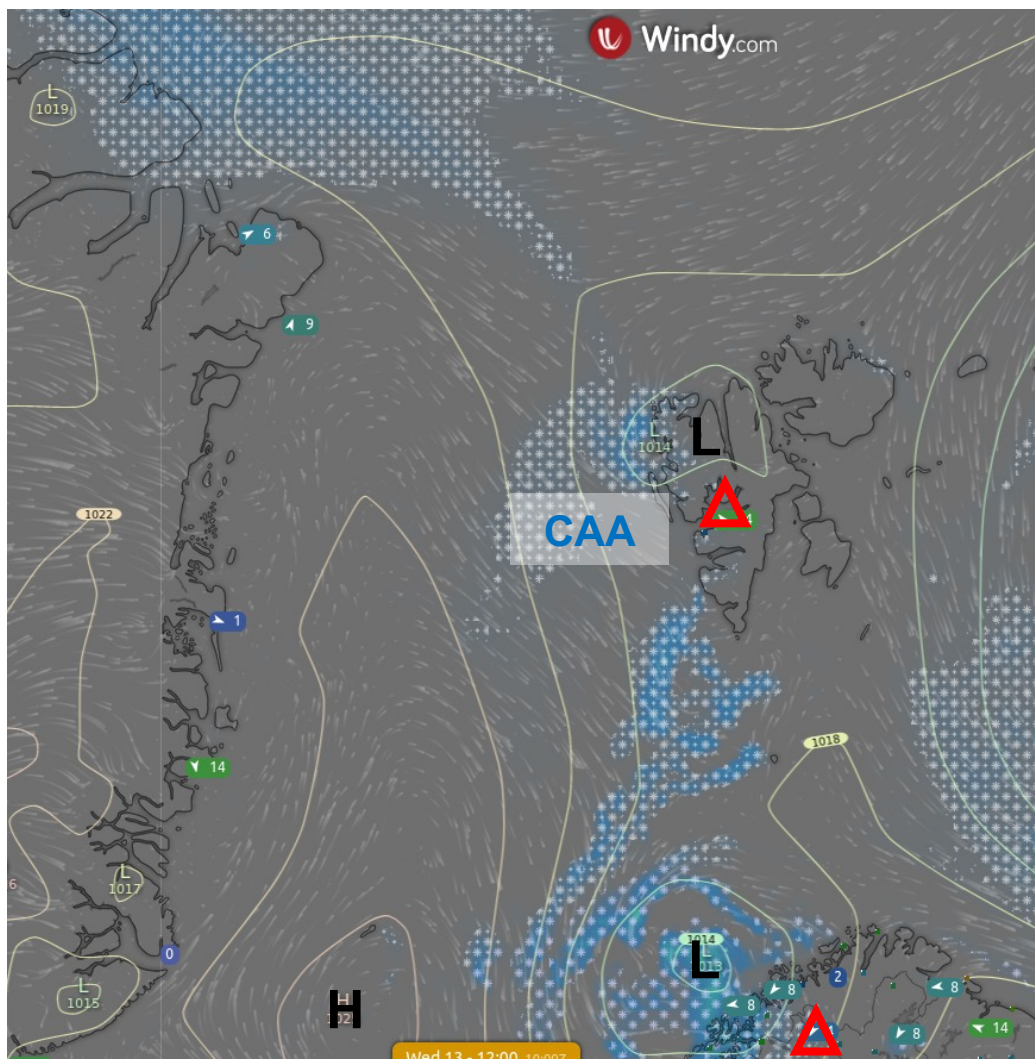
ICON



# Wednesday, 2022-04-13 12 UTC (+108 h)

ECMWF

ICON





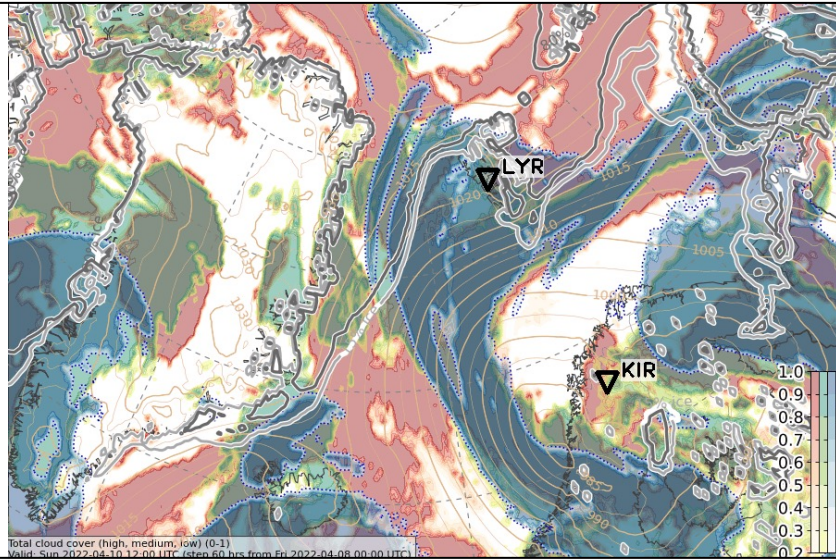
## **Cloud cover, CAO index, Airmasses, IVT**

2022-04-09 00 UTC: 36 – 108h

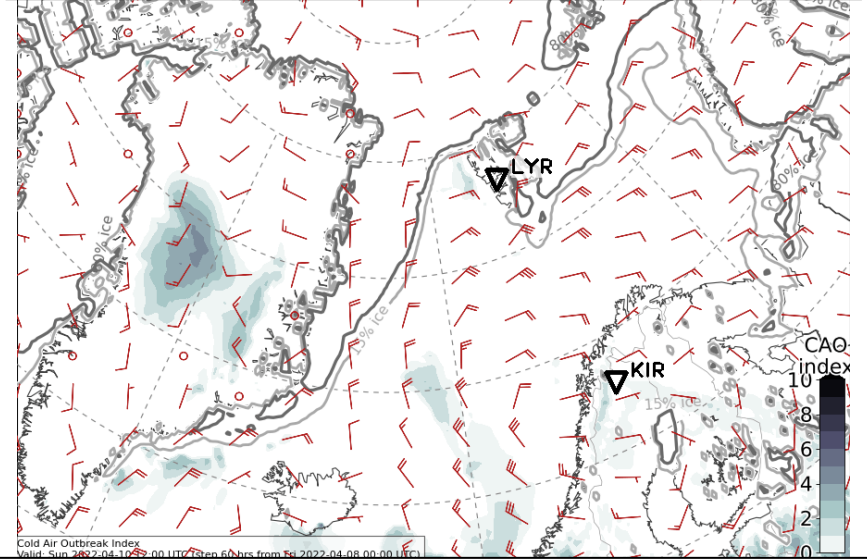
Cloud cover & 850hPa  $\theta_e$  & CAO & IVT

Sunday, 2022-04-10 12 UTC (+60)

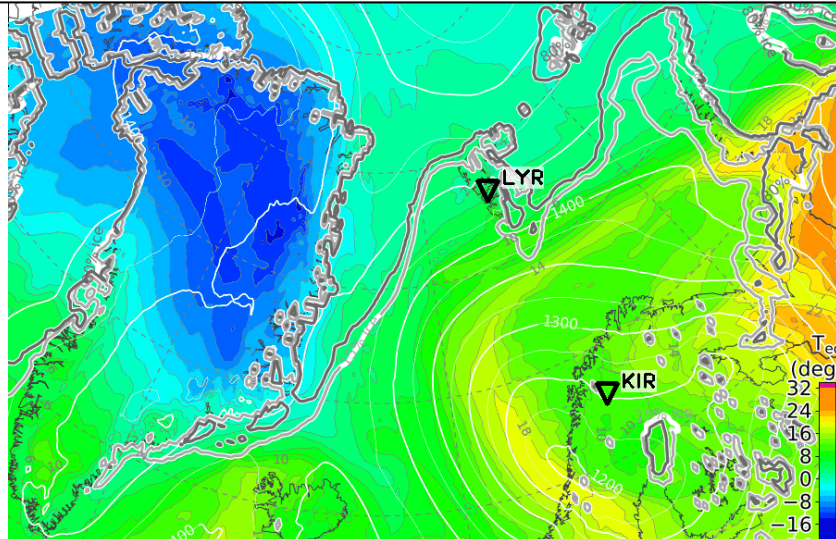
Total Cloud Cover



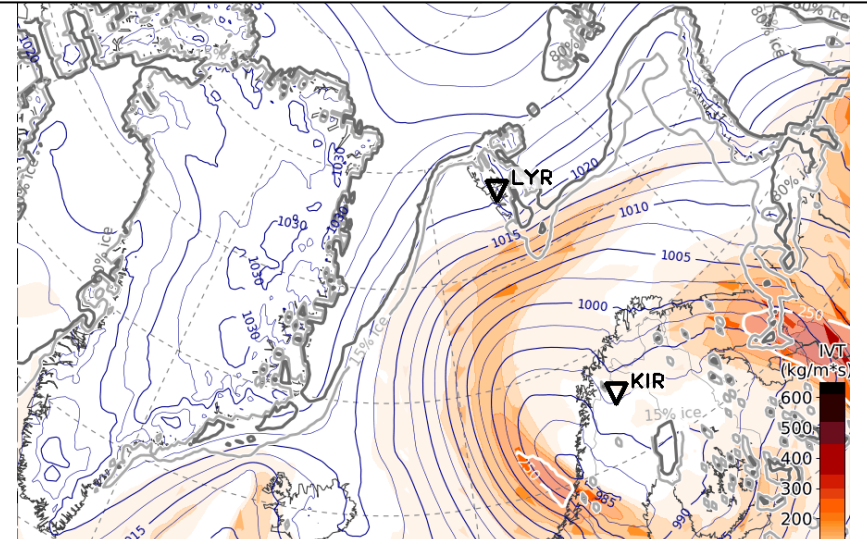
CAO Index



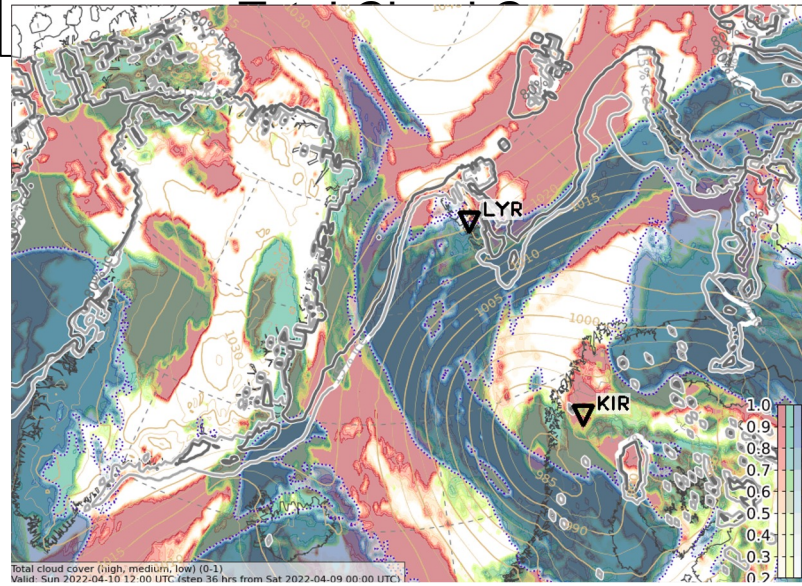
850 hPa Equ. pot. Temperature



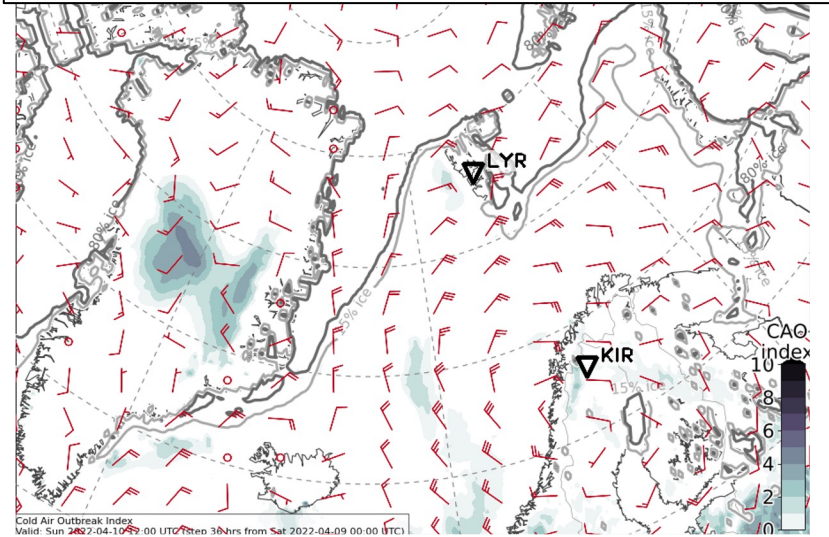
Integrated Water Vapor Transport



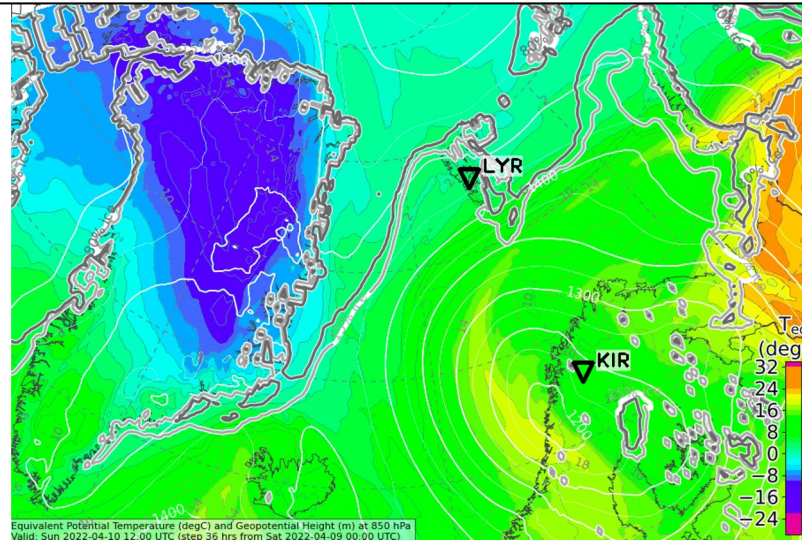
Sunday, 2022-04-10 12 UTC (+36)



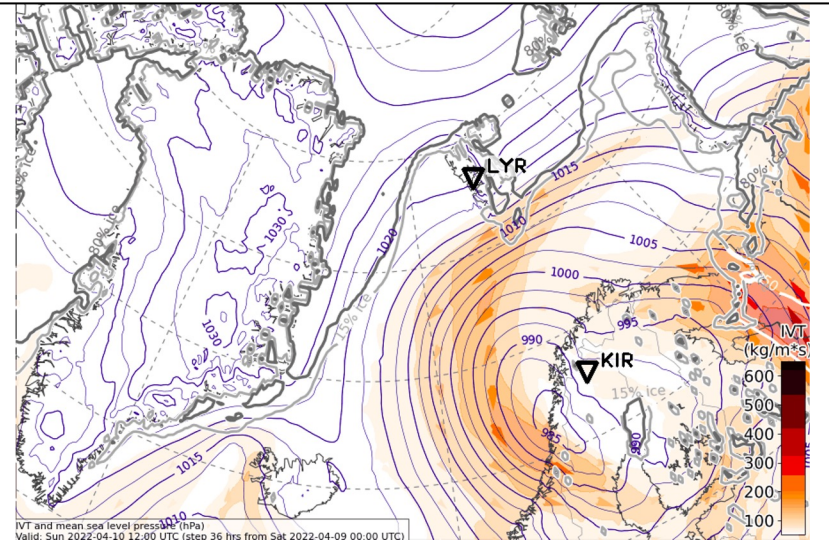
### CAO Index



### 850 hPa Equ. pot. Temperature

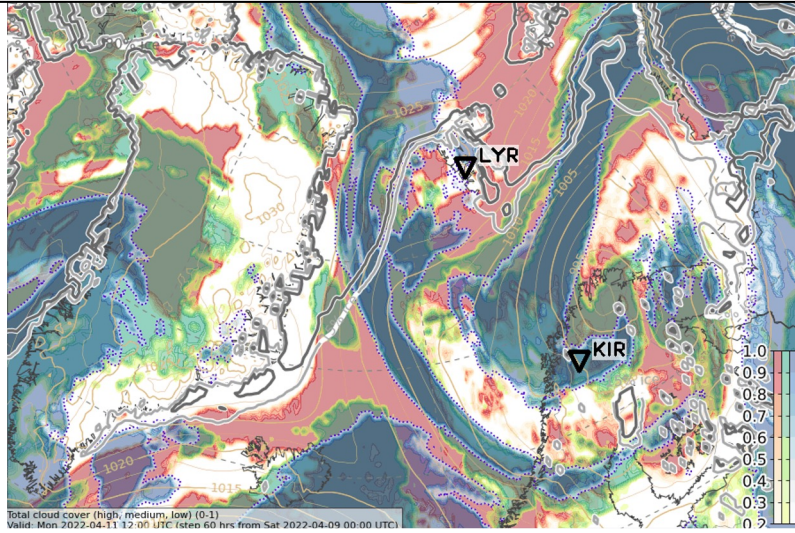


### Integrated Water Vapor Transport

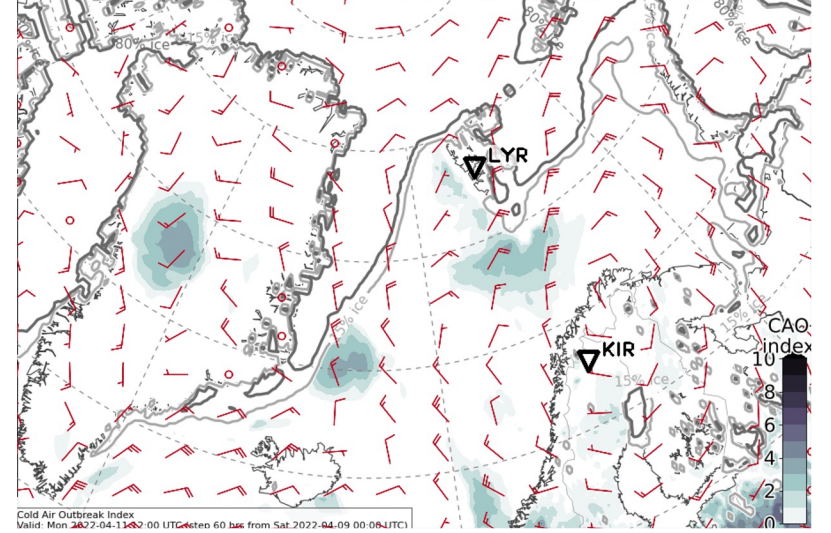


Monday, 2022-04-11 12 UTC (+60)

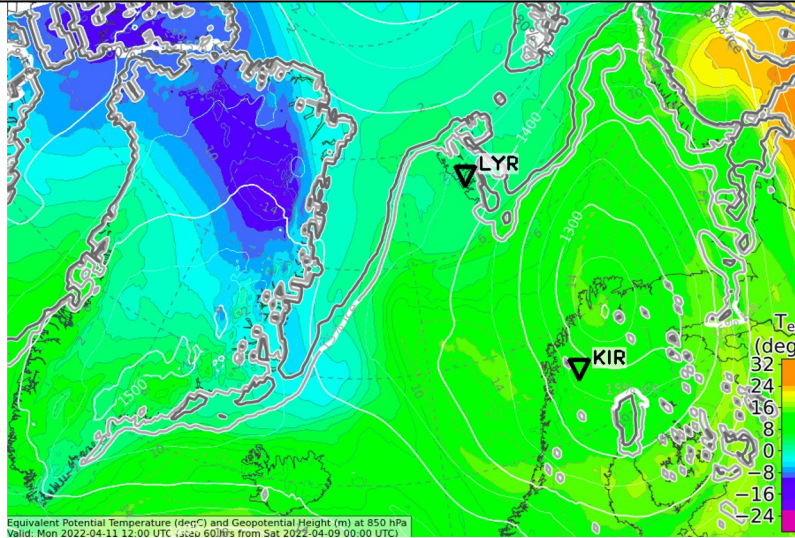
### Total Cloud Cover



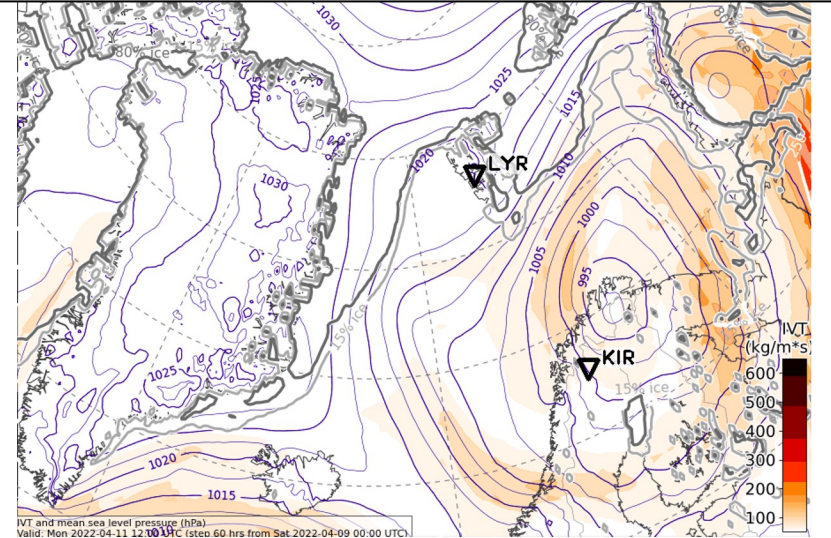
### CAO Index



### 850 hPa Equ. pot. Temperature

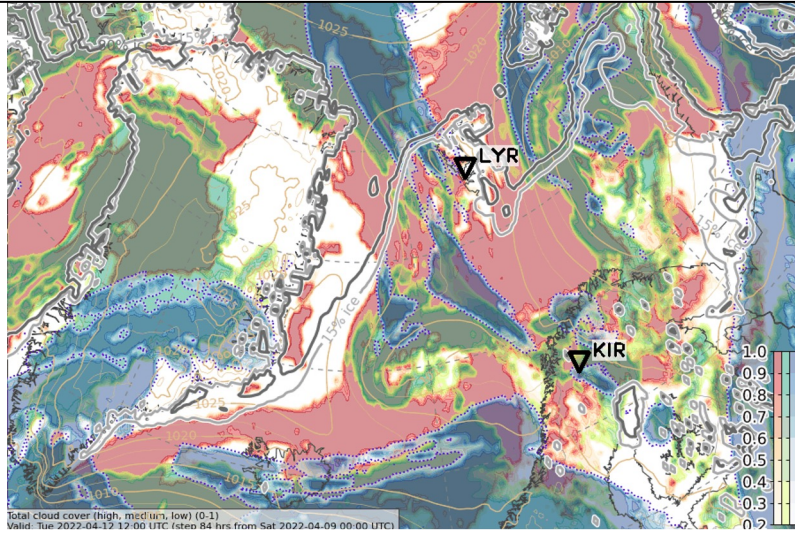


### Integrated Water Vapor Transport

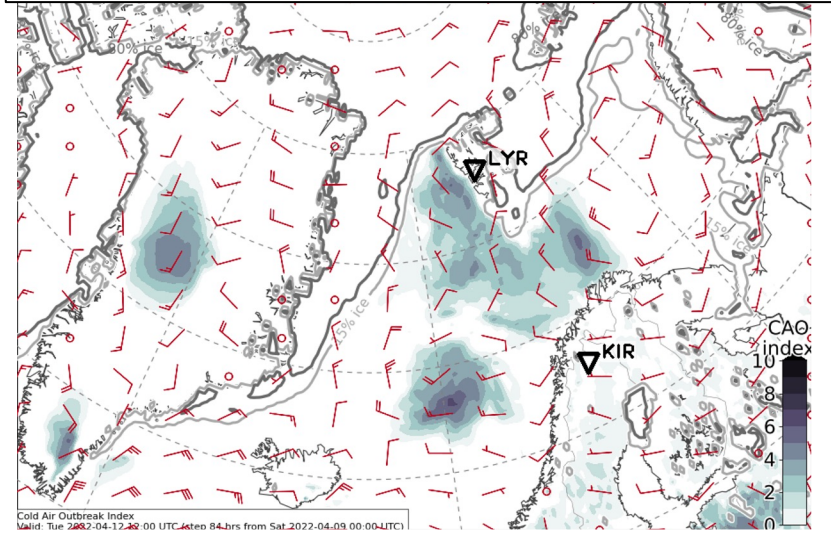


Tuesday, 2022-04-12 12 UTC (+84)

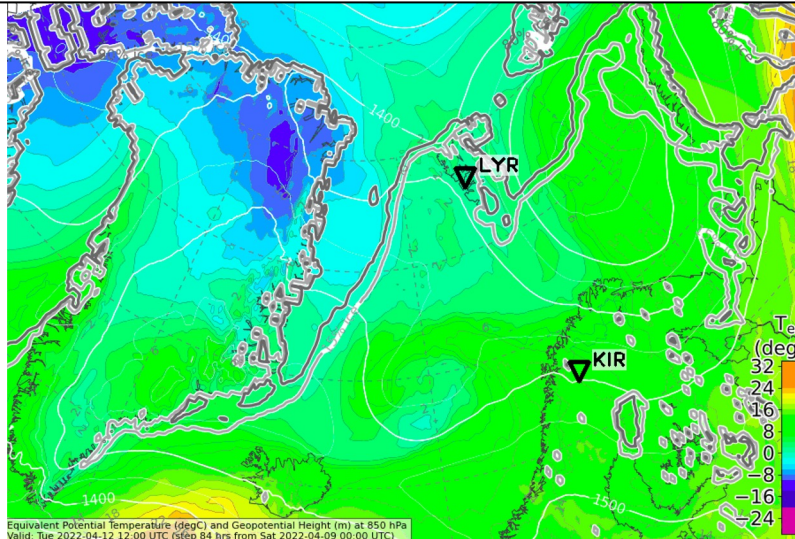
### Total Cloud Cover



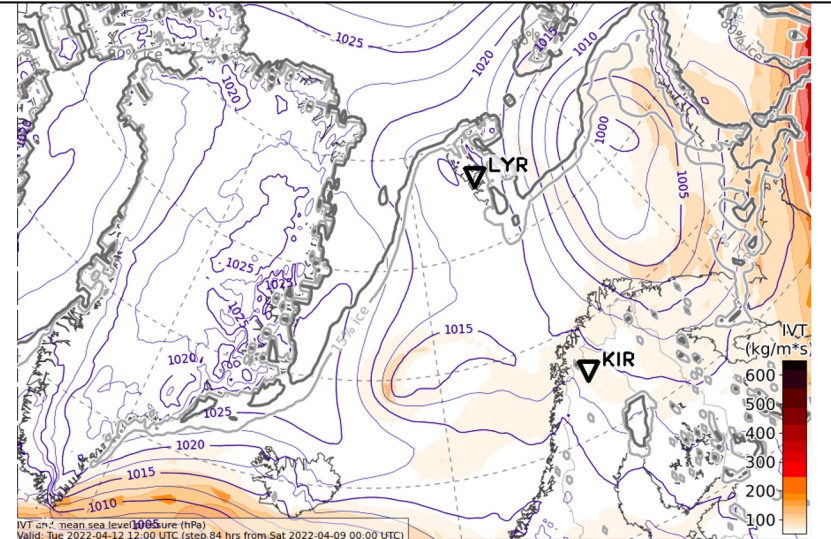
### CAO Index



### 850 hPa Equ. pot. Temperature

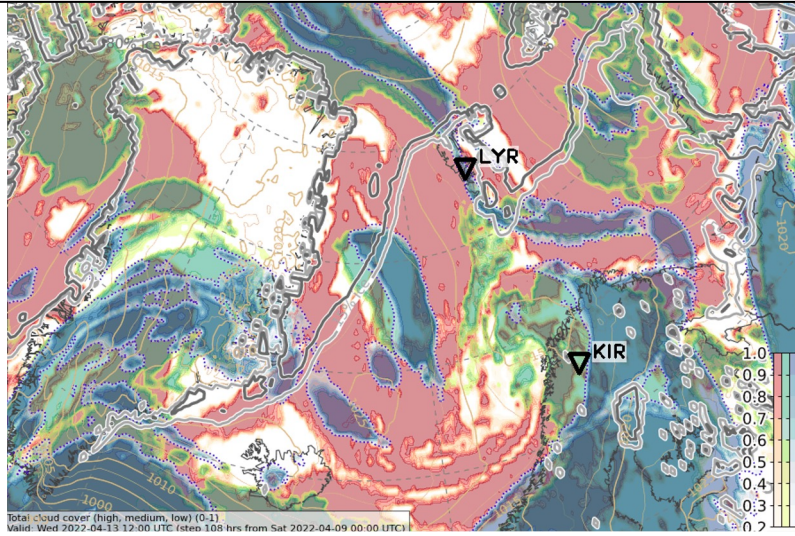


### Integrated Water Vapor Transport

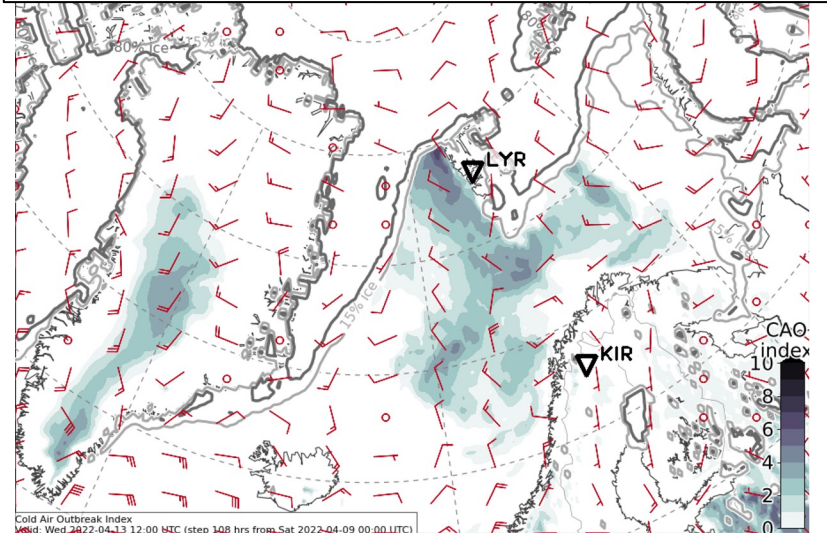


Wednesday, 2022-04-13 12 UTC (+106)

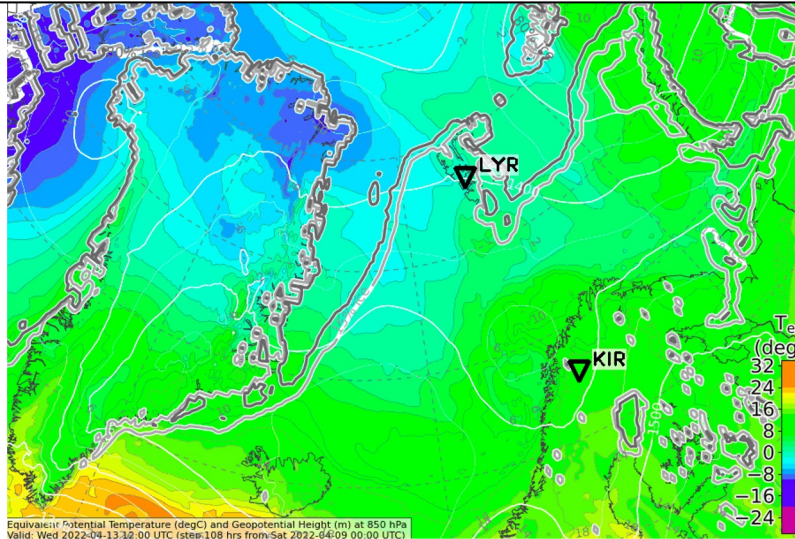
Total Cloud Cover



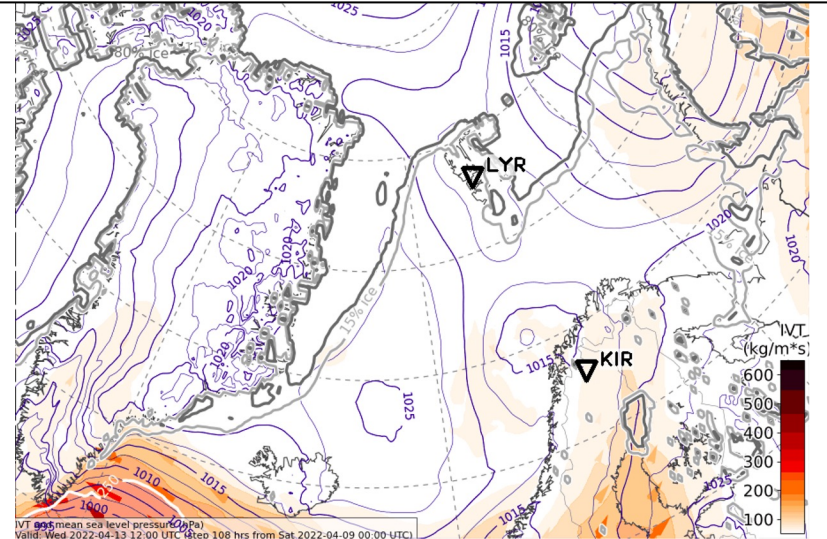
CAO Index



850 hPa Equ. pot. Temperature



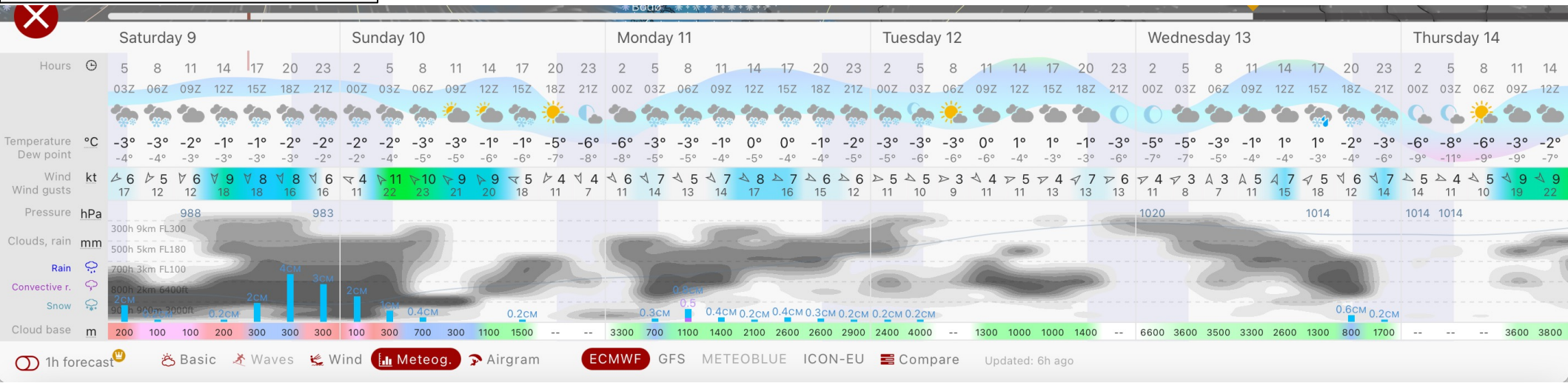
Integrated Water Vapor Transport



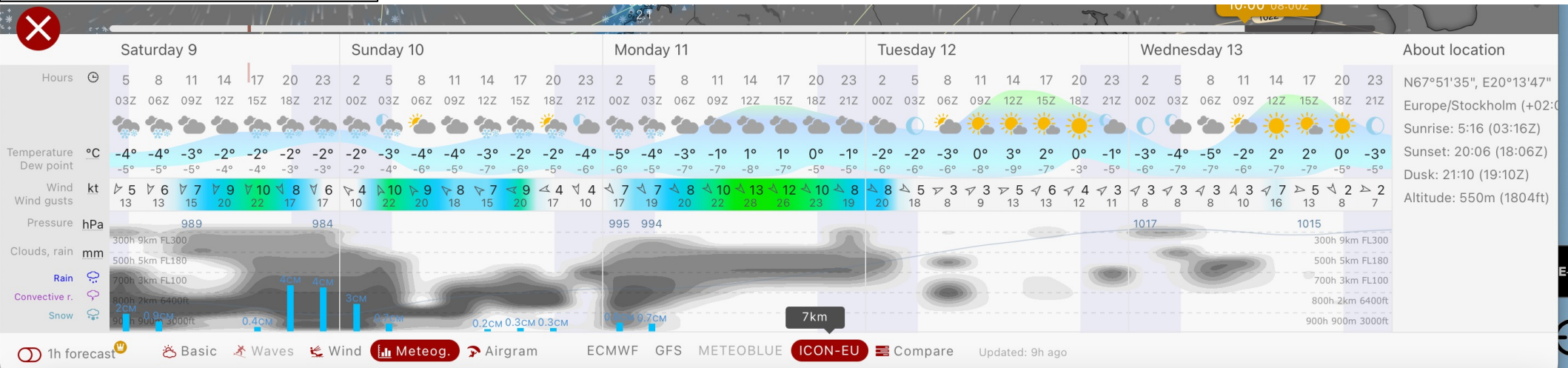
## **Airport meteograms & local weather at Svalbard**

# Kiruna:

## ECMWF



## ICON

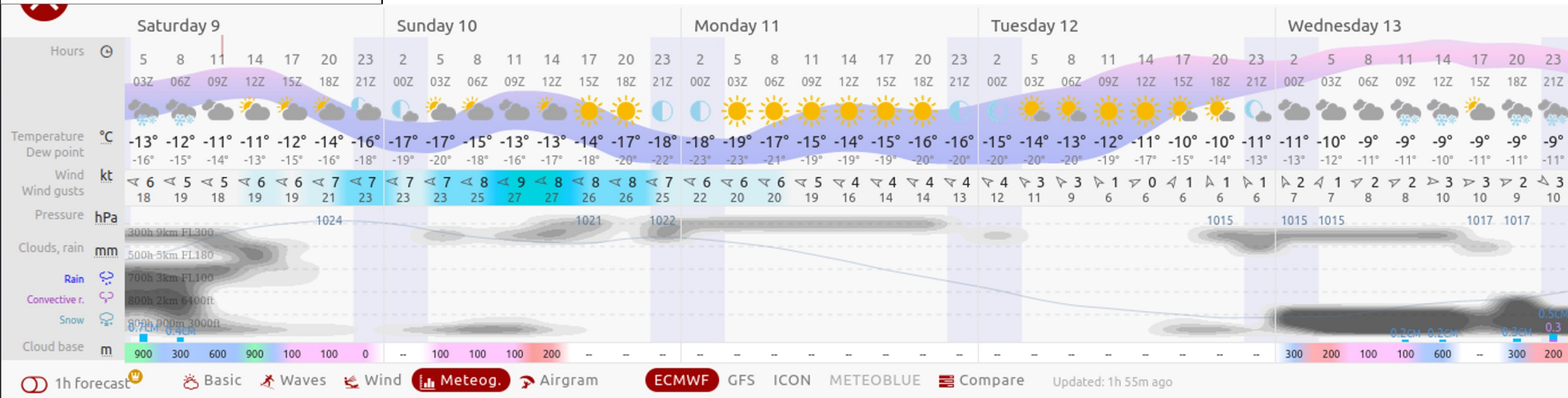


About location  
 N67°51'35", E20°13'47"  
 Europe/Stockholm (+02:00)  
 Sunrise: 5:16 (03:16Z)  
 Sunset: 20:06 (18:06Z)  
 Dusk: 21:10 (19:10Z)  
 Altitude: 550m (1804ft)

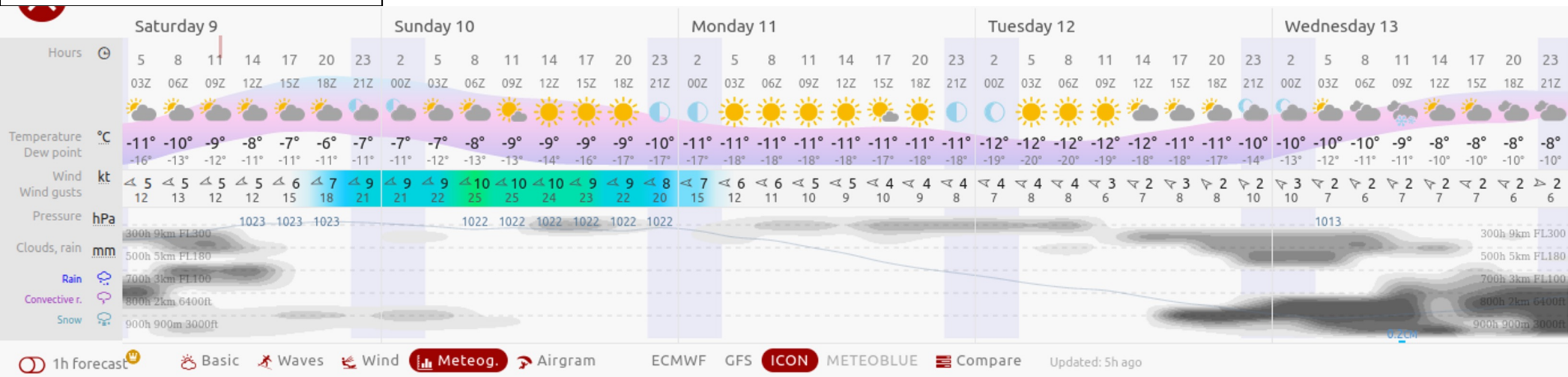


# Longyearbyen:

## ECMWF



## ICON



# Latest METAR and TAF from Longyearbyen airport

## Svalbard Airport. Longyear

Longyearbyen, Norway

latitude: 78-15N, longitude: 015-28E,  
elevation: 2 m

### Current weather observation

The report was made **36** minutes ago, at **12:50**  
UTC

Wind **8** kt from the **Southeast**

Temperature **-10°C**

Humidity **67%**

Pressure **1016** hPa

Visibility **10** km or more

no clouds below 1500 m and no cumulonimbus

Time: 15:26 (13:26 UTC)

### Forecast

*Forecast valid from 08 at 12 UTC to 09 at 12  
UTC*

Wind **15** kt from the **East/Southeast**

Visibility **10** km or more

no clouds below 1500 m and no cumulonimbus

*Temporary  
from 09 at 00 UTC to 09 at 12 UTC*

Wind **25** kt from the **East/Southeast**

**TAF:** ENSB 0812/0912 12015KT CAVOK  
TEMPO 0900/0912 12025KT

## **Summary**

# Summary Weather Briefing, 2022-04-09 17:00 LT

- **Sunday, 2022-04-10**

- WAA from Siberia advects south of Svalbard, moisture flux weaker than Saturday but precipitation stronger
- Low and high-level clouds over Fram Strait and separate high cloud formation north of Greenland

- **Monday, 2022-04-11**

- Scandinavian Low center shifts towards northern Scandinavia
- Precipitation from Siberian WAA continues
- Widening of the trough west of Svalbard
- Mid- and high level clouds over (western) Fram Strait extending further north

- **Tuesday, 2022-04-12**

- Scandinavian Low center moves to the east together with major precipitation band
- In the west – formation of a new low pressure system (southern Greenland)
- Clouds and precipitation north of Fram Strait and Greenland
- CAO index increasing west and south of Svalbard