

Model CFC-11 validation

Model details:

An earlier version of ACCESS-OM2 with WOMBAT BGC component.

MOM5 + CORE-NYF atmospheric forcing

0.25 Mercator horizontal resolution with 50 vertical layers

See more information in [Menviel et al., 2018](#).

Observation dataset:

Schmittner et al., 2017 via WebODV Explore:

<https://explore.webodv.awi.de/ocean/tracer/del13c/schmittner-et-al-2017>

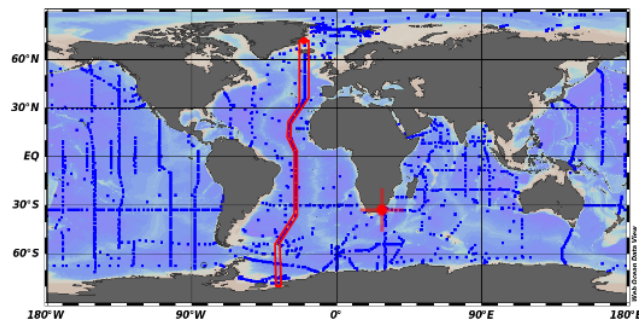
The measurement period of the stations we selected from Schmittner et al., 2017 spans from 1991 to 2005. For each station, we compared the spatially closest simulated values from the model outputs for the corresponding months.

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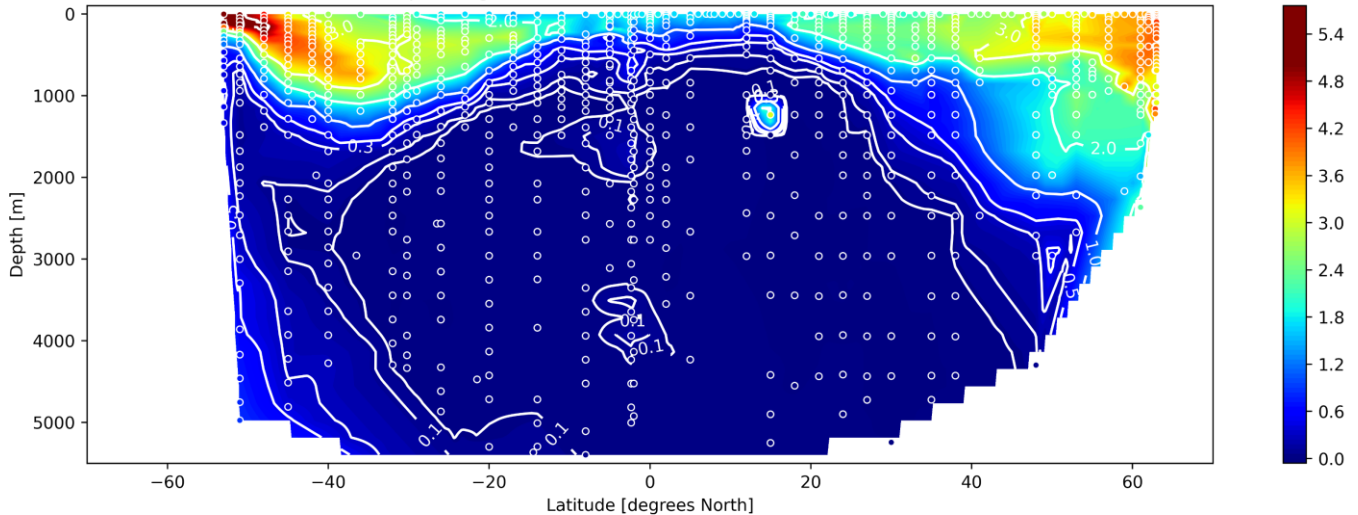
2024.4

Atlantic profile

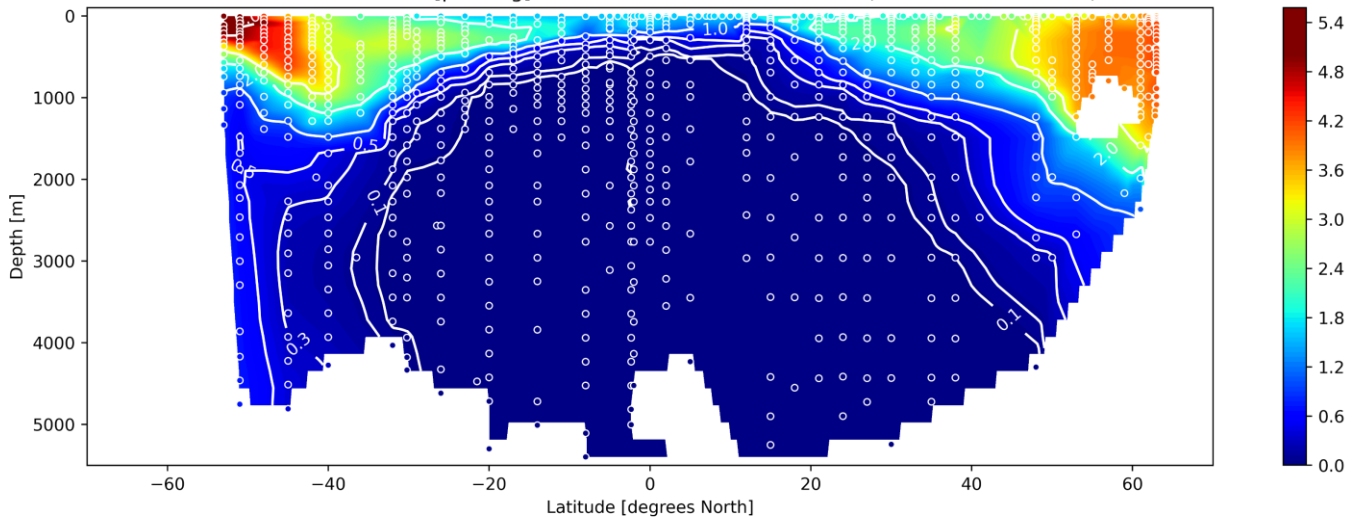
- Observations from 1993, 2003 and 2005
- C range: 0-5 pmol/kg
- (-1.5 – 1.5 pmol/kg for bottom difference pannel)



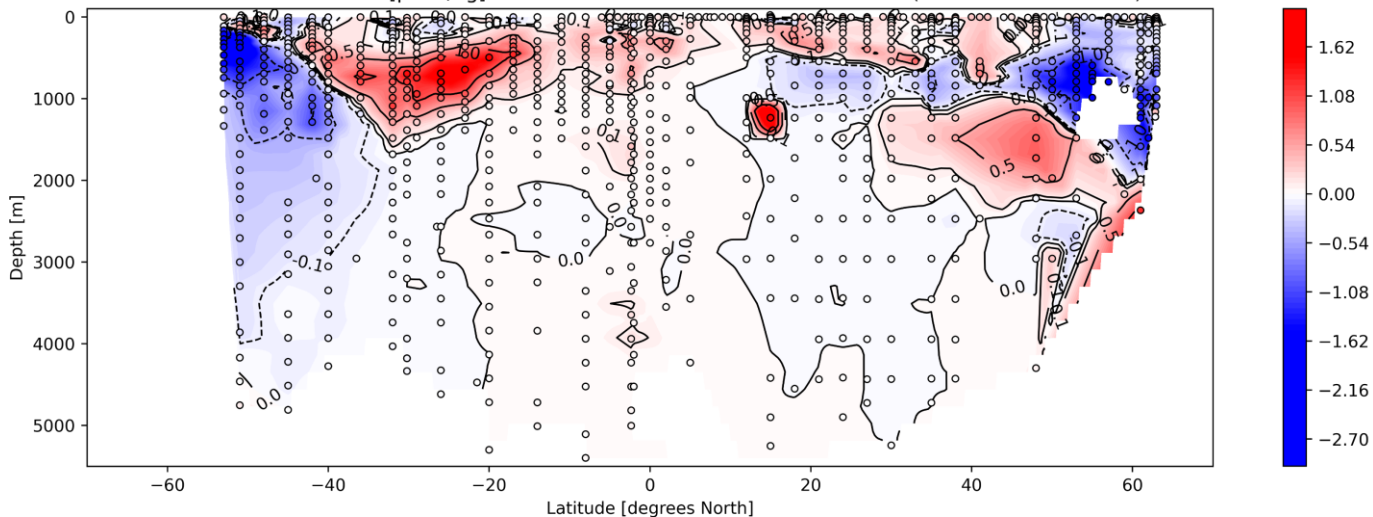
Chlorofluorocarbon 11 [pmol/kg] Concentration (Middle of the Atlantic, Schmittner et al., 2017)



Chlorofluorocarbon 11 [pmol/kg] Concentration from MOM model (Middle of the Atlantic)



Chlorofluorocarbon 11 [pmol/kg] Concentration Observation - MOM model (Middle of the Atlantic)



Pacific profile

- Observations from 1991, 1992, 2004 and 2005
- C range: 0-5 pmol/kg
- (-1.5 – 1.5 pmol/kg for bottom difference pannel)

