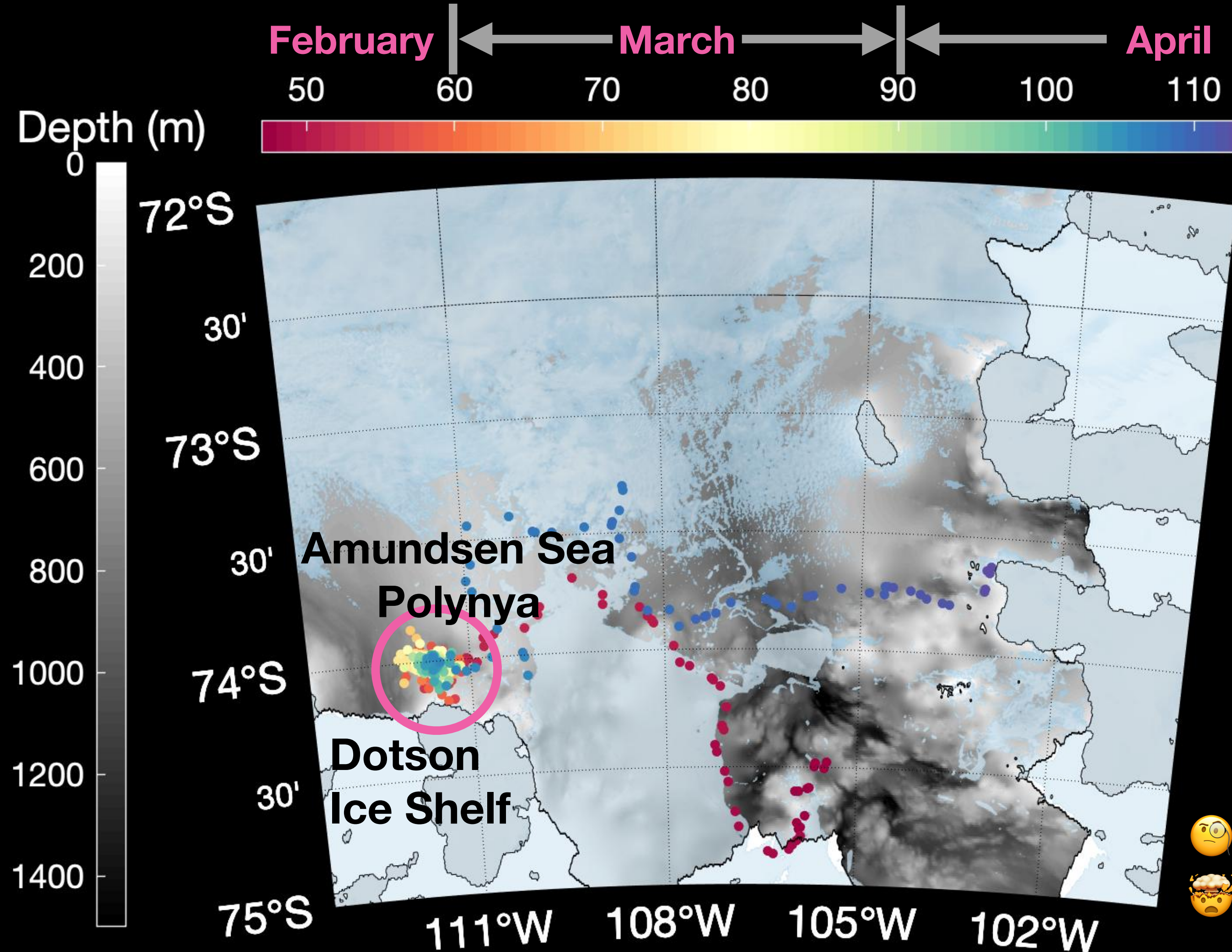


Locations of seal-tag profiles
coloured by year day - **February to April**



Upper-ocean Cooling & Salinification in the Amundsen Sea Polynya in Austral Autumn



➔ *Amundsen Sea Polynya* is the **most productive** polynya in the Antarctica

➔ It's high production has been attributed to the **abundant nutrient** brought to the **upper ocean**

🤔 What is the role the upper ocean plays?

🤔 It has been **poorly observed**, especially **in winter/autumn**

Yixi Zheng¹, Benjamin Webber¹, Karen Heywood¹, David Stevens¹
1 Centre for Ocean and Atmospheric Sciences, **University of East Anglia**

& an anonymous contributor

2 Amundsen Sea Polynya,



Natural Environment Research Council



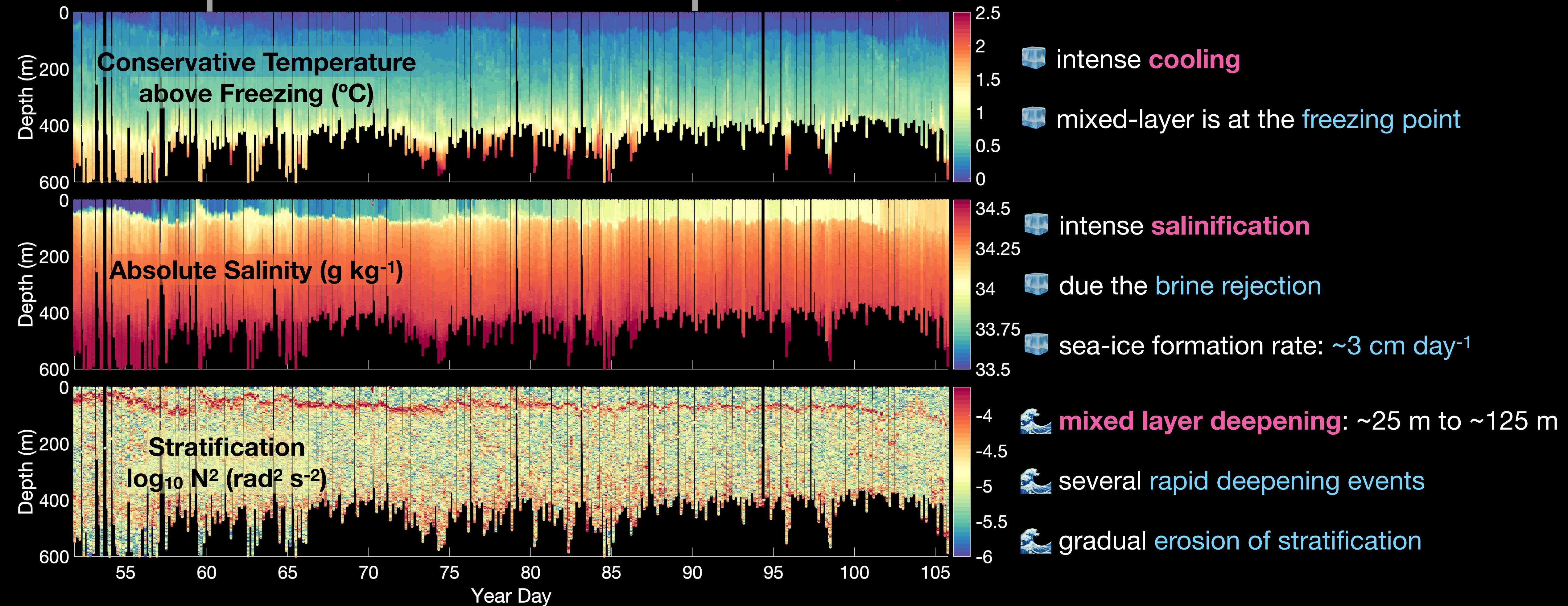
Yixi.Zheng@uea.ac.uk

1-Hz-frequency (🐱😄) time series from a *recovered seal's tag*

February

March

April



We also run a 1-D model, which reproduced the observed upper-ocean cooling, salinification and mixed-layer deepening well

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& an anonymous contributor

2 Amundsen Sea Polynya, 



Natural Environment Research Council



Yixi.Zheng@uea.ac.uk