

ARHC Virtual Meeting, April 29, 2020



IBCAO 4.0

Presented by:

Martin Jakobsson on behalf of Larry Mayer, Caroline Bringensparr,
Carlos Castro, Rezwan Mohammad, Paul Johnsson and Tomer Ketter,

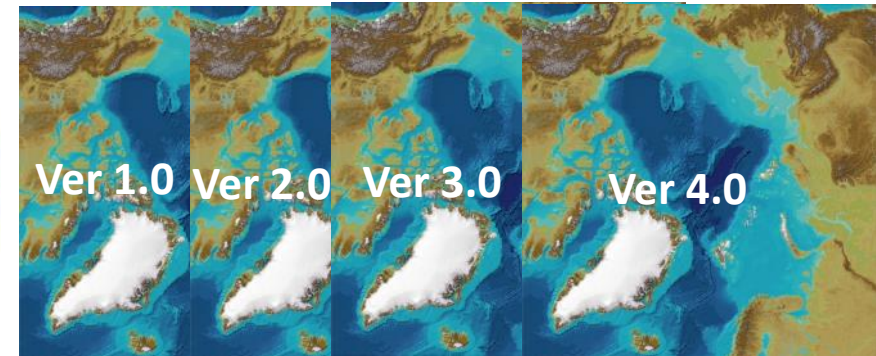
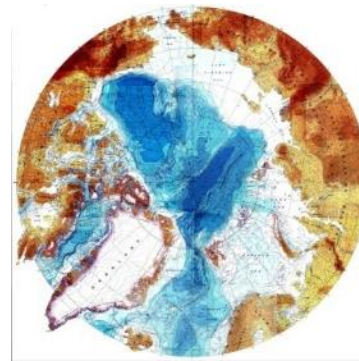
ARHC Virtual Meeting, April 29, 2020



International Bathymetric Chart of the Arctic Ocean (IBCAO):

Initiated 1997 as an IOC International Bathymetric Chart (IBC)

The IBCAO compilation work is since 2018 a task of the Seabed 2030 Arctic-North Pacific Regional Center.



1500

1800

1900

2000 2008 2012 2020

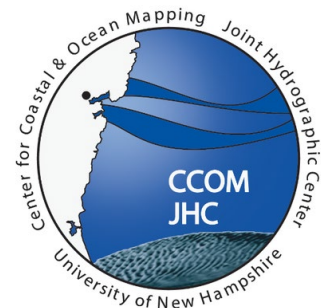
Arctic-North Pacific Ocean Regional Center



Martin Jakobsson



Larry Mayer



Rezwann Mohammad



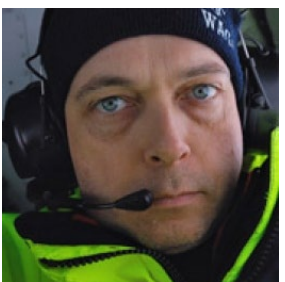
Caroline Bringespar



Tomer Ketter



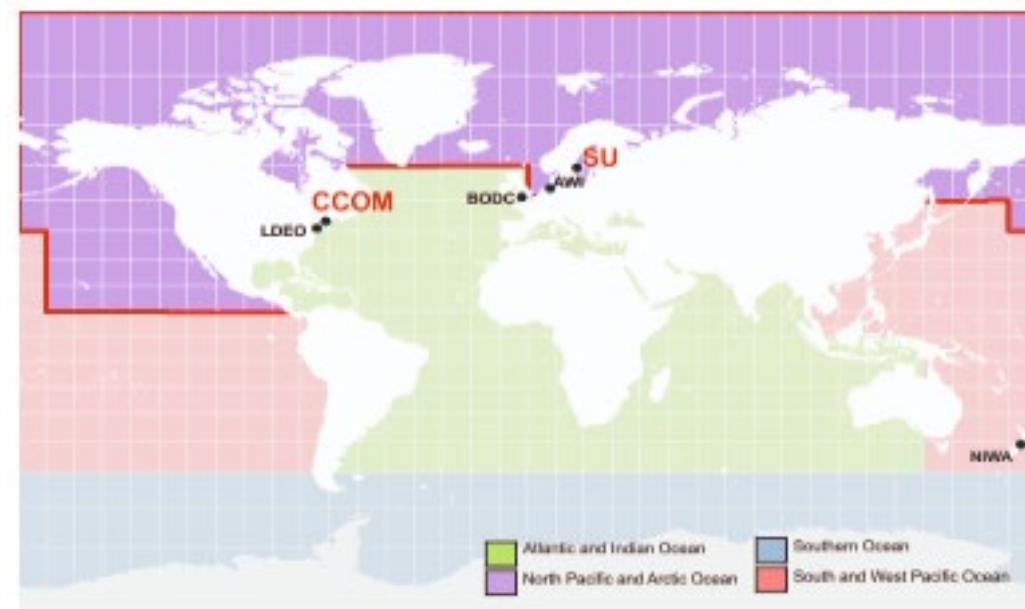
Paul Johnson



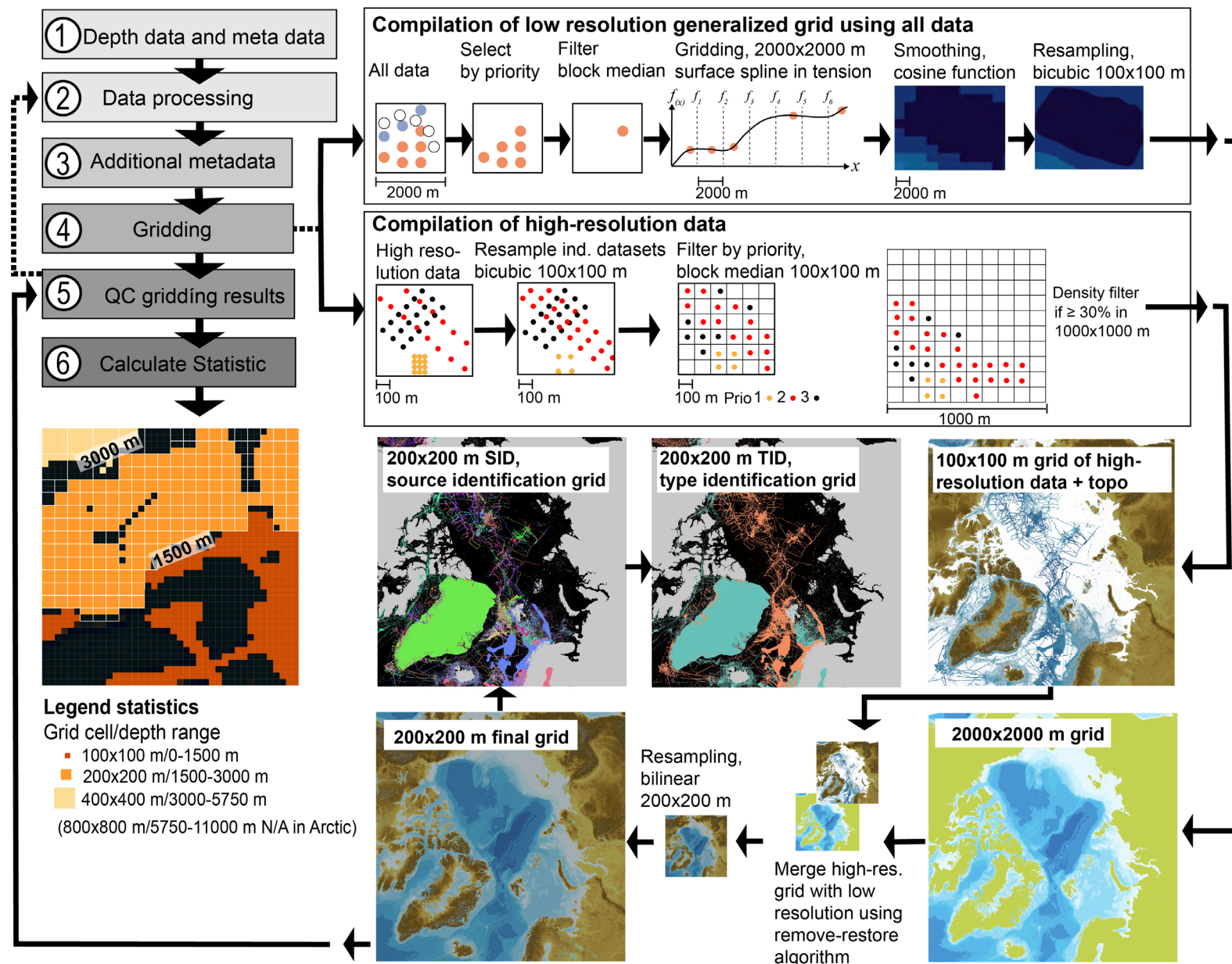
Björn Eriksson



Carlos Castro



Compilation of the IBCAO Version 4.0



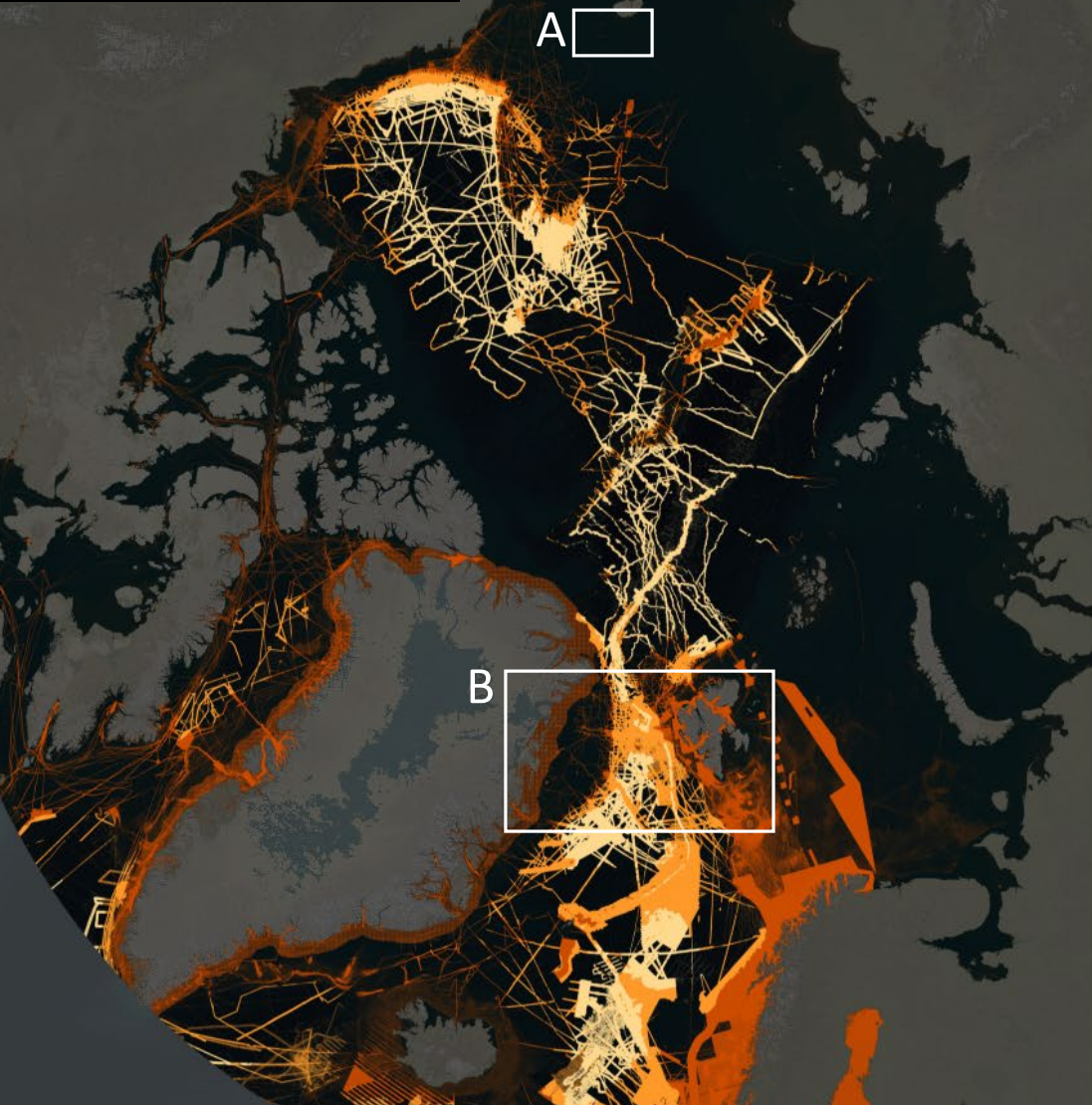
IBCAO Area
Version 3.0:
6.7 %
(Multibeam 5.4 %)

v3.0
20120608

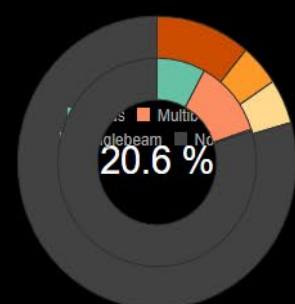


IBCAO Area
Version 4.0:
19.8 %
(Multibeam 14.3 %)

v4.0.2
20200316

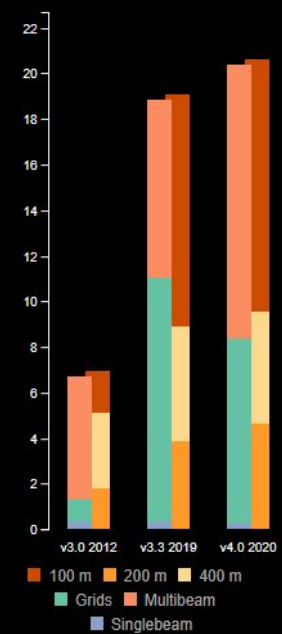


Coverage v4.0.0
Seabed
2030 area



100 m 200 m 400 m
No data

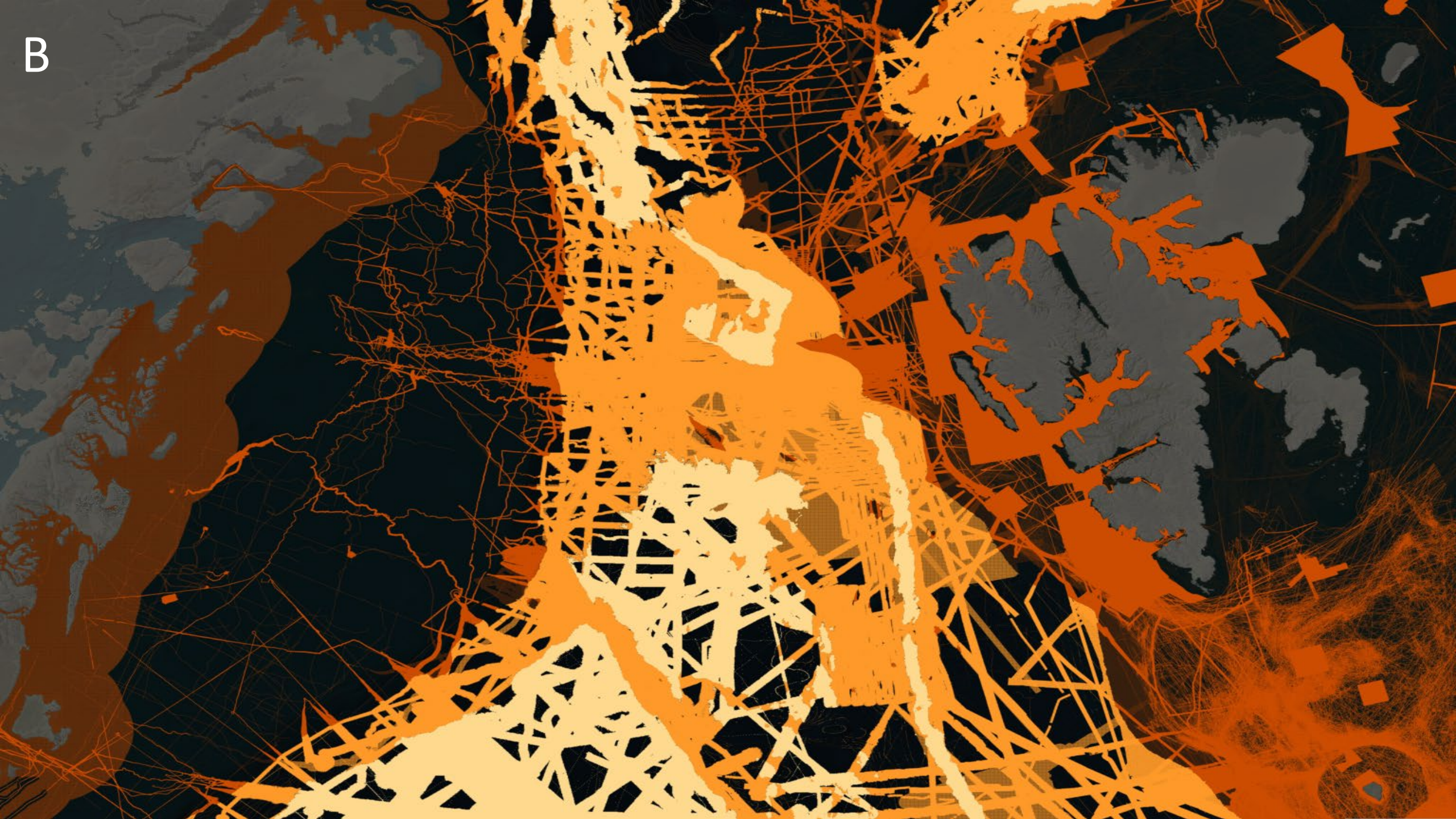
Coverage

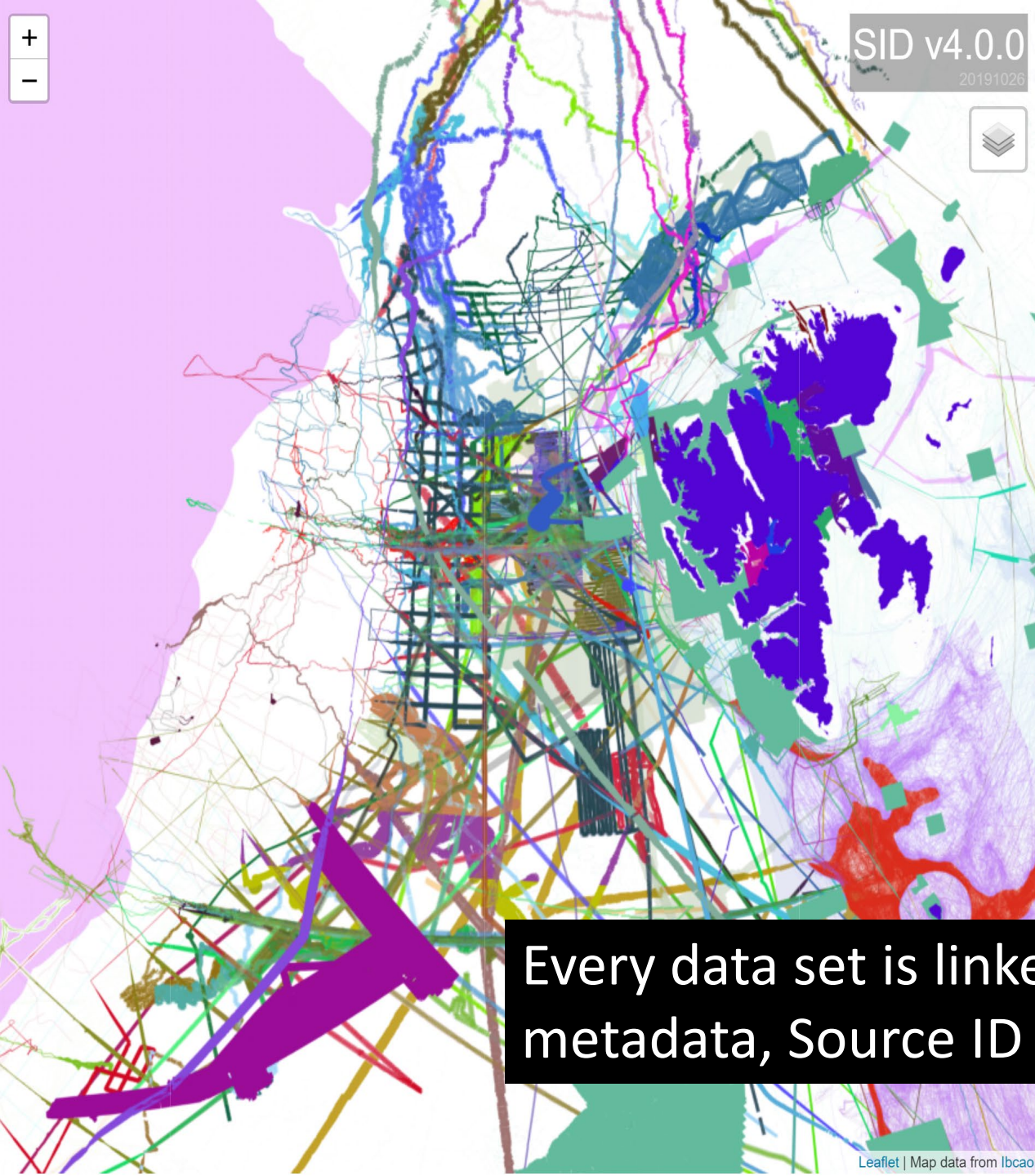


A

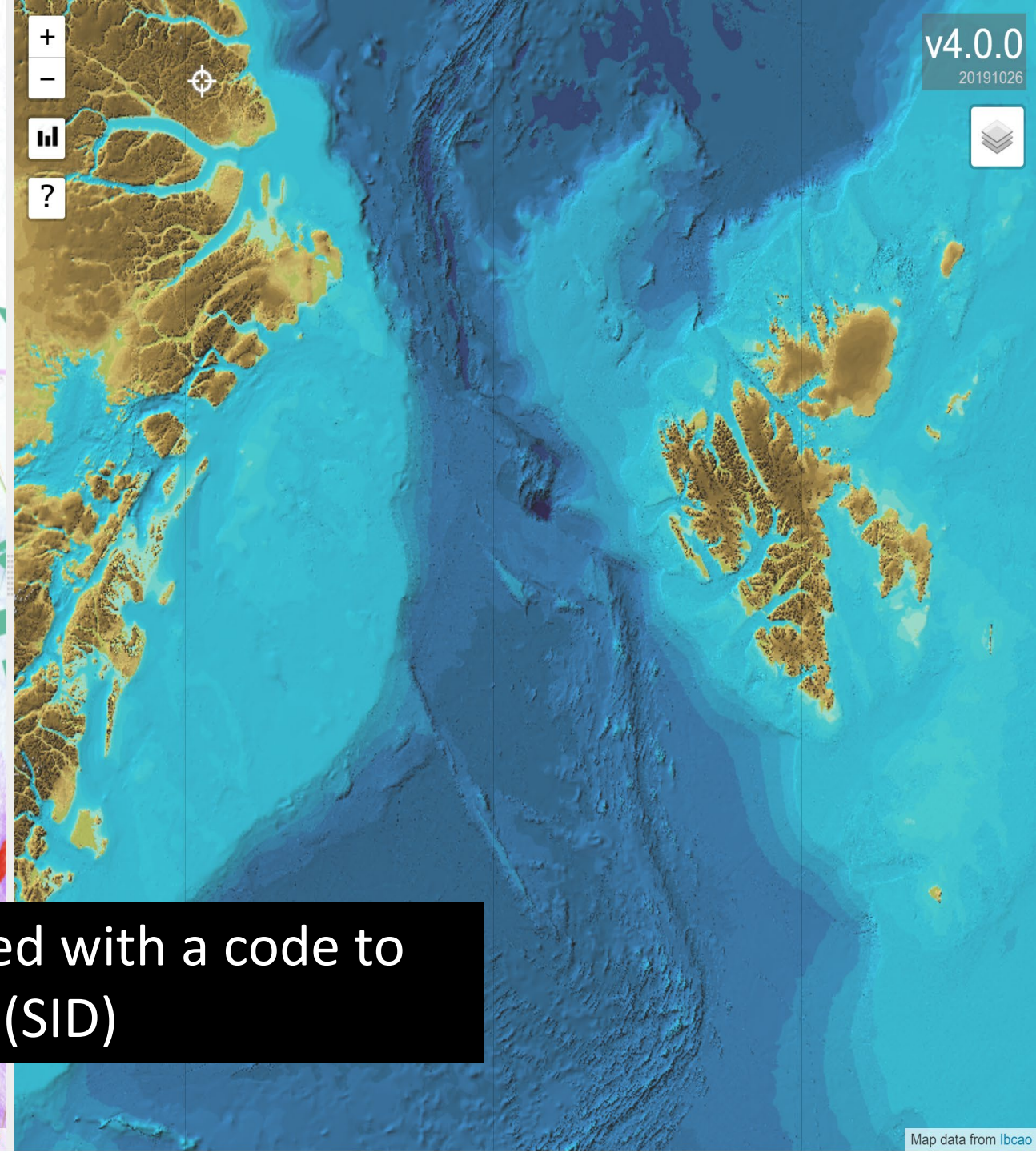


B





Every data set is linked with a code to metadata, Source ID (SID)



No updates since 3.0 as there are no new data contributed

EEZ

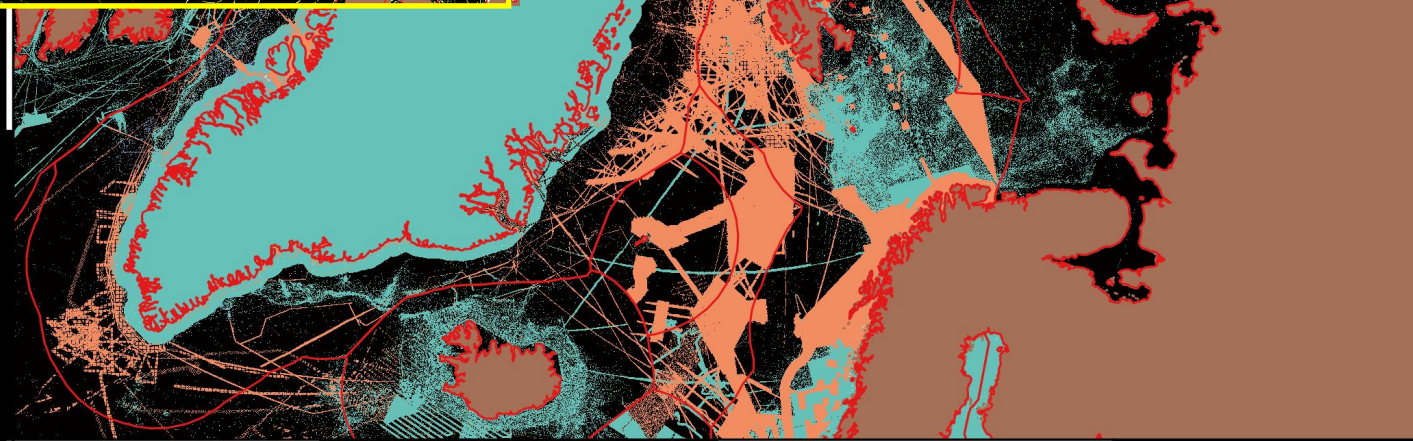
ibcao_v4.0_200m_tid

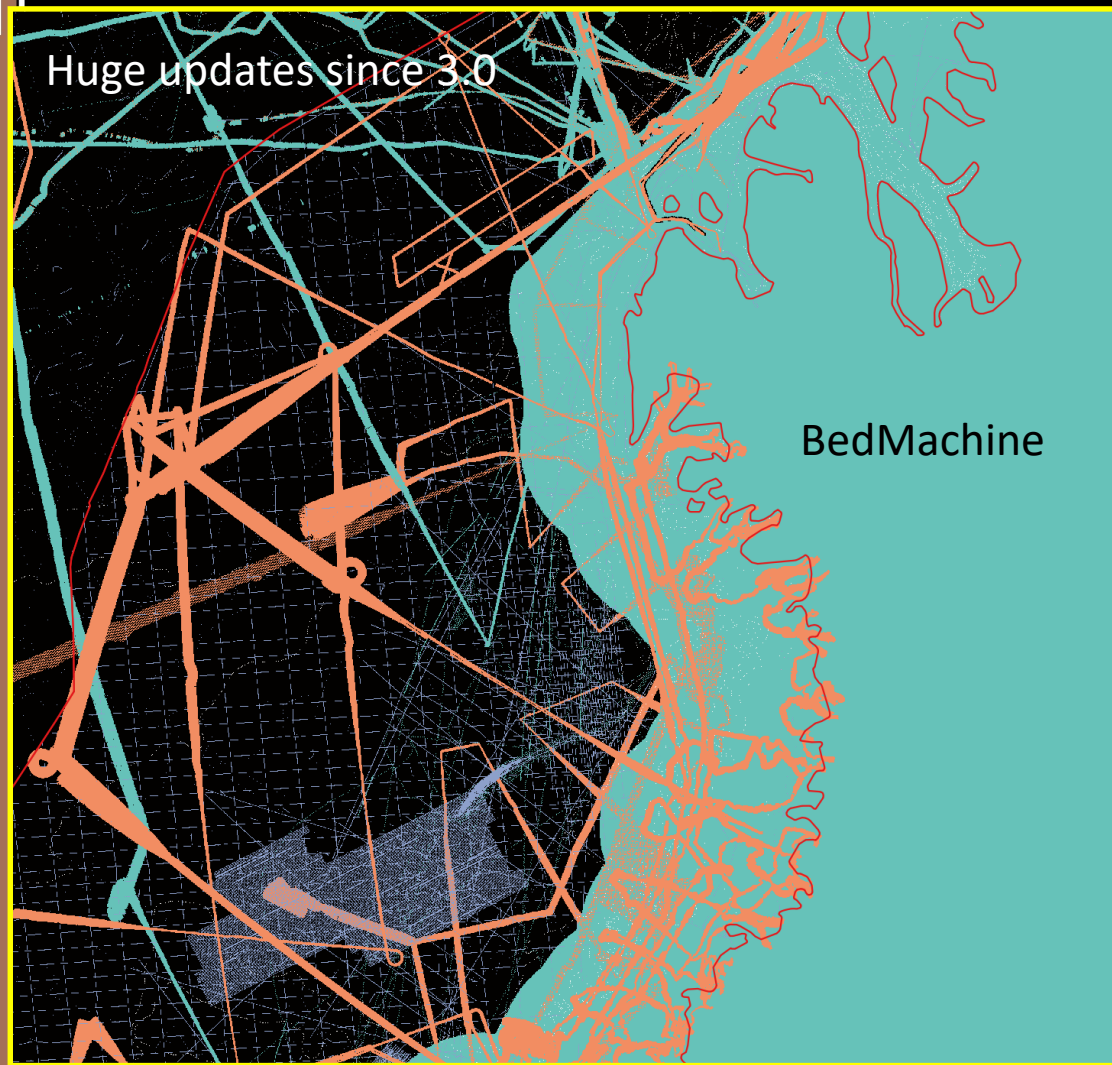
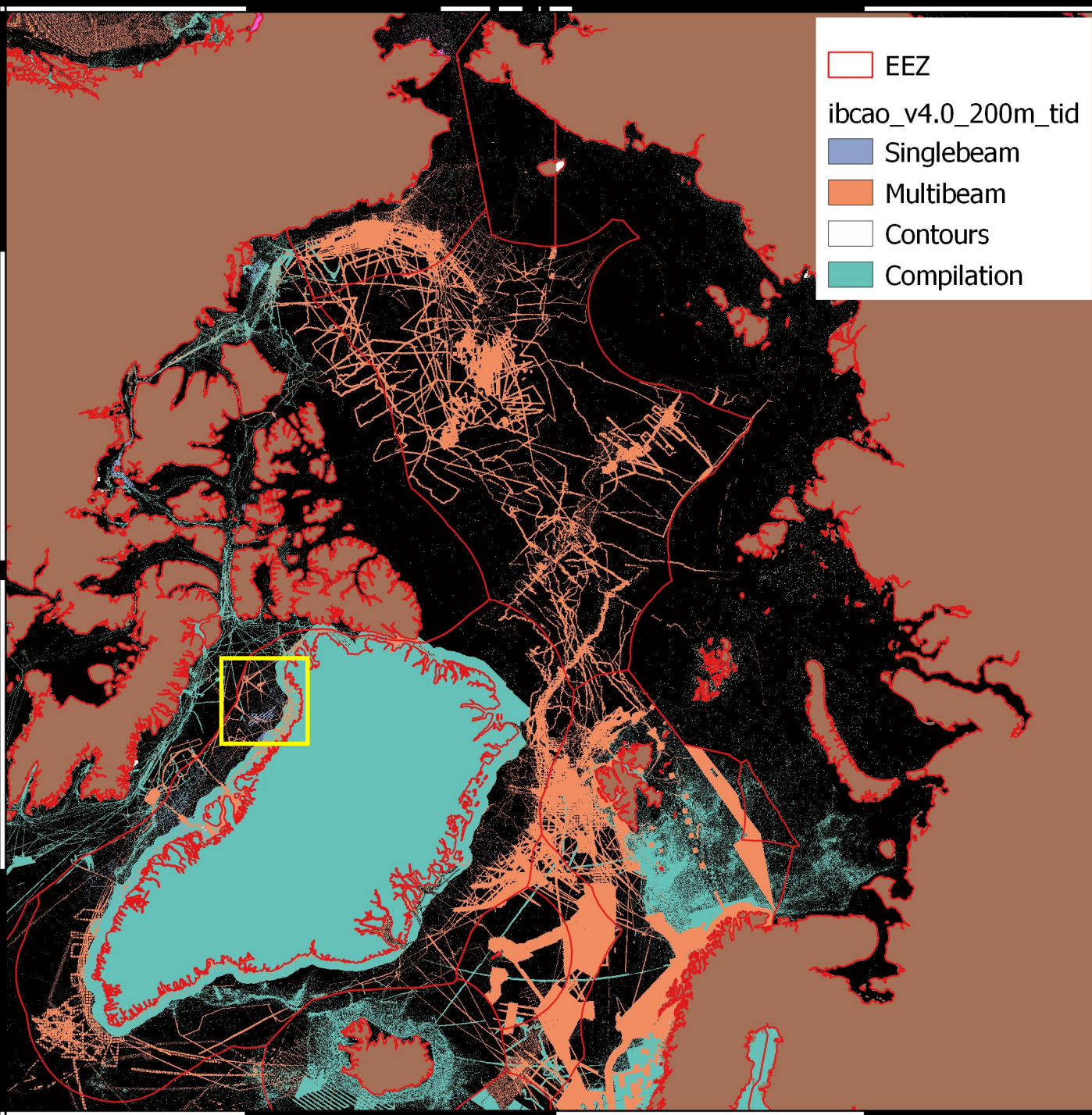
Singlebeam

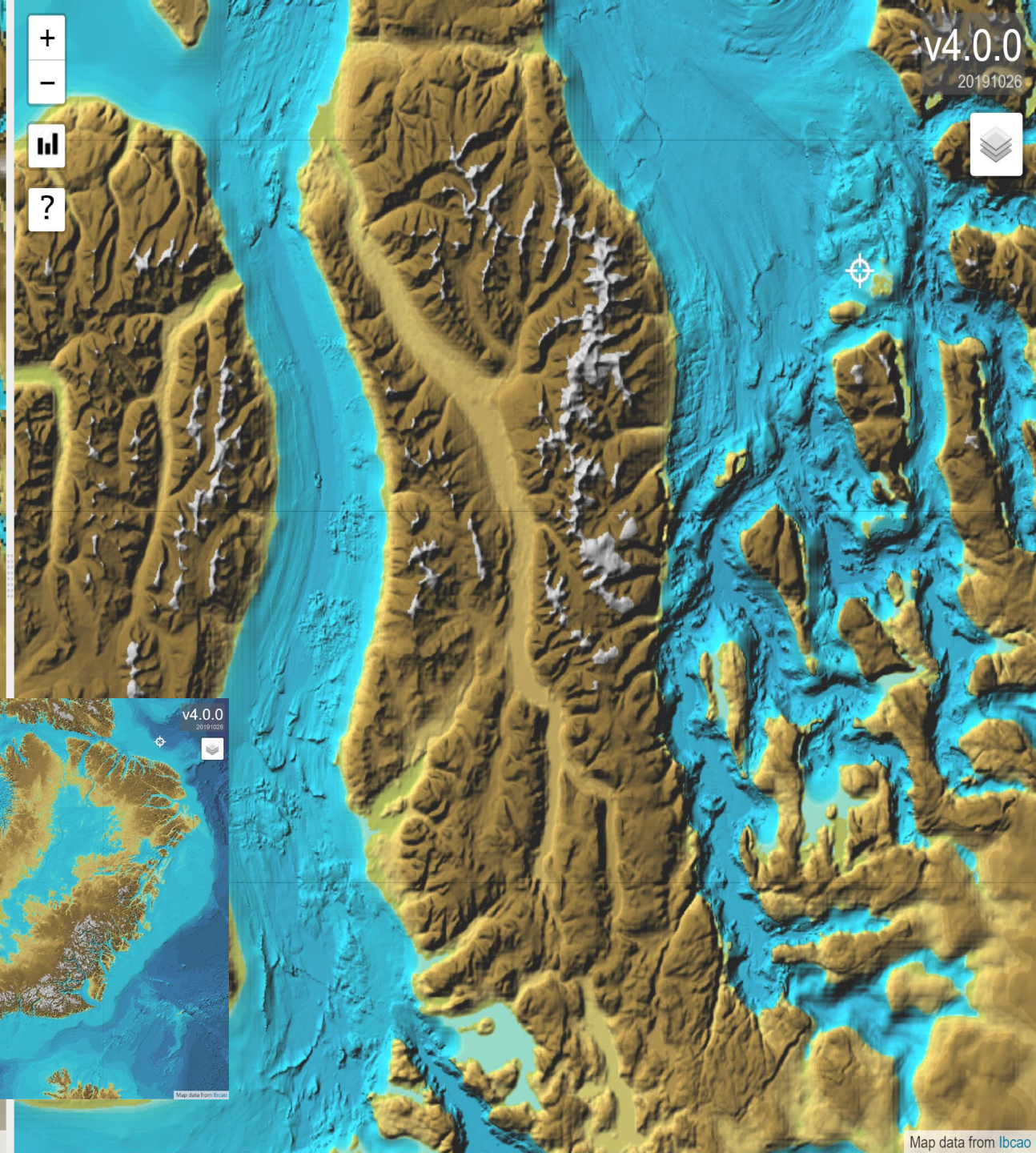
Multibeam

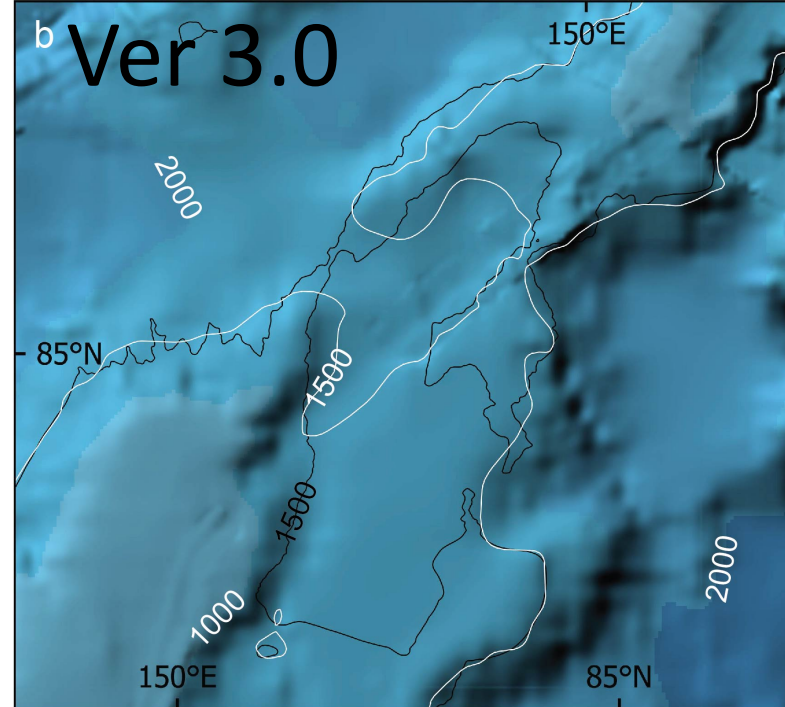
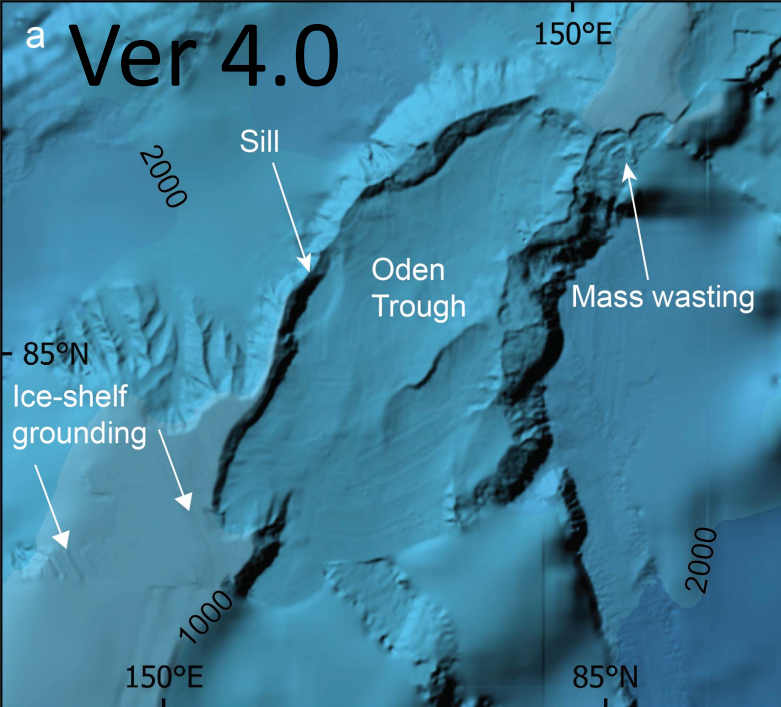
Contours

Compilation



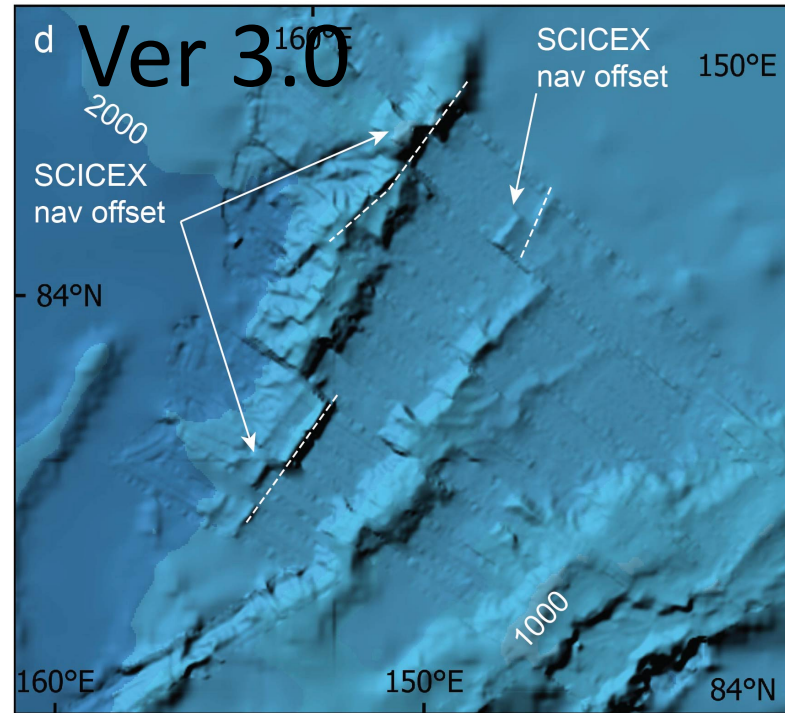
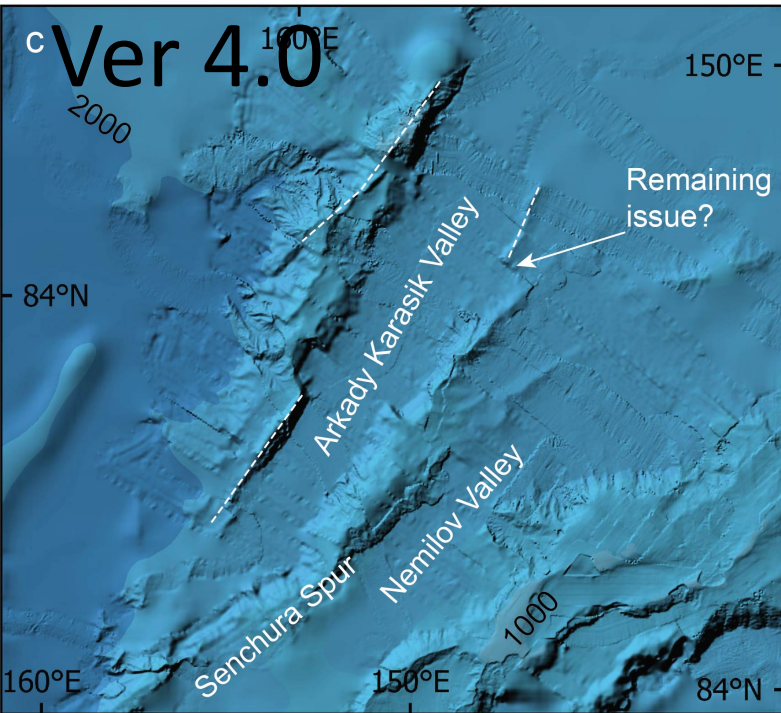






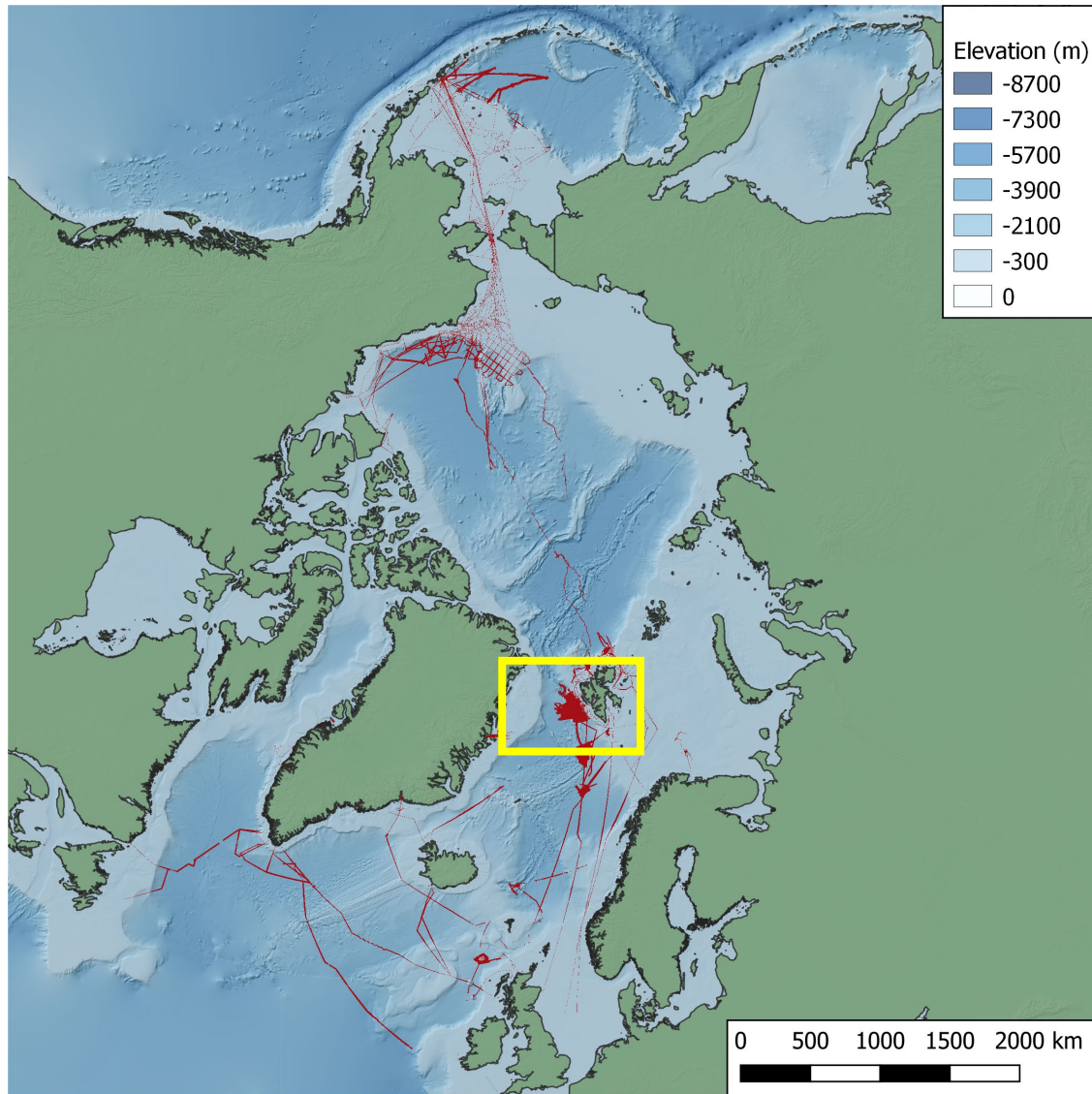
Lomonosov Ridge

Examples of improvements

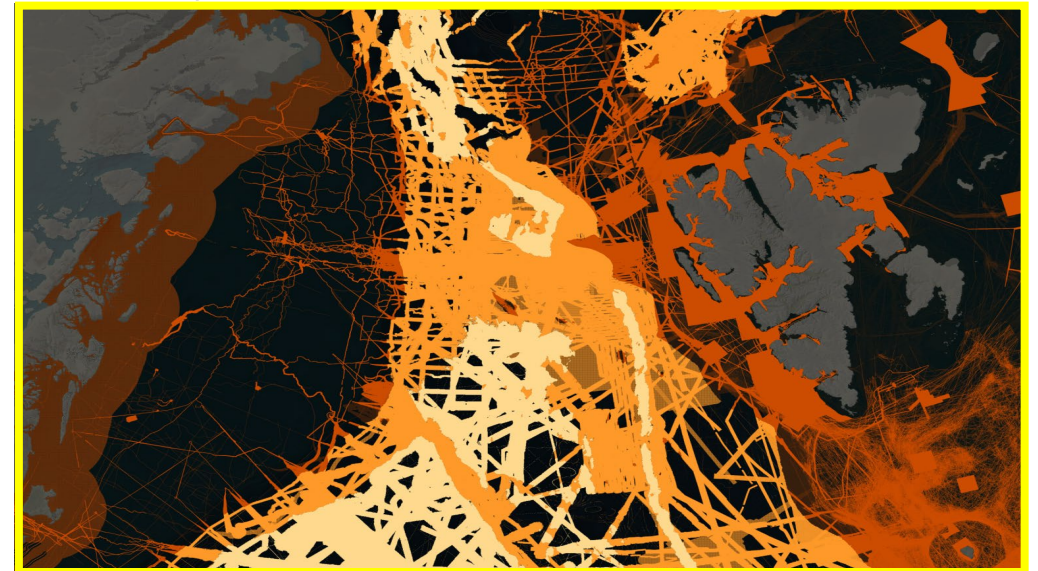


“Rubber sheeting”
poorly navigated SCICEX
submarine
interferometric sonar
data

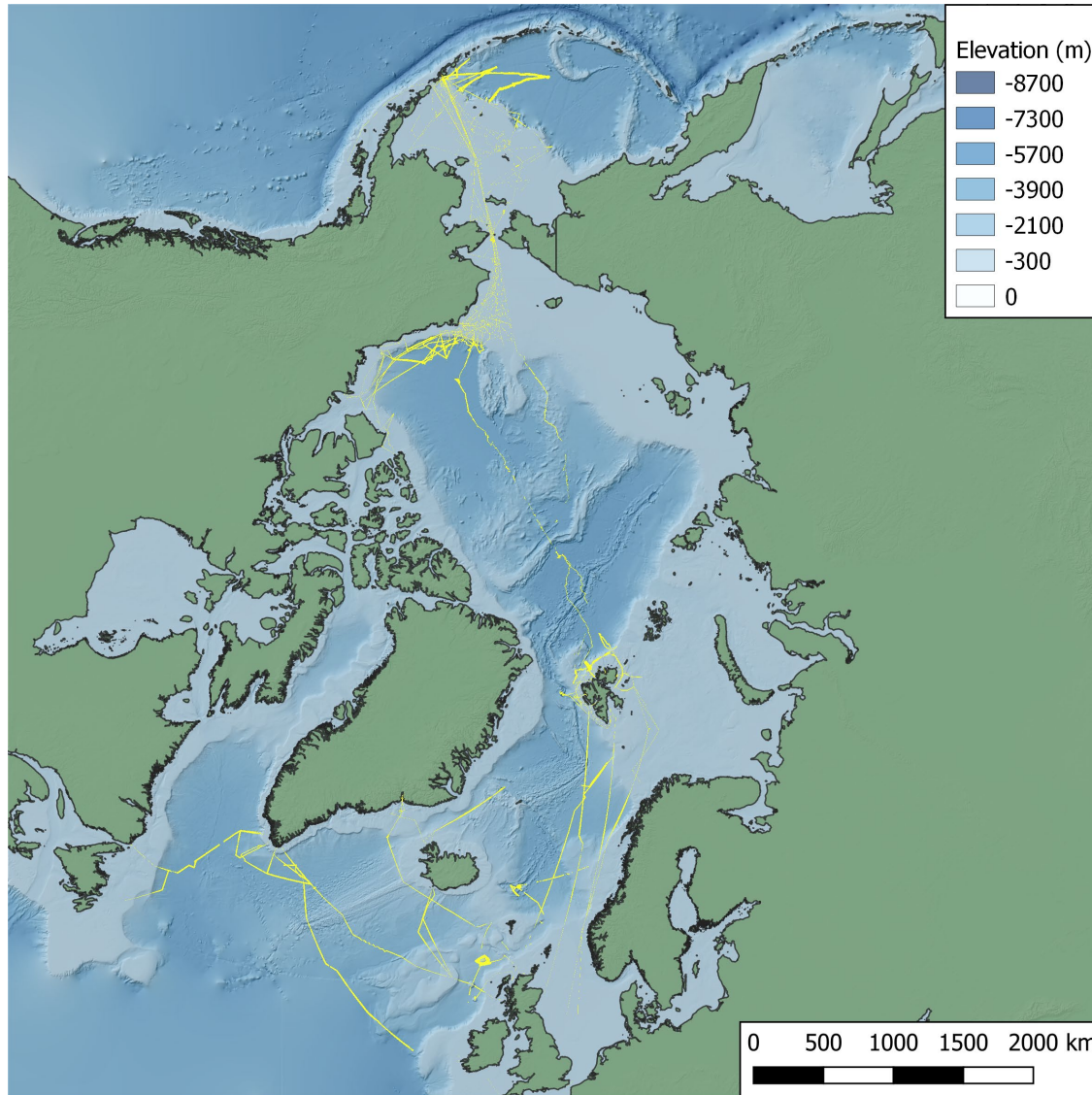
New data since Version 4.0



Already in Version 4.0



Multibeam data to be processed



Data	Status
Arctic Ocean 2018	MB raw data, needs processing
British Arctic Survey JR99	MB "Raw", needs processing
British Arctic Survey JR106	MB "Raw", needs processing
British Arctic Survey JR127	MB "Raw", needs processing
British Arctic Survey JR132	MB "Raw", needs processing
British Arctic Survey JR133	MB "Raw", needs processing
British Arctic Survey JR142	MB "Raw", needs processing
British Arctic Survey JR210	MB "Raw", needs processing
British Arctic Survey JR302	MB "Raw", needs processing
British Arctic Survey JR17007	MB "Raw", needs processing
Danish Navy Christof Pearce	MB raw data, on hold (EIVA format)
NOAA HLY1101 2011	MB raw data, needs processing
NOAA HLY1103 2011	MB raw data, needs processing
NOAA HLY1201 2012	MB raw data, needs processing
NOAA HLY1203 2012	MB raw data, needs processing
NOAA HLY1301 2013	MB raw data, needs processing
NOAA HLY1303 2013	MB raw data, needs processing
NOAA HLY1401 2014	MB raw data, needs processing
NOAA HLY1402 2014	MB raw data, needs processing
NOAA HLY1502 2015	MB raw data, needs processing
NOAA KM0312 2003	MB raw data, needs processing
NOAA SKQ201505S 2015	MB raw data, needs processing
NOAA SKQ201509T 2015	MB raw data, needs processing
NOAA SKQ201511S 2015	MB raw data, needs processing
NOAA TN250 2010	MB raw data, needs processing
PANORAMA 2015	MB Raw Data, on hold

IBCAO 4.0 download from GEBCO: https://www.gebco.net/data_and_products/gridded_bathymetry_data/arctic_ocean/

IBCAO 4.0 download from BODC: https://www.bodc.ac.uk/data/published_data_library/catalogue/10.5285/a01d292f-b4a0-1ef7-e053-6c86abc0a4b2/

Title	The International Bathymetric Chart of the Arctic Ocean (IBCAO) Version 4.0.
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