

Expedition Arctic Ocean 2016 - Meteorological, Oceanographic and Ship Data Collected Onboard Icebreaker Oden during August to September 2016

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Is part of collection at SND: [Arctic Ocean 2016](#), [Icebreaker Oden](#)

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Download data

ECDS0221-001-V1.0.zip (35.71 MB)

Associated documentation

ECDS 0221-001 ao16route.png (1.43 MB)

Download all files

ecds0221-1-1.0.zip (~37.15 MB)

Citation

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[Swedish Polar Research Secretariat](#)

Description

Arctic Ocean 2016 is a polar research expedition in collaboration with Canada with the two icebreakers Oden and Louis S. St-Laurent.

The icebreaker Oden will depart from Longyearbyen, Svalbard, 8 August to meet up with the Canadian icebreaker Louis S. St-Laurent and launch the expedition. For six weeks, the vessels will operate in the Arctic Ocean, mainly in the Amundsen Basin and in areas around the underwater mountain ranges Lomonosov Ridge and Alpha Ridge.

The aim of the Canadian research programme is to collect data in support of Canada's extended continental shelf submission to the Commission on the Limits of the Continental Shelf, prepared in accordance with the United Nations Convention on the Law of the Sea (UNCLOS). The Swedish research is focused on environmental chemistry, marine geology and atmospheric research. On board

Oden there will also be Danish and Norwegian researchers working with marine geology and ice management.

This dataset contains meteorological, oceanographic and ship data collected during the Canadian-Swedish expedition Arctic Ocean 2016, which was an international research cruise using the icebreaker Oden.

Data include:

Meteorological variables: Air temperature, Humidity, Wind direction/speed, Atmospheric pressure, Cloud height/cloudiness, Photosynthetic Active Radiation (PAR).

Oceanographic variables: Sea water temperature, Conductivity, Salinity and Sound velocity.

Ship data: Position, Speed, Course, Water depth.

Further metadata on the instrumentation and the individual variables can be found in the info file. Graphics and files describing the route can found in the package.

Data contains personal data

No

Language

[English](#)

Time period(s) investigated

2016-08-08 - 2016-09-20

Data format / data structure

[Numeric](#)

[Geospatial](#)

Data collection 1

- Time period(s) for data collection: 2016-08-08 - 2016-09-20
- Instrument: CTD - Conductivity, Temperature, Depth

Geographic spread

Geographic location: [Arctic Ocean](#)

Geographic description: Arctic Ocean, mainly in the Amundsen Basin and in areas around the underwater mountain ranges Lomonosov Ridge and Alpha Ridge.

Research area

[Engineering and technology](#) (Standard för svensk indelning av forskningsämnen 2011)

[Environmental sciences](#) (Standard för svensk indelning av forskningsämnen 2011)

[Meteorology and atmospheric sciences](#) (Standard för svensk indelning av forskningsämnen 2011)

[Oceanography, hydrology and water resources](#) (Standard för svensk indelning av forskningsämnen 2011)

[Climatology / meteorology / atmosphere](#) (INSPIRE topic categories)

[Oceans](#) (INSPIRE topic categories)

[Environment](#) (INSPIRE topic categories)

Keywords

[Meteorology](#), [Atmosphere](#), [Atmospheric winds](#), [Surface winds](#), [Atmospheric temperature](#), [Air temperature](#), [Atmospheric water vapor](#), [Humidity](#), [Clouds](#), [Atmospheric pressure](#), [Surface pressure](#), [Oceans](#), [Salinity](#), [Conductivity](#), [Density](#), [Ocean temperature](#), [Water temperature](#), [Water depth](#), [Seafloor topography](#), [Bathymetry](#), [The icebreaker oden](#)

Publications

Link to publication list:

[Publications and data](#)

If you have published anything based on these data, [please notify us](#) with a reference to your publication(s). If you are responsible for the catalogue entry, you can update the metadata/data description in DORIS.

Polygon (Lon/Lat)

-180, 90

-180, 77.6

180, 77.6

180, 90

-180, 90

Accessibility level

Access to data through SND

Data are freely accessible

Use of data

[Things to consider when using data shared through SND](#)

License

[CC BY 4.0](#)

Versions

Version 1.0. 2018-08-30

Homepage

[Polar Research Portal](#)

Related research data in SND's catalogue

[Arctic Ocean 2016 - Meteorological and Aerosol Data](#)

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[Icebreaker Oden](#)

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