

## WP 2 – Station Manager Forum

**Facilitating cooperation and best practice sharing between station managers at arctic, northern boreal and alpine research stations to improve the services provided to users and other stakeholders.**

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## Aim of the WP

The INTERACT Station Manager Forum aims to foster a culture of cooperation among research stations in an advanced infrastructure community, and between this advanced infrastructure community and scientific communities, industries, local communities and infrastructures in other regions.



# Aim of the WP

## The specific objectives are:

- To innovate station management to better support excellent research and monitoring and to collect, exchange and refine information needed for operating INTERACT stations as one advanced infrastructure.
- To support excellent science and innovation addressing INTERACT's Societal Challenges (SC) by interfacing with JRA's and TA/RA/VA activities.
- To integrate new partner stations, their activities and data in the existing advanced community of INTERACT stations.
- To promote cooperation on infrastructure management and safety with Antarctic, alpine, atmospheric and marine research infrastructure communities.



# Partners involved in the WP

## The Station Managers Forum includes:

- 64 partners with funding from the EU Commission.
- Managers of 20 so-called 'Observer Stations', i.e. research stations involved in INTERACT, but without funding from the EU Commission.
- A secretariat and invited externals to support the work in the forum.

## The Station Manager Forum aims at providing a platform for knowledge exchange between:

- Station Managers at 86 INTERACT stations.
- The INTERACT Station Manager Forum and all other partners in INTERACT.
- INTERACT Station Managers and all internal and external stakeholders of relevance.



*INTERACT,  
Vindeln, Sweden,  
September 2019*

## Partners involved in the WP

The Station Manager Forum is being serviced by a secretariat at University of Copenhagen and Aarhus University, including:

- Morten Rasch, University of Copenhagen (leader of Workpackage 2, Task 2.0, Task 2.3 and Task 2.4)
- Elmer Topp-Jørgensen, Aarhus University (leader of Task 2.1 and 2.5)
- Marie Frost Arndal, Aarhus University
- Laura Lønstrup, University of Copenhagen



*Morten*



*Elmer*



*Marie*



*Laura*



# Partners involved in the WP

## Other key partners in INTERACT III are:

- Gerlis Fugmann, Alfred Wegener Institute for Polar and Marine Research, Germany, APECS (leader of Task 2.2, Transport and communication).
- Jan Dick, United Kingdom Center for Ecology and Hydrology, United Kingdom (leader of Task 2.6, The Arctic Resort).
- Frej Sorento Dichmann, Danish Agency for Science and Higher Education, Denmark (Agreement on Enhancing International Arctic Scientific Cooperation).
- Martin Breum, HAMACOM, Denmark (improving communication with decision makers).
- Britta Löfvenberg, Umeå University, Sweden (INTERACT GIS).
- Øystein Godøy, Norwegian Meteorological Institute, Norway (Data Watch Guard).
- Sydonia Bret-Harte, University of Alaska, USA (national legislation).
- Sergey Kiportin, Tomsk State University, Russia (national legislation).
- Mickaël Lemay, Centre d'études nordiques (CEN), Canada (national legislation).
- Melissa Nacke, Association of Arctic Expedition Cruise Operations, Norway (tourism)



Gerlis

Jan

Frej

Martin

Britta

Øystein

Doni

Sergey

Mickaël

Melissa

# Tasks

## Tasks in Workpackage 2:

**Task 2.0:** Operate the Station Managers' Forum (Lead: UCPH)

**Task 2.1:** The unpredictable Arctic (Lead: AU)

**Task 2.2:** Transport and communication (Lead: AWI)

**Task 2.3:** Making station data and publications widely available (Lead: UCPH)

**Task 2.4:** Station outreach: Educating local communities and decision makers (Lead: UCPH)

**Task 2.5:** Cleaner Arctic (Lead: AU)

**Task 2.6:** The Arctic Resort (Lead: UKRI)



# Tasks

## Task 2.0: Operate the Station Managers' Forum (Lead: UCPH)

- operate the SMF as an advanced platform by coordinating tasks within the WP, and linking INTERACT station managers to other WP's and external partners by convening five SMF meetings (Subtask 2.0.1).
- increase the mutual knowledge on station management at INTERACT stations through share-of-knowledge seminars on environmental, operational, technical and safety aspects for station managers and/or technical staff (Subtask 2.0.2).
- improve best practices on infrastructure management and safety by cooperating with relevant EU Arctic Cluster projects and other entities of relevance, e.g. Antarctic, alpine, marine and atmospheric research infrastructures (Subtask 2.0.3).

*Continued*



Morten



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Marie



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Britta





## Tasks

- develop the INTERACT GIS to make it a leading international platform operated for the research and other communities by (i) consolidating management organization developed in INTERACT II, (ii) ensuring effective operation with an increasing number of stations involved, (iii) integrating standard station descriptions and science metadata and data in formats developed in cooperation with other infrastructure communities, (iv) integrating thematic maps (climate zones, vegetation, permafrost etc.) in cooperation with relevant organisations/networks (Subtask 2.0.4).
- present relevant INTERACT products ('Station Catalogue', 'Best Practices of Station Management', 'Field Work Planning Handbook', 'INTERACT Minimum Monitoring Programme') to a wider audience by developing smart web-editions to be integrated in the INTERACT homepage and/or INTERACT GIS (Subtask 2.0.5).

# Tasks

## Task 2.1: The unpredictable Arctic (Lead: AU)

- interface WP4 partners, with research stations and surrounding communities to (i) identify relevant types of extreme events, (ii) develop monitoring programmes for extreme events and rapid biodiversity changes, (iii) test the feasibility of monitoring programmes designed by WP4 at four research stations, (iv) ensure dissemination of refined protocols, (v) provide observations on unpredicted extreme events, (vi) develop mechanisms for stations and their communities to provide data on unpredicted extreme events to WP4, decision makers and other stakeholders (Subtask 2.1.1).



Elmer



The Arctic Research Station



Oulanka Research Station



Greenland Institute of  
Natural Resources



Centre d'études nordique



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Laura



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# Tasks

## Task 2.2: Transport and communication (Lead: AWI)

- survey Arctic Council's 'Agreement on Enhancing International Arctic Scientific Cooperation' effectiveness on the permit systems of relevance for scientists travelling to different Arctic countries, including station access systems, Visa application systems, sample and equipment import/export systems and other authority permits needed to conduct science in the Arctic (Subtask 2.2.1).
- identify bottlenecks for Arctic cross-border science cooperation and communicate them to WP5 (Subtask 2.2.1).
- develop an information platform on the INTERACT web site concerning permit procedures and bottlenecks relevant to scientists (Subtask 2.2.1).
- work with WP5 to identify the ultimate communication and positioning system for INTERACT stations and local communities (Subtask 2.2.2).
- identify ways in which the CO<sub>2</sub> emissions from research travel to field sites can be reduced (Subtask 2.2.3).



Gerlis



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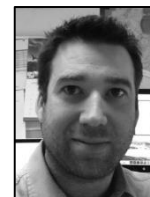
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Doni



Sergey



Mickaël



Frej

# Tasks

## Task 2.3: Making station data and publications widely available (Lead: UCPH)

- implement station based state-of-the-art monitoring across the Arctic by providing seminars for station managers and station technicians on state-of-the-art methods/technologies for environmental monitoring based on input from relevant organisations/networks (Subtask 2.3.1).
- introduce metadata standards (identified in INTERACT II) for description of international scientific networks and organisations in collaboration with the Data Watch Guard (Subtask 2.3.1).
- provide open access to selected scientific data by establishing an INTERACT repository for key climate related parameters to be integrated in INTERACT GIS in cooperation with the Data Watch Guard (Subtask 2.3.2).
- contribute to WP3 and WP6 with a selection of photos from contrasting stations to develop machine-learning for environmental change detection (Subtask 2.3.2).



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Øystein

# Tasks

## Task 2.4: Station outreach: Educating local communities and decision makers (Lead: UCPH)

- develop courses and community based monitoring programmes on environmental issues of local relevance for schools and/or high schools near four stations (Subtask 2.4.1).
- arrange 'Open House' thematic days for the general public at a range of INTERACT Stations with focus on Climate Change, invasive species and plastics (Subtask 2.4.1).
- collaborate with WP7 to improve communication between INTERACT stations and decision makers across scales by developing a course for station managers on how to communicate with decision makers from local to international level and by making increased use of press releases produced by professional communicators to reach decision makers at different levels (Subtask 2.4.2).



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The Arctic Research Station



Arctic Station



Oulanka Research Station



Centre d'études nordique



# Tasks

## Task 2.5: Cleaner Arctic (Lead: AU)

- make a survey on energy use and sources (heat and electricity), plastic types and usage, and waste handling at INTERACT stations to document current consumption and emission levels (Subtask 2.5.1).
- develop a checklist for environmentally friendly stations (Subtask 2.5.1).
- produce a pocket guide on how to reduce plastic consumption and pollution at research stations and in local communities (Subtask 2.5.1).
- make a pilot implementation plastic monitoring programme at four selected INTERACT stations in collaboration with local communities in the actual data collection (Subtask 2.5.2).
- develop recommendations to reduce environmental impact based on surveys in Subtask 2.5.1 (Subtask 2.5.2).



Elmer



Marie



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Morten



# Tasks

## Task 2.6: The Arctic Resort (Lead: UKRI)

- consult with station managers to determine actual and potential opportunity for tourism at their sites in order to develop sustainable tourism at INTERACT research stations (Subtask 2.6.1).
- assessing best practices for handling the impact of tourism at research stations and in their study areas to contribute to WP9 (Subtask 2.6.1).
- implement best practices for how research stations can make tourists respectfully aware of station operations, science and local communities with input from WP9 (Subtask 2.6.1)
- identify with WP9 mechanisms to better educate tour companies and tourists (Subtask 2.6.1).



Jan



Melissa



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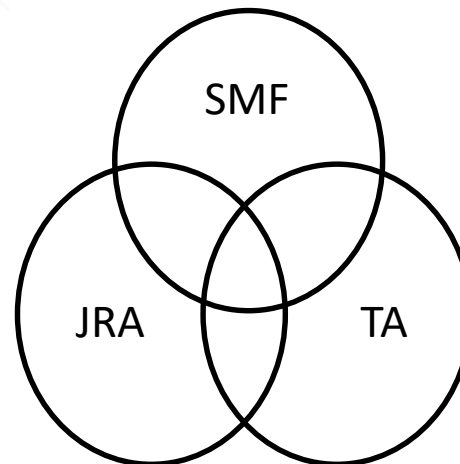
## Future deliverables

- D2.1** INTERACT GIS with new features (Month 22)
- D2.2** Updated digital Station Catalogue integrated in INTERACT GIS (Month 28)
- D2.3** Web-editions of updated 'Best Practices of Station Management' (Month 35)
- D2.4** Web-editions of updated 'INTERACT Fieldwork Planning Handbook' (Month 48)
- D2.5** Updated 'INTERACT Minimum Monitoring Programme' (Month 48)
- D2.6** Guide on research permit systems for all arctic countries on INTERACT website (Month 14)
- D2.7** Pocket guide on how to reduce CO<sub>2</sub> emissions in Arctic science (Month 26)
- D2.8** Pocket guide on metadata standards for scientific networks (Month 29)
- D2.9** Repository with selected data from INTERACT stations integrated in INTERACT GIS (Month 44)
- D2.10** Checklist for environmentally friendly stations (Month 36)
- D2.11** Pocket guide on how to reduce plastic consumption and pollution (Month 40)
- D2.12** Pocket guide on how to handle effects of tourism at research stations and in adjacent local communities (Month 30)
- D2.13** Pocket guide for tourist on how to behave around research station, incl. their study areas and local communities (Month 30)

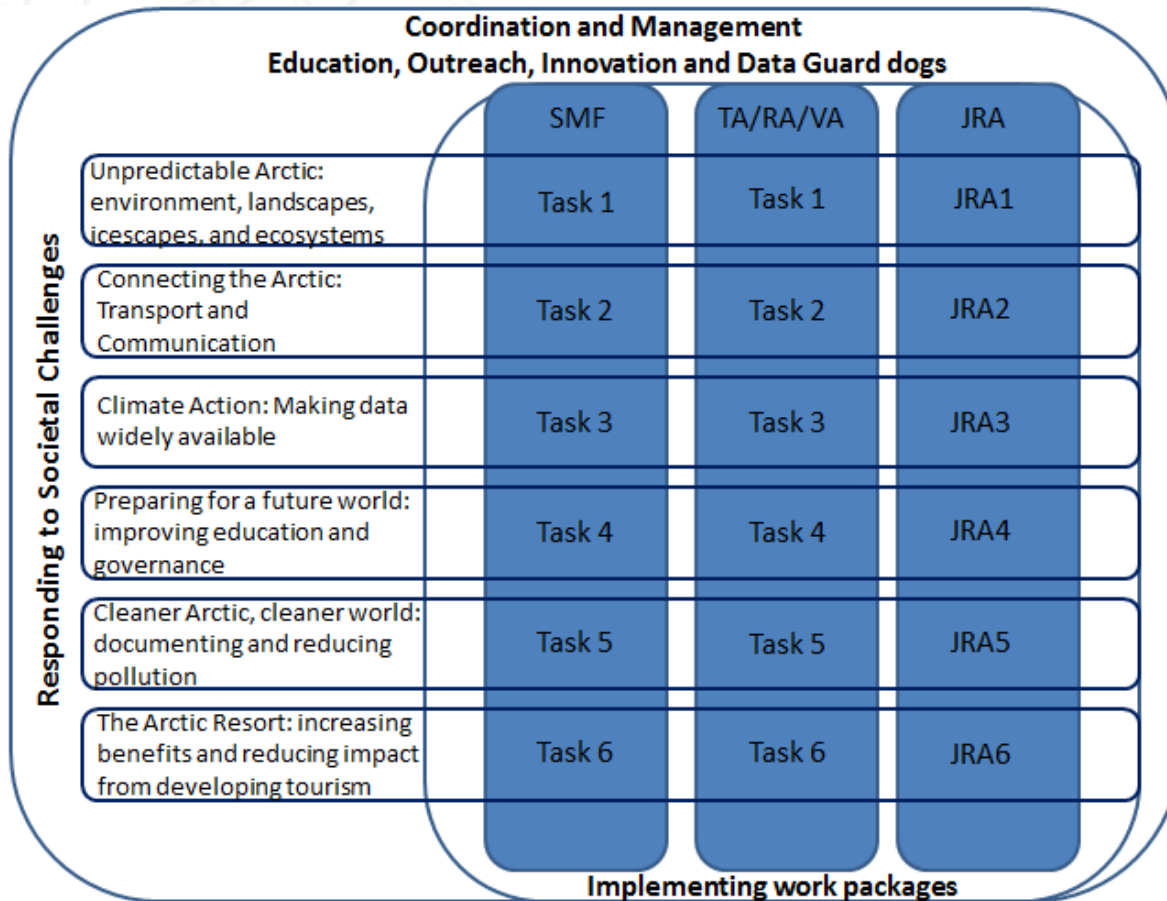
# Internal collaboration

INTERACT Station Managers Forum is the main platform for exchange of information between station managers, partners, workpackages and tasks in INTERACT III.

The Station Manager Forum Secretariat will proactively and persistently encourage everyone to use the Station Manager Forum for information exchange of any kind in INTERACT III.



# Internal collaboration



## SMF – JRA cooperation

Task 2.1 – WP 4 (JRA1)

Task 2.2 – WP 5 (JRA2)

Task 2.3 – WP 6 (JRA 3)

Task 2.4 – WP 7 (JRA 4)

Task 2.5 – WP 8 (JRA 5)

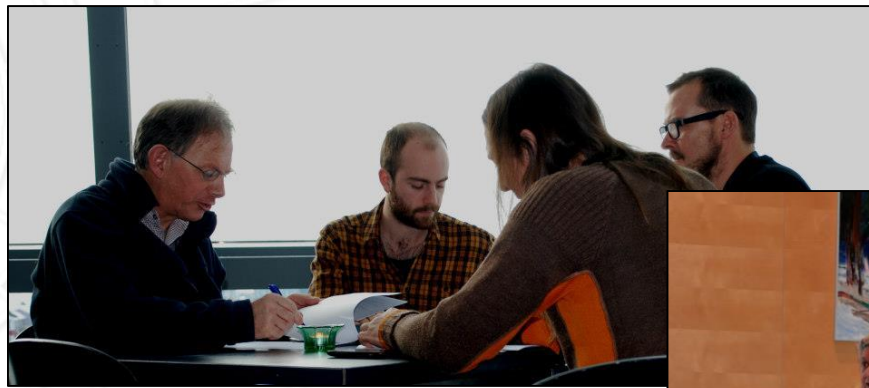
Task 2.6 – WP 9 (JRA 6)





## External collaboration

- Other EU infrastructure projects of relevance
- Other EU research projects of relevance
- The research community using the INTERACT stations, funding and services
- Local communities near the INTERACT research stations
- Arctic Council Working Groups and processes of relevance
- Projects, networks and organisations of relevance
- Private companies of relevance
- NGO's of relevance
- Educational institutions in the Arctic and beyond
- The general public in the Arctic and beyond



# Let's INTERACT

