

D6.4: Knowledge Hub Establishment Report – EOSC-Nordic WP6.4

Author(s)	Anne Sofie Fink (DeiC)
Status	Final
Version 0.1	16/06/2021 to 08/07/2021
Version 0.2	09/07/2021 to 02/08/2021
Version 0.5	03/08/2021 to 18/08/2021
Version 1.0	19/08/2021 to 31/08/2021

Document identifier:	
Deliverable lead	DeiC
Related work package	WP6
Author(s)	Anne Sofie Fink (DeiC)
Contributor(s)	Cecilie Maagaard Winther (DeiC), Jerry Eriksson (SNIC), Jonna Helenius (CSC), Minna Lappalainen(CSC), Sara Garavelli (CSC)
Due date	31/08/2021 Ready for review: 18/08/2021 First draft: 08/07/2021
Actual submission date	
Reviewed by	Maria Francesca Iozzi (Sigma2) and Ilja Livenson (UT/ETAIS)
Approved by	
Dissemination level	Public
Website	www.eosc-nordic.eu
Call	H2020-INFRAEOSC-2018-3
Project Number	857652
Start date of Project	Sep 1 st 2019
Duration	36 Months
License	Creative Commons CC-BY 4.0
Keywords	Knowledge Hub, Stakeholders, Project outputs, Platforms

Abstract:

The EOSC-Nordic project aims to facilitate the coordination of EOSC relevant initiatives within the Nordic and Baltic countries and exploit synergies to achieve greater harmonisation at policy and service provisioning across these countries, in compliance with EOSC agreed standards and practices. The project brings together a strong consortium of 24 complementary partners including e-Infrastructure providers, research performing organisations and expert networks, with national mandates and experience with regards to the provision of research data services, and a unique capacity to realise the outcomes of the EOSC design as outlined by the EOSC Implementation Roadmap.

The EOSC-Nordic project provides an official webpage, www.eosc-nordic.eu, that includes a **KnowledgeHub** in order to disseminate project results. The KnowledgeHub is a virtual platform for competence building and knowledge sharing, an entry point for new service providers and communities willing to engage with EOSC during and after the project lifetime. It is furthermore an entry point for hands-on use cases from research communities as well as a portal for collecting training activities related to the project.

The central sections of this Report focus on outlining the concept, strategy, design elements, planning, logistics and coordination for the establishment of the KnowledgeHub. Furthermore, a plan is included for sustainability of project outputs after the project ends.



Copyright notice: This work is licensed under the Creative Commons CC-BY 4.0 licence. To view a copy of this licence, visit <https://creativecommons.org/licenses/by/4.0>.

Disclaimer: The content of the document herein is the sole responsibility of the publishers and it does not necessarily represent the views expressed by the European Commission or its services.

While the information contained in the document is believed to be accurate, the author(s) or any other participant in the EOSC-Nordic Consortium make no warranty of any kind with regard to this material including, but not limited to the implied warranties of merchantability and fitness for a particular purpose.

Neither the EOSC-Nordic Consortium nor any of its members, their officers, employees or agents shall be responsible or liable in negligence or otherwise howsoever in respect of any inaccuracy or omission herein.

Without derogating from the generality of the foregoing neither the EOSC-Nordic Consortium nor any of its members, their officers, employees or agents shall be liable for any direct or indirect or consequential loss or damage caused by or arising from any information advice or inaccuracy or omission herein.

Table of Contents

Summary	6
1. EOSC-Nordic Knowledge Hub overview	7
2. The concept of The Knowledge Hub	8
2.1 Users of the Knowledge Hub	9
2.2 Knowledge Hub as a Virtual Competence Centre	9
2.3 Project results in the Knowledge Hub	10
3. The Knowledge Hub platform	11
3.1 The elements of the Knowledge Hub	12
3.1.1 Materials	12
3.1.2 Users and organisations	13
3.1.3 Training Library	15
3.1.4 Services	15
3.1.5 Support	16
3.1.6 Community	19
3.2 Platforms supporting the Knowledge Hub	21
3.2.1 Official EOSC-Nordic web page	21
3.2.2 Nordic e-Infrastructure Services	22
3.2.3. EOSC-Nordic Service Dashboard	24
4. Establishment and Operation of the Knowledge Hub	25
5. User requests to the Knowledge Hub	27
6. Sustainability of the Knowledge Hub	27
7. Risk Analysis — follow-up August 2021	28
8. Next steps	28
8.1 Dissemination and Outreach for Increased Stakeholder engagement	28
8.2 Sustainability and Synergies for EOSC	29
10. References	29
Annex 1: Training activities supported and exploited by the Knowledge Hub	30

List of figures

Figure 1.1: The artist Raakku's interpretation of the Knowledge Hub. Raakku followed and drew at the 'EOSC-Nordic Open Symposium' on September 25, 2020.

Figure 2.1: The relation between content of the Knowledge Hub and targeted stakeholder audience.

Figure 3.1: Entry point for the Knowledge Hub via www.eosc-nordic.eu

Figure 3.2: The Materials entry for the Knowledge Hub.

Figure 3.3: Description of the stakeholders in the "Users and Organisations" entry.

Figure 3.4: Entry 'Training Material' with tags.

Figure 3.5: Entry point for "Services", linking to Nordic E-Infrastructure Services and Service Dashboard. Furthermore, guidance for self-service registration (Service providers).

Figure 3.6: User entrance to EOSC-Nordic Service Desk.

Figure 3.7a: Access to support via Frequently Asked Questions (FAQ) and link to Service Desk (Ticket system).

Figure 3.7b: Knowledge Hub's FAQ for service providers and e-infrastructures. Ready and easy to use.

Figure 3.8: A subset of the EOSC community surrounding the EOSC-Nordic project.

Figure 3.9: How to contribute to the website — a web formula.

Figure 3.10: The official EOSC-Nordic web page: www.eosc-nordic.eu.

Figure 3.11a: Outline of the Nordic e-Infrastructure Services, incl., search and list of services.

Figure 3.11b. How to get a service integrated into the Nordic e-Infrastructure Services.

Figure 3.12. Outline of the EOSC-Nordic Services Dashboard.

Figure 4.1. Plan for establishment and operation of the Knowledge Hub (Top Table with orange header). Heatmap of project deliverables (Table at the Bottom) as stated in EOSC-Nordic (2019).

List of tables

Tabel 3.1: The information elements of the Knowledge Hub

Table 3.2: Overview of Knowledge Hub platforms used in the EOSC-Nordic project

Table 5.1. User Requests to Knowledge Hub

Abbreviations

DeiC, Danish e-Infrastructure Consortium

EOSC, European Open Science Cloud

FAIR principles; Findable — Accessible — Interoperable — Reusable principles

NeIC, Nordic e-Infrastructure Collaboration

PMB, Project Management Board (Including all EOSC-Nordic WP leaders)

SNIC, Swedish National Infrastructure for Computing

UiT, University of Tromsø

UT / ETAIS, University of Tartu

WP, Work Package

Summary

The EOSC-Nordic project aims to foster and advance the take-up of the European Open Science Cloud at Nordic level by creating awareness and speeding up the EOSC developments in Finland, Sweden, Norway, Denmark, Iceland, Estonia, Latvia and Lithuania. EOSC relevant initiatives within the Nordic and Baltic countries will exploit synergies to achieve greater harmonisation at policy and service provisioning across these countries, in compliance with EOSC standards and practices. The project brings together a strong consortium of 24 complementary partners including e-Infrastructure providers, research performing organisations, and expert networks, with national mandates and experience with regards to the provision of research data services, and a unique capacity to realise the outcomes of the EOSC design as outlined by the EOSC Implementation Roadmap.

The EOSC-Nordic project provides an official webpage, www.eosc-nordic.eu, that includes a **Knowledge Hub** which is piloting the idea of a regional portal in support of EOSC.

The Knowledge Hub is designed for competence building and knowledge sharing, and offers an entry point for new service providers and communities willing to engage with EOSC during and after the project's lifetime. It includes furthermore hands-on use cases from research communities as well as training activities related to the project.

Details on the concept, strategy, Knowledge Hub sections, and planning of the Knowledge Hub were presented in the report D6.2: Knowledge Hub planning. The report D6.4: Establishment Report for the Knowledge Hub at hand will present the realisation of the Knowledge Hub.

This report does not address the sustainability of the Knowledge Hub. The issue of sustainability across the EOSC-Nordic project will be addressed in the D2.9: Sustaining the coordination of EOSC national initiatives at Nordic level.

The report concludes with an outline of next steps for the Knowledge Hub establishment with a focus on usage, outreach, sustainability and synergy.

I. EOSC-Nordic Knowledge Hub overview

The EOSC-Nordic Knowledge Hub is designed to disseminate detailed project results to the various stakeholders engaging in EOSC-Nordic. The majority of the project deliverables are reported and shared by the Knowledge Hub, including guidelines and recommendations from the different project themes, i.e., policy insights (WP2), e-Infrastructure services (WP3), FAIR data (WP4), and use cases (WP5). Most importantly, the content can be further defined using keywords and topics according to the user's preferences.

In addition to the offerings, the Knowledge Hub also contains services that are easy to use and come with the necessary support - an overview and a map of Nordic e-infrastructure Services as well as a service desk for quick and easy communication with users of the Knowledge Hub.

The Knowledge Hub is considered an interface to the general EOSC community as well. As such the EOSC interested user will be able to find, e.g., links to formal reports by the EU and related EOSC projects and initiatives. By visiting the Knowledge Hub this user will have a well-structured user-centric gateway into a variety of EOSC-related content.

Support is also provided online using several channels to engage with the EOSC-Nordic community.

The first beta version of the Knowledge Hub was launched at EOSC-Nordic Open Symposium on September 25, 2020 (EOSC-Nordic D6.3). The final version of the Knowledge Hub will be launched as a silent release at the third EOSC-Nordic Open Symposium on September 30th, 2021 in Copenhagen, Denmark.

Figure 1: The artist Raakku's interpretation of the Knowledge Hub. Raakku followed and drew at the 'EOSC-Nordic Open Symposium' on September 25, 2020.

2. The concept of The Knowledge Hub

The EOSC-Nordic Knowledge Hub has been built to support the strategic vision of the EOSC-Nordic project of facilitating access to Nordic e-infrastructure services that can also feed into EOSC.



Key features of the Knowledge Hub:

- The Knowledge Hub acts as a **virtual center for competence building and knowledge sharing among stakeholder communities** and relies on expertise coming from the partner network.¹
- The Knowledge Hub brings forward **processes and best practices in the EOSC community**, and it will help remove barriers for onboarding EOSC by knowledge sharing.
- The Knowledge Hub provides **support material to stakeholders** in order for them to identify best practices for compliance with legal policy, service provisioning, FAIR data practices, and open research data & services demonstrators.

¹ See: EOSC-Nordic (2020) D6.1. The report, EOSC-Nordic: Stakeholder identification, engagement, and communication strategy (M6) for a presentation of stakeholder communities and partner networks.

2.1 Users of the Knowledge Hub

The Knowledge Hub is built for several well-defined stakeholder communities:

- 1) Service providers and e-infrastructures
- 2) Research communities and institutions
- 3) Data Repositories
- 4) Funders and policy makers

We have strived to create a service channel that brings value and produces successful user experiences by providing users with findable and accessible offerings that meet their expectations.

The target and content of the Knowledge Hub has been planned and laid out in a way that supports the user journey for information and services. Entrance web pages are dedicated to each of the stakeholder communities. The stakeholder concept ensures that the information supplied is targeted at the stakeholders in question.

2.2 Knowledge Hub as a Virtual Competence Centre

A competence centre acts as an organizational structure used to coordinate IT skills with an enterprise. Competence centers provide expertise for support of projects and programs, acting both as repositories of knowledge and resource pools for multiple business areas.

We have supported knowledge sharing in the form of collaboration and learning so that it is core for the EOSC-Nordic stakeholders.

The Knowledge Hub is the implementation of a virtual competence centre, which is accessible from [»www.eosc-nordic.eu](http://www.eosc-nordic.eu). The Knowledge Hub is designed as a stakeholder-driven service site that makes it easier for stakeholders to engage with EOSC-Nordic. By creating and sharing knowledge 'in the flow,' the project experts contribute to the planned deliverables and gain recognition in the communities from the dissemination of results.

The Knowledge Hub aims to collect and display information that will enable stakeholders to do their work easier and more knowledgeable by capturing and sharing results. As such it must be seen as supporting the growing e-infrastructure service sector moving forward by offering a virtual user friendly competence centre.

2.3 Project results in the Knowledge Hub

The Knowledge Hub brings forward processes and best practices in the EOSC community, and it will help reduce barriers for onboarding EOSC by knowledge sharing.

The Knowledge Hub provides support material to stakeholders in order for them to identify best practices of integration of legal policy insights, service provisioning, FAIR data practices, and open research data & services demonstrators.

Project communication and knowledge sharing is a joint venture (EOSC-Nordic D6.1 (2020)), and the prerequisite for successful implementation of the Knowledge Hub has been based on close collaboration with WP2-WP5, bilaterally, and via the Project Management Board.

The one-stop entry makes project results visible and displays a joint content generation effort from WP2-WP6.

Content provision:

- WP2 - Policies, legal issues and sustainability
- WP3 - Support to prospective EOSC service providers
- WP4 - FAIR Data
- WP5 - Open research data & services

Support structure for the Knowledge Hub:

- WP6 - Engagement, communication and competence building

The majority of the results from the EOSC-Nordic project are reports, including guidelines and recommendations from the different project themes, i.e., policy insights (WP2), e-Infrastructure services (WP3), FAIR data (WP4), and demonstrators (WP5). The structure for dissemination of project results is the Knowledge Hub and the aim is to do it in an easy and user-friendly way via a one-stop entry using a stakeholder-driven matrix layout (see below Table 3.1 and Figure 3.1).

The chosen elements for the EOSC-Nordic Knowledge Hub embrace the stakeholder approach (Funders and policymakers, Service providers and e-infrastructures, Data Repositories and Research communities and institutions) and highlight the project topics (e-infrastructure services, FAIR data and Policy insights) of the EOSC-Nordic Knowledge Hub. The collection of knowledge is based on services, reports, guidelines, recommendations, and training activities from the EOSC-Nordic project and is targeted to stakeholders' needs (Fig. 2.2).

EOSC-Nordic Knowledge Hub for

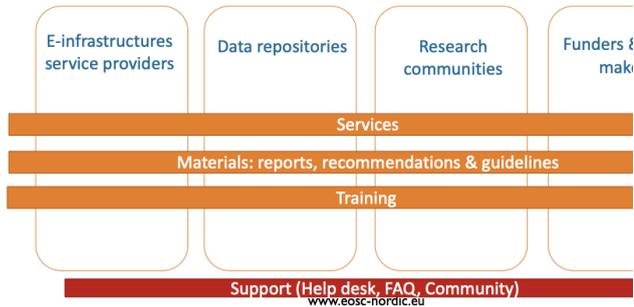


Figure 2.1: The relation between content of Knowledge Hub and targeted stakeholder audience.

3. The Knowledge Hub platform

The Knowledge Hub acts as a service site for stakeholders, built for a well-defined variety of stakeholders who can benefit from the EOSC-Nordic project. The role is to offer targeted information of EOSC-Nordic-related services and knowledge, as well as provide a channel for the services.

The Knowledge Hub connects platforms and information elements in ways that support various user journeys.

The “one-stop” overview is an internal structure for how content is organized at the Knowledge Hub. From this structure, a graphical layout is generated following the same design philosophy as already outlined at www.eosc-nordic.eu.

- Public EOSC-Nordic reports are findable by tags Topics, Stakeholders, and Keywords.
- Material from the past workshops and events, e.g., presentations and streaming sessions are tagged with Media, Stakeholders and Keywords in the Knowledge Hub and is a searchable term for the stakeholders
- Access to a collection of news and stories within each of the project topics
- Access to Service onboarding activities and service desk

The Knowledge Hub consists of six elements that integrate and disseminate project results. Each of these Knowledge Hub sections contains targeted content for stakeholders, making it easy for users to access the right information. The graphical layout has been developed to support the design elements for users’ visibility and actionability optimally.

Tabel 3.1: The information elements of the Knowledge Hub

Materials	Users and organisations	Training Library
Services	Support	Community

Knowledge Hub

Welcome to EOSC-Nordic Knowledge Hub! We invite you to explore the beta version of our knowledge base.

We have collected all our useful resources and information into this Knowledge Hub. Content and materials are constantly evolving and updating throughout the project. Here's a short description of each section to help you find what you're looking for.



Materials

Key documents of the project (Reports, recommendations & guidelines)

[Read more](#)



Users and organisations

Find out what EOSC-Nordic can offer for you

[Read more](#)



Training Library

All sorts of training events and materials

[Read more](#)



Services

The services available and a guidance how to register a service

[Read more](#)



Support

Browse FAQs or send over your request via our Service Desk

[Read more](#)



Community

Connect with peers and learn from others in your field

[Read more](#)

Figure 3.1: Entry point for the Knowledge Hub via www.eosc-nordic.eu

Below is a description of the elements on the Knowledge Hub and supporting platforms.

3.1 The elements of the Knowledge Hub

3.1.1 Materials

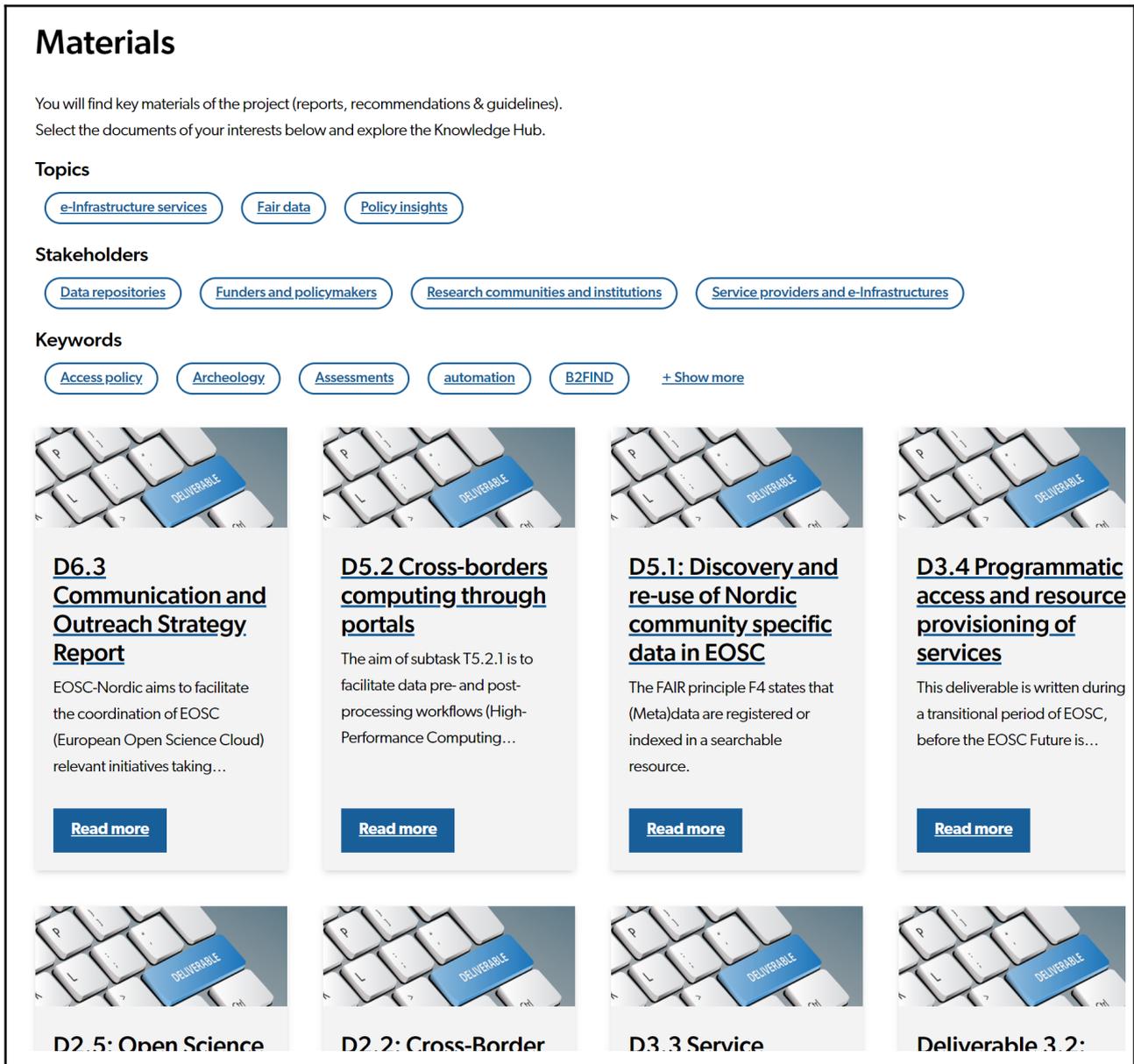
This Knowledge Hub section [»Materials](#) disseminates key documents of the project (reports, recommendations & guidelines).

In order to support the user's navigation in the material, the users are offered help as tags on:

- Topics (the project topics)
- Stakeholders (the stakeholder communities the project has defined, see: 'EOSC-Nordic (2020) D6.1. The report, EOSC-Nordic: Stakeholder identification, engagement, and communication strategy (M6)')
- Keywords (pointed out by the authors of reports as it is part of the EOSC-Nordic Report template)

So far, the key findings in deliverables are used to create news stories, and these have been distributed in newsletters and social media posts in addition to the Knowledge Hub. In this final phase of the Knowledge Hub, we will focus on the ways for improving the content and attractiveness of deliverables and use case reporting (for example, by adding visuals, chart, and statistical analysis).

Outline of the “Materials” Knowledge Hub section with a topic, stakeholder, and keyword sub-structure in Figure 3.2.



Materials

You will find key materials of the project (reports, recommendations & guidelines).
 Select the documents of your interests below and explore the Knowledge Hub.

Topics

[e-Infrastructure services](#) [Fair data](#) [Policy insights](#)

Stakeholders

[Data repositories](#) [Funders and policymakers](#) [Research communities and institutions](#) [Service providers and e-Infrastructures](#)

Keywords

[Access policy](#) [Archeology](#) [Assessments](#) [automation](#) [B2FIND](#) [+ Show more](#)

D6.3 Communication and Outreach Strategy Report
 EOSC-Nordic aims to facilitate the coordination of EOSC (European Open Science Cloud) relevant initiatives taking...

D5.2 Cross-borders computing through portals
 The aim of subtask T5.2.1 is to facilitate data pre- and post-processing workflows (High-Performance Computing...

D5.1: Discovery and re-use of Nordic community specific data in EOSC
 The FAIR principle F4 states that (Meta)data are registered or indexed in a searchable resource.

D3.4 Programmatic access and resource provisioning of services
 This deliverable is written during a transitional period of EOSC, before the EOSC Future is...

D2.5: Open Science

D2.2: Cross-Border

D3.3 Service

Deliverable 3.2:

Figure 3.2: The Materials entry for the Knowledge Hub.

3.1.2 Users and organisations

The Knowledge Hub section [»Users and organisations](#) is a service site built for our various stakeholders organised as:

- 1) **Policymakers** that coordinates national policies and legal issues in the context of the provision of services in a cross-border environment
[»Funders and policymakers](#)
- 2) **Service providers** for support and integration and interoperability of services with EOSC
[»Service providers and e-infrastructures](#)
- 3) **Research community managers** focusing on e-Infrastructure services, FAIR data management practices across communities, and hands-on use cases
[»Data repositories](#)
- 4) **Researchers** that want to find the solutions developed by the project within research communities (Use cases/ Research communities demonstrators)
[»Research communities and institutions](#)

A majority of stakeholders do not know about EOSC or are unclear about how to engage with it and what benefits it can bring to them. This element gives users and organisations a value proposition why to get familiar with the EOSC-Nordic project. It also offers an easy gateway to find right information and new knowledge in order to meet their needs.

Users and organisations

A wide range of stakeholders benefit from EOSC-Nordic. Find out what EOSC-Nordic can offer for you.

 <p><u>Research communities and institutions</u></p> <p style="font-size: x-small;">Are you creating new knowledge, products, processes, methods, or systems. Conducting research or experimental development? Explore EOSC's research data management and publishing services to enable reproducible research and dissemination of the results</p> <p style="text-align: center; background-color: #0056b3; color: white; padding: 5px; margin-top: 10px;">Read more</p>	 <p><u>Service providers and e-infrastructures</u></p> <p style="font-size: x-small;">Are you a service provider? See how EOSC-Nordic can help you engage with your user communities and use your resources more efficiently</p> <p style="text-align: center; background-color: #0056b3; color: white; padding: 5px; margin-top: 10px;">Read more</p>	 <p><u>Data repositories</u></p> <p style="font-size: x-small;">Are you a data repository owner or manager? See how EOSC-Nordic can help you in the uptake of FAIR practices.</p> <p style="text-align: center; background-color: #0056b3; color: white; padding: 5px; margin-top: 10px;">Read more</p>	 <p><u>Funders and policymakers</u></p> <p style="font-size: x-small;">Stay up to date on EOSC developments, strategy plans, roadmaps, and how the Open Science can benefit the economy and society. Participate and influence the direction of the EOSC!</p> <p style="text-align: center; background-color: #0056b3; color: white; padding: 5px; margin-top: 10px;">Read more</p>
---	--	--	---

Figure 3.3: Description of the stakeholders in the “Users and Organisations” entry.

3.1.3 Training Library

The »[Training Library](#) brings together all sorts of training materials in the form of webinars, videos, articles, and more.

In order to support the user’s navigation in the Training library, the users are offered help as tags on:

- Media
- Stakeholders (the stakeholder communities the project has defined)
- Keywords (shared among Knowledge Hub sections)

Outline of the Training Library section with a topic, stakeholder, and keyword sub-structure in Figure 3.4.

Below there is an overview of the training activities provided and planned by the EOSC-Nordic project.

Training Library

The training library brings together all sorts of training materials in the form of webinars, videos, articles, and more.

Background paper on workshop 'FAIRification of Nordic+ Baltic data repositories'	22.04.2020	Document
Domain agnostic metadata schemas	29.04.2021	Presentation
EOSC-Nordic policy workshop panel 1 pitch	09.03.2021	Presentation
FAIR & FAIR Implementation Strategies	22.04.2020	Presentation
FAIR & FAIR implementation strategies (recording)	22.04.2020	Video
FAIR assessments and preliminary results	29.04.2021	Presentation
FAIRification of Nordic + Baltic data repositories	22.04.2020	Presentation
Fairification of Nordic and Baltic data repositories (recording)	15.04.2020	Video
FAIRification STEP 2 on DATA / METADATA webinar recording part 1	03.02.2021	Video
FAIRification STEP 2 on DATA / METADATA webinar recording part 2	03.02.2021	
FAIRification webinar on PIDs recording part 1	26.11.2020	Video
FAIRification webinar on PIDs recording part 2	26.11.2020	Video

Media

Document Presentation Video

Webinar

Stakeholders

Data repositories

Funders and policymakers

Research communities and institutions

Service providers and e-Infrastructures

Keywords

Access policy Archeology

Assessments automation

B2FIND [+ Show more](#)

Figure 3.4: Entry ‘Training Material’ with tags.

3.1.4 Services

The Knowledge Hub section »[Services](#) helps users to get acquainted with available services for research. This is also an entry point for a service provider to register or update their service into the listing.

EOSC-Nordic Services Dashboard offers insights into the situation with EOSC services from the perspective of different stakeholders. These components of EOSC-Nordic are being developed and adjusted according to the evolution of EOSC.

Entry points for Services with stakeholder perspectives are in Figure 3.5.

Services

Get to know all services available for researchers in the Nordics. This is an entry point for a service provider to register or update their service into the list. EOSC-Nordic Services Dashboard offers insights into the situation with EOSC services from the perspective of different stakeholders. These components of EOSC-Nordic are being developed and adjusted according to the evolution of EOSC.



Researcher

Would you like to access EOSC-Nordic services? The following list contains the Nordic e-Infrastructure Services available at the moment.

[Read more](#)



Service Provider

Would you like to offer your services to the EOSC-Nordic offering? The self-service platform for service providers gives you instructions for on-boarding and managing EOSC services.

[Read more](#)



EOSC-Nordic Services Dashboard

A monitor of the status of EOSC services provided and consumed in the EOSC-Nordic region. The online tool will be available Q1 2021.

[Read more](#)

Figure 3.5: Entry point for “Services”, linking to Nordic E-Infrastructure Services and Service Dashboard. Furthermore, guidance for self-service registration (Service providers).

3.1.5 Support

The [»Support](#) element is offered to users with a particular interest in a subject and is searching for answers. The user is offered to browse [»Materials](#), visit FAQs based on questions from the service desk and widgets, or send over a request via EOSC-Nordic [»Service Desk](#).

A Service desk/Help center set-up provides easy access to dedicated support and helps target stakeholder communities. The [»EOSC-Nordic Service Desk](#) (based on the Jira service desk from Atlassian) has been implemented by WP3 with a primary goal of supporting existing and future EOSC service providers in the Nordics and Baltics (fig 3.8). A network of experts from different work packages are handling requests.

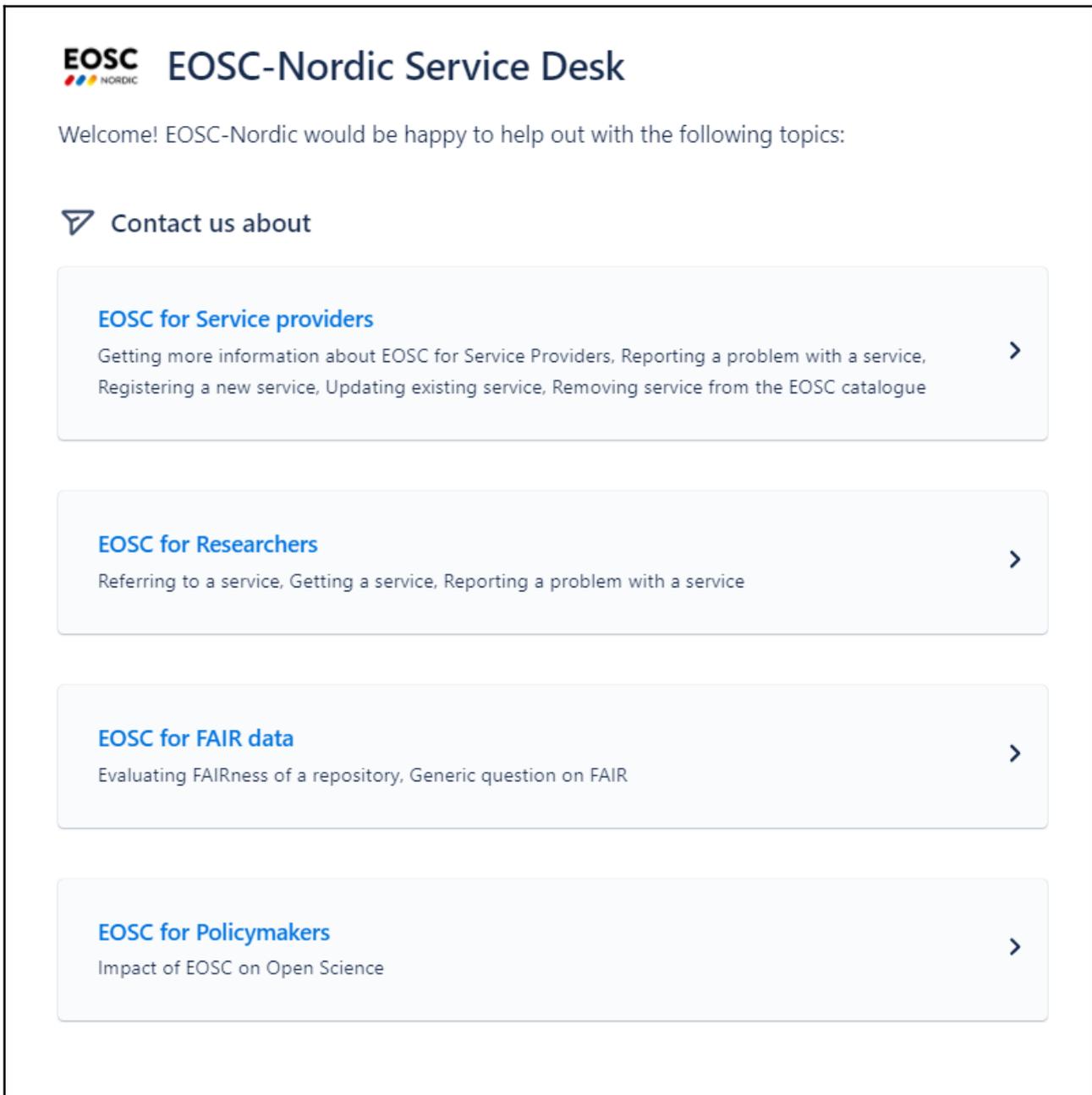


Figure 3.6: User entrance to EOSC-Nordic Service Desk.

The Service desk supports self-service activities to the stakeholders and handles specific requests from the users. An entry point to the service desk is accessible from the Knowledge Hub.

The user entrances for the EOSC-Nordic Service Desk are targeted at the primary stakeholder communities anchored by project topics:

- EOSC for Service Providers
- EOSC for Researchers
- EOSC for FAIR data
- EOSC for Policymakers

The user entrances are composed of targeted information elements around the project topics.

Stakeholder targeted FAQs (fig. 3.7a) :

- [FAQ for Funders and policymakers](#)
- [FAQ for Service Providers and e-infrastructures](#) (fig. 3.9b)
- [FAQ for Data repositories](#)
- [FAQ for Research communities and institutions](#)

Support

Do you have a particular interest in a subject and want to discuss it with our experts? Browse our [materials](#), FAQs, or send over your request via [our Service Desk](#) .

FAQ

[FAQ for Funders and policymakers](#) 

[FAQ for Service providers and e-Infrastructures](#) 

[FAQ for Data repositories](#) 

[FAQ for Research communities and institutions](#) 

Figure 3.7a: Access to support via Frequently Asked Questions (FAQ) and link to Service Desk (Ticket system).



FAQ for Services providers and e-infrastructures



Created by Ahti Saar
Last updated: Sep 25, 2020 • 1 min read

Services providers and e-infrastructures target group covers users from:

- National e-Infrastructures providers & generic service providers
- Industry / SME

1. Is there funding available?
2. What are the requirements for an EOSC service?
3. How do I know how mature my service is?
4. How can I offer my service in EOSC-Nordic offering portal?
5. How can I remove my service from EOSC-Nordic offering portal?
6. What is service capacity in Maturity Model?
7. What is service capacity limit in Maturity Model?
8. What is original community in Maturity Model?
9. What is meant under research data lifecycle in Maturity Model?

Figure 3.7b: Knowledge Hub's FAQ for service providers and e-infrastructures. Ready and easy to use.

3.1.6 Community

The Knowledge Hub section [»Community](#) supports users connecting with peers and learning from others in their field.

The community element is for peer learning, competence sharing, and exchanging experiences. Here the user can also find upcoming community events. EOSC-Nordic is not only advancing the coordination of EOSC relevant initiatives in the Nordic and Baltic countries but is also collaborating with other EOSC-related Horizon2020 projects.

By signing up for the EOSC-Nordic newsletter users are invited to become part of the EOSC-Nordic community.

Users are introduced to the broader EOSC community for engagement (fig. 3.8).



Figure 3.8: A subset of the EOSC community surrounding the EOSC-Nordic project.

In addition to all these features, we also invite our users to collaborate with us and share the outcomes of their use case or a success story that highlights how EOSC services and resources have supported their work using the site's »[Contribute](#) feature. This is one way to pinpoint EOSC-Nordic's support for user involvement and adaptability.

The contribution form is submitted to and handled by the EOSC-Nordic Service Desk and a contributed content published when approved by EOSC-Nordic editorial board.

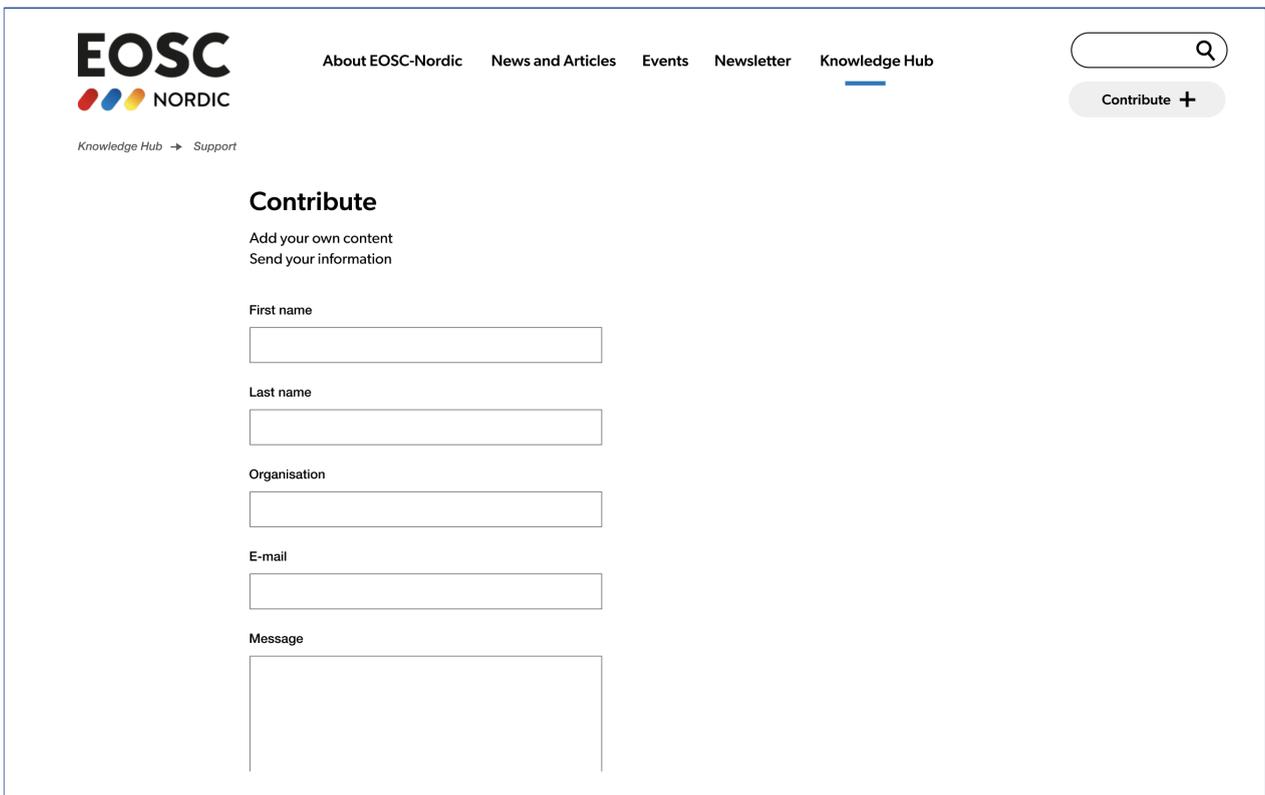


Figure 3.9: How to contribute to the website — a web formula.

3.2 Platforms supporting the Knowledge Hub

Several platforms are used for the operation of the Knowledge Hub (Table 1). The core of the Knowledge Hub is the integration of existing tools from NeIC that are “pointed to” from the official EOSC-Nordic web page.

Hosting responsibilities, ownership, and sustainability properties are listed for the separate platforms.

Table 3.2: Overview of Knowledge Hub platforms used in the EOSC-Nordic project

Element	Platform	Responsible	Sustainability
Official EOSC-Nordic web page	www.eosc-nordic.eu Wordpress	Hosted by CSC Owner: EOSC-Nordic	1)
Tool: Nordic e-Infrastructure Services	https://neic.no/services/ 1. Github Pages 2. On-boarding and self-service for service owners: share.neic.no / Waldur	Hosted by UT/ETAIS Owner: NeIC	2)
Tool: EOSC-Nordic Service Dashboard	https://eosc-nordic.atlassian.net/serviceesk/customer/portal/1 Elasticsearch + Kibana A public dashboard URL available for the Knowledge Hub’s users	Hosted by UT / ETAIS Owner: UT / ETAIS	3)

1, CSC hosts it for extra 3 years after project ends

2, NeIC hosts it for min. 3 years after the project ends as it will be an integrated part of the NeIC web page.

3, UT is pledging to support it at the achieved state by the end of EOSC-Nordic for the next 3 years.

3.2.1 Official EOSC-Nordic web page

[»Www.eosc-nordic.eu](http://www.eosc-nordic.eu) is the access point and reference for the EOSC-Nordic project. The project website presents it as the primary tool for communication.

A preliminary version of the website was launched in project month number 2, i.e. M2 (October 2019). The roles of the different content parts of the website were defined alongside the launch of the beta version of the [»Knowledge Hub](#) in M 12 (September 2020).

The role of the main site is to act as a general information channel of the project and the activities, whereas Knowledge Hub is a service site built for users/stakeholders. The main site attracts visitors with a dynamic content feed supported with social media messages. It contains news, expert blogs, article-type references about the impact and events (organised by or related to EOSC-Nordic). Also, a collection of the latest social media messages is found on the page.

A fan to the right takes the users to the Knowledge Hub.

Do notice that the user is invited to contribute on the EOSC-Nordic web page (figure 3.1, button to the right). This invitation indicates the blurred lines between the project as authorised supplier of web content and the users, who may act as contributor of information and/or services as well.

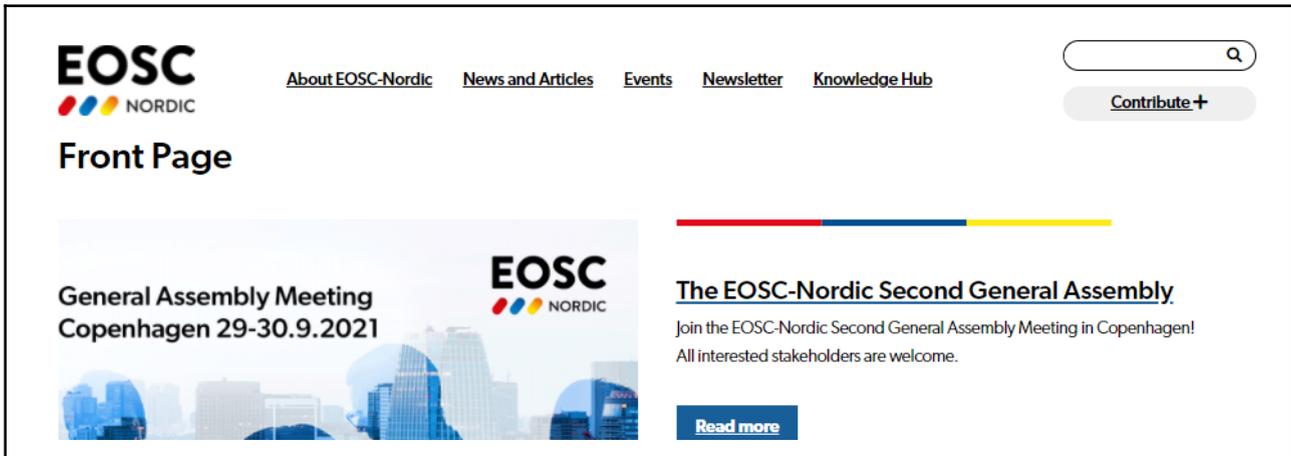


Figure 3.10: The official EOSC-Nordic web page: www.eosc-nordic.eu.

3.2.2 Nordic e-Infrastructure Services

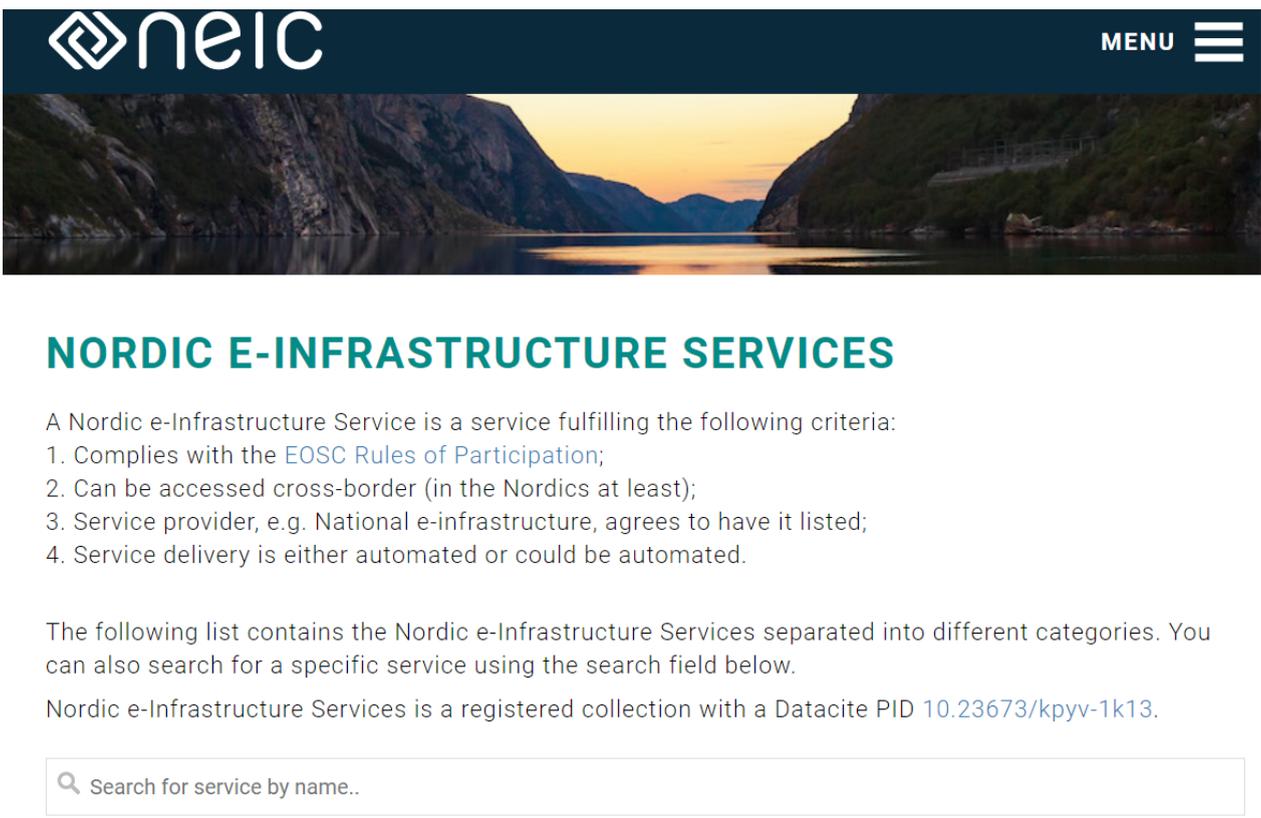
This Knowledge Hub section contains a web service for overview and access for researchers to Nordic e-Infrastructure Services with compliance to EOSC Rules of Participation.

NeiC has wished to align on what services are available and usable for researchers in the Nordics, particularly for NeiC sponsored projects. The intention is to adopt as much as possible of the EOSC vision for services to the vision behind Nordic e-Infrastructure Services.

On this motivation, NeiC established a platform for managing services— onboarding, validating, promoting, and accounting. The platform was established within EOSC-Nordic's WP3 — based on the outcomes of the NeiC Dellinger2 project (fig. 3.2a and 3.2b).

In order to have the Service overview kept up to date, it includes a self-service for service registration and management (<https://share.neic.no>) - with metadata aligned with requirements of EOSC Service Description Form, a public website where the data and active status is published (<https://neic.no/services/>).

The self-service is integrated with Service Desk, and EOSC-Nordic WP3 staff provides support to new and existing Service Providers over several channels.



The screenshot shows the top part of a website. At the top left is the 'neic' logo in white on a dark blue background. To the right is a 'MENU' button with a hamburger icon. Below the header is a wide landscape photograph of a fjord at sunset. Underneath the photo is the title 'NORDIC E-INFRASTRUCTURE SERVICES' in bold teal letters. This is followed by a paragraph defining a Nordic e-Infrastructure Service and a numbered list of four criteria. Below the list is another paragraph explaining that the services are categorized and can be searched. A final paragraph mentions a Datacite PID. At the bottom is a search bar with a magnifying glass icon and the placeholder text 'Search for service by name..'

NORDIC E-INFRASTRUCTURE SERVICES

A Nordic e-Infrastructure Service is a service fulfilling the following criteria:

1. Complies with the [EOSC Rules of Participation](#);
2. Can be accessed cross-border (in the Nordics at least);
3. Service provider, e.g. National e-infrastructure, agrees to have it listed;
4. Service delivery is either automated or could be automated.

The following list contains the Nordic e-Infrastructure Services separated into different categories. You can also search for a specific service using the search field below.

Nordic e-Infrastructure Services is a registered collection with a Datacite PID [10.23673/kpyv-1k13](#).

Figure 3.11a: Outline of the Nordic e-Infrastructure Services incl. search and list of services.

Services providers are invited to add their service to the portfolio 'Nordic e-infrastructures Services' (as below) via a form for service provider contribution.



How can I offer my service in EOSC-Nordic offering portal?



Created by Ilja Livenson
Last updated: Sep 21, 2020 by Ahti Saar • 2 min read

Here you can find the instructions for adding an organization and a service in EOSC-Nordic offering portal.

Instructions

1. Go to share.neic.no and login using eduGAIN.
2. Following dashboard will open after successful login:

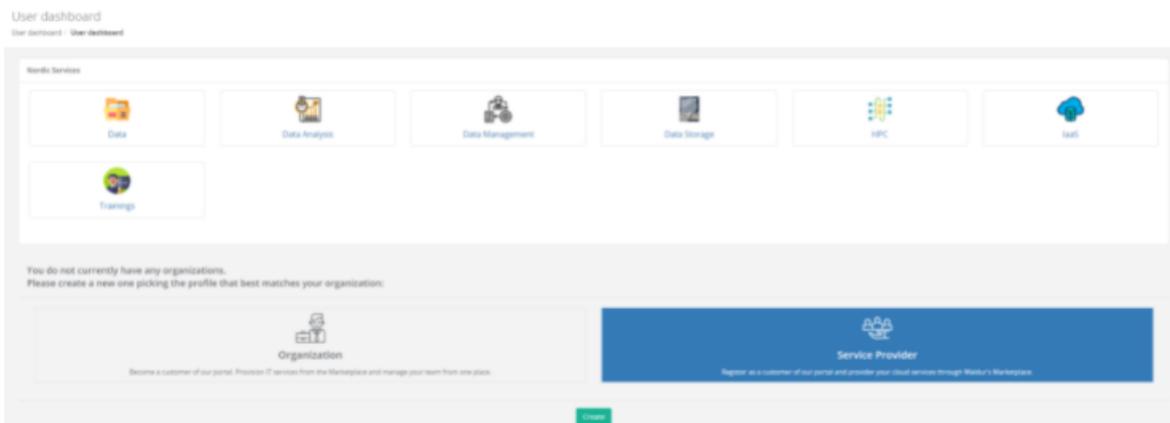


Figure 3.11b: How to get a service integrated into the Nordic e-Infrastructure Services.

3.2.3. EOSC-Nordic Service Dashboard

In order to better monitor the status of EOSC services provided and consumed in the EOSC-Nordic region, we have established an [EOSC-Nordic Service Dashboard](#) for providing overview and insights. It includes several dashboards for providing real-time insights into the situation with EOSC services from the perspective of different stakeholders (fig. 3.7).

At the moment this dashboard is currently running mostly on mock data until the integration with EOSC Core services is finalized.

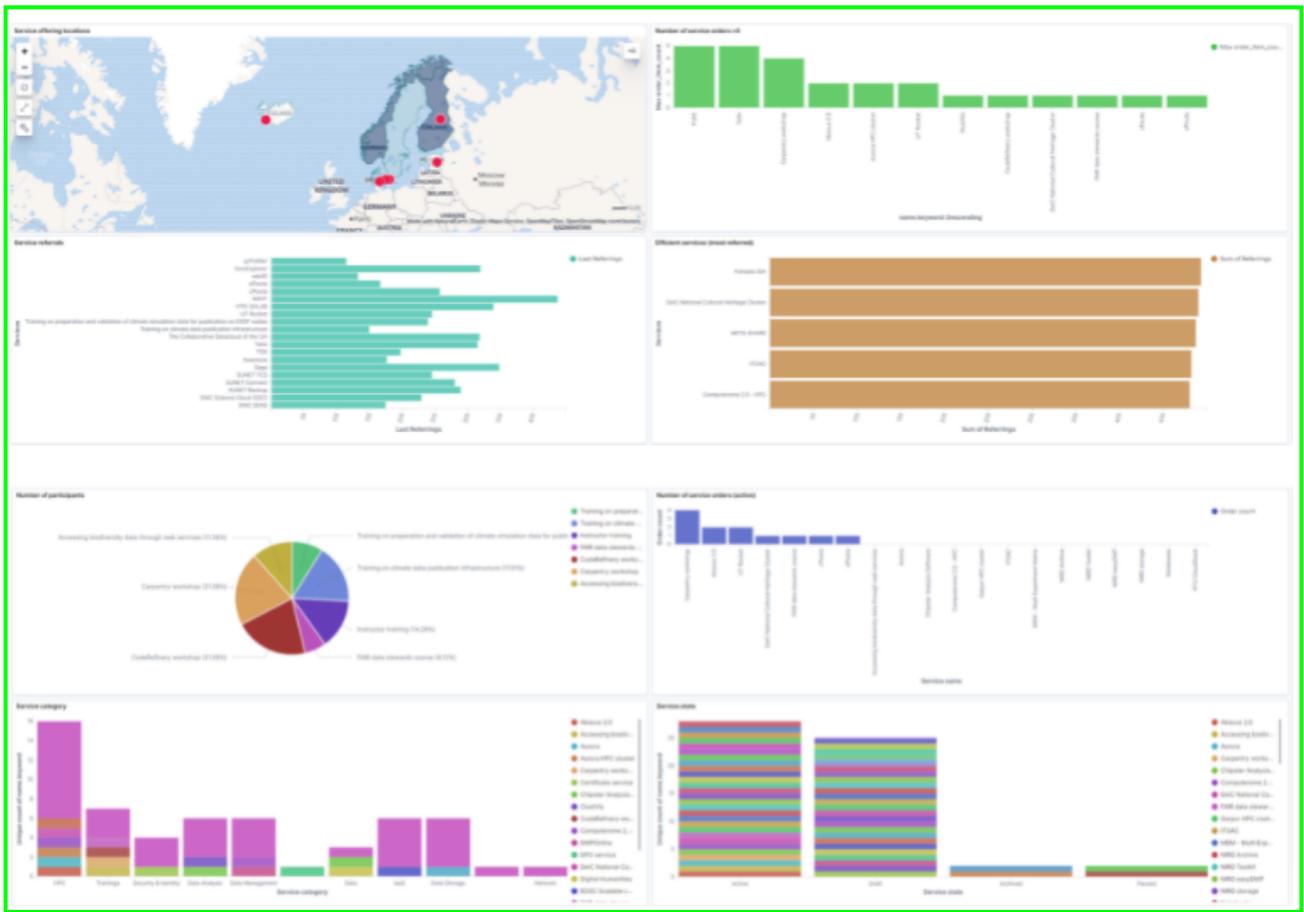


Figure 3.12: Outline of the EOSC-Nordic Services Dashboard.

The Services Dashboard is built on top of the University of Tartu's Elasticsearch service, which in turn is built using only open components, and can be replicated or relocated without additional effort if needed.

4. Establishment and Operation of the Knowledge Hub

A prerequisite for the successful establishment of the Knowledge Hub has been a close collaboration between WP2-5. A beta version of the Knowledge Hub was launched ahead of the time in September 2020 (instead of January 2021)

The final design and structure will be ready for release in Q3 2021.

Establishment of the KnowledgeHub:

- The first content upload was made in Q22020 for the launch, and since then, the Knowledge Hub has been continuously updated according to the evolution of the EOSC-Nordic project
- The capture of content for the operation of the Knowledge Hub is managed at the EOSC-Nordic project group meetings (PMB), where WP6 is attending twice a month. The frequency of project

deliverables is outlined in the heatmap in Figure . 4.1 (Linking to the content meetings with blue dots).

- A beta version of the graphical layout for the Knowledge Hub was delivered in Q3 2020. A beta version of the Knowledge Hub was launched ahead of time in September 2020 despite the COVID-19 world situation and planned features have been developed except the excluded Competence Map.
- The beta version has been used for getting feedback from the stakeholders and project organisation via PMB, EOSC-Nordic Executive Board, EOSC-Nordic International Advisory Committee, and EC mid-term reviewers. In this way, we have been able to make relevant continuous adjustments before the final release of the Knowledge Hub in August 2021.
- Within the Knowledge Hub, a competence map was planned (fig. 4.1, project Deliverables: Info for Competence Map (green squares)). Due to obstacles for resources of our external partner caused by the COVID-19 situation the Competence Map has had to be excluded from the implementation plans.

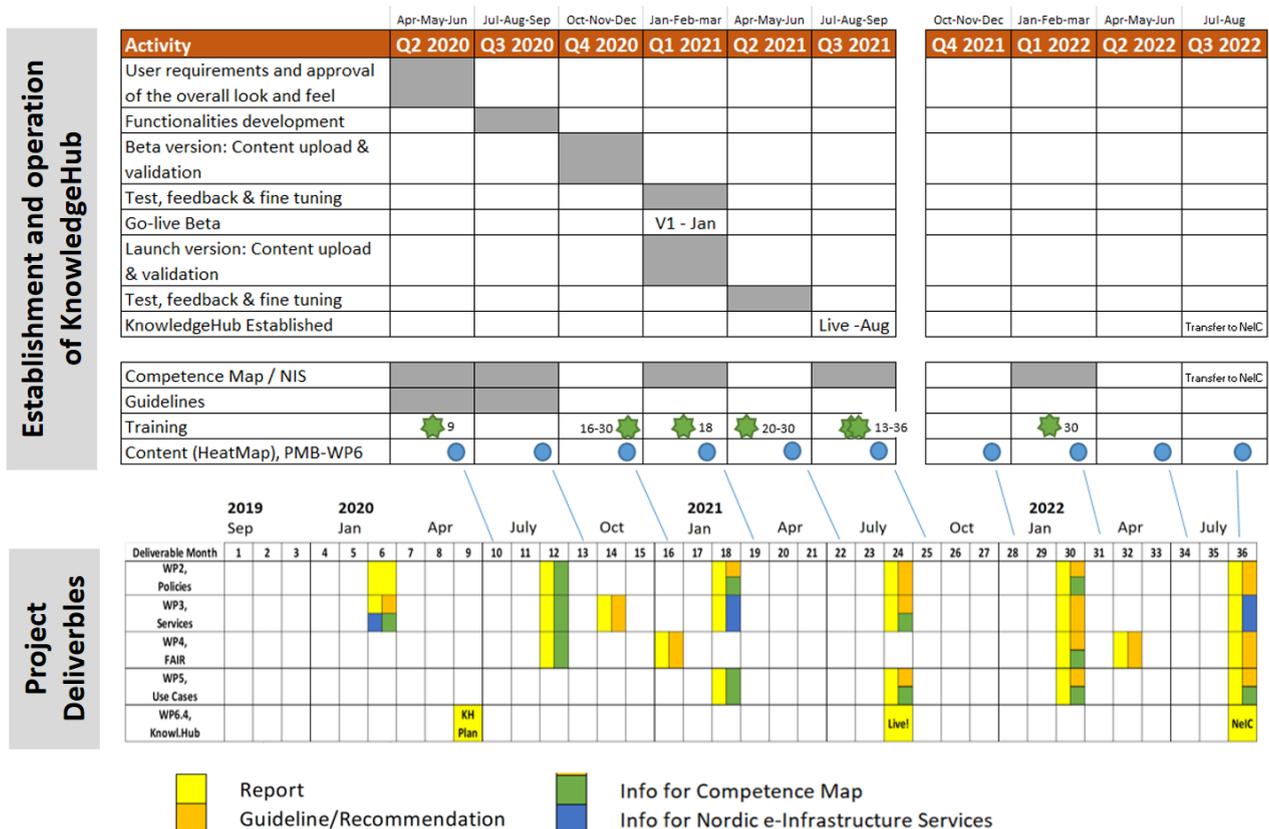


Figure 4.1. Plan for establishment and operation of the Knowledge Hub (Top Table with orange header). Heatmap of project deliverables (Table at the Bottom) as stated in EOSC-Nordic (2019).

Furthermore:

- Information for the Nordic e-Infrastructure services, Service dashboard and Helpdesk is managed by WP3, and The Knowledge Hub is linking to these services (Q2 2020).
- EOSC-Nordic Training activities are displayed on the Knowledge Hub (Fig. 4.1, green stars).
- The discussion of use and sustainability of the Knowledge Hub will be intensified towards the end of the EOSC-Nordic project.

5. User requests to the Knowledge Hub

User requests handled by the KnowledgeHub will be measured by the metrics in Atlassian Help desk (To be implemented in May 2020) at three-time points.

The Knowledge Hub is scheduled to be officially released in M24, which also is a KPI. The metrics from the Atlassian Help desk will be provided at the timepoints M14 (November 2020, 6M after implementation), M20 (May 2021, 12M after implementation), and M32 (May 2022, 24M after implementation).

The actual number of requests for November 2020 and for May 2021 calls for reflections and action. Especially the very few incoming user requests for the period November 2020 until May 2021 is significantly below the target number.

A trend has been observed in the user communities, indicating that when researchers have established a means of communication with a service provider (perhaps for a completely different service) then communication happens directly with representatives of the service and not through the EOSC-Nordic service desk. One could argue that the EOSC-Nordic service desk in particular has value in establishing connections in the cases where the researchers do not know whom to contact.

The number of user requests for the service desk must be a point of attention for the current period and until the project ends. The actual number of requests must be followed closely and it will be discussed within the WP6 Team if action is needed in order to reach the up-coming target numbers.

Table 5.1. User Requests to Knowledge Hub

Point in time	Target no. of request	Actual no. of requests
November 2020 (6M after implementation)	-	35
May 2021 (12M after implementation)	20	5
May 2022 (24M after implementation)	45	n/a
August 2022 (M36)	70	n/a

6. Sustainability of the Knowledge Hub

The EOSC-Nordic Knowledge Hub is in many respects a new approach towards project competencies and knowledge sharing. The Knowledge Hub is viewed as a virtual competence center for the EOSC-Nordic project's results, deliverables and milestones. As such, the Knowledge Hub as a concept for a virtual competence centre must be considered for sustainability. The Knowledge Hub concept may be able to inspire new user-friendly ways of building and sharing competencies and knowledge to support the EOSC and EOSC-related projects and initiatives.

The sustainability of the Knowledge Hub will be addressed in 'D2.9: Sustaining the coordination of EOSC national initiatives at Nordic level' due to the fact that sustainability must be viewed across the whole EOSC-Nordic project.

The D2.9 will take on the responsibility of identifying and recommending the content of the KnowledgeHub that needs to be sustained for future exploitation in consultation with representatives from WP6 incl. providing a list of KH assets (due date 28.02.2022).

7. Risk Analysis — follow-up August 2021

Dissemination of project results is a joint venture, as already mentioned (EOSC-Nordic (2020)), and the prerequisite for successful implementation of Knowledge Hub is a content-driven approach in close collaboration with WP1-5 (Fig. 4). Initially eight risks were identified for the establishment of the Knowledge Hub.

The follow-up of the Risk Analysis will be discussed within the WP6 Team and brought forward to the EOSC-Nordic PMB when a decision on revised action is considered necessary.

8. Next steps

By September 2021 the final version of the Knowledge Hub will be launched. In order to maximize the use, sustainability and the actual and future value of the Knowledge Hub the following steps need to be taken. This preliminary plan also takes into account the recommendations included in the midterm review of the EOSC-Nordic project.

8.1 Dissemination and Outreach for Increased Stakeholder engagement

The stakeholder groups' main motivations of engagement with EOSC-Nordic varies according to their needs. We will further investigate and define actions with the other WP-leaders and dedicated WP experts that ensure that we meet these goals with the Knowledge Hub.

In this final phase of the Knowledge Hub, we will focus on the ways for improving and activating the usage of the Knowledge Hub. All the EOSC-Nordic partners contribute to community development and stakeholder engagement continuously throughout the project. We need to ensure that the partners act as multiple actors, engaging with specific communities of stakeholders.

These actions could be for example

- Usage of new channels and more targeted communication for different stakeholders in order to increase the awareness of the Knowledge Hub among the stakeholder communities according to D6.3 Communication and Outreach Strategy Report (lead WP6)
- Activities to enhance the number of user requests handled by the Knowledge Hub Service Desk (lead WP6)
- Aspects of dissemination and outreach to be taken into account for all the upcoming deliverables and use cases.
 - Improvement of the content and the attractiveness for example, by adding visuals, chart, and statistical analysis (lead WP6)
 - Intensify dialogue with WP-leaders on the aspects (lead WP6) by meetings, presentation etc. incl. F2F-dialogue at WP workshops prior to the EOSC-Nordic General Assembly September 29-30 2021

8.2 Sustainability and Synergies for EOSC

- **Sustainability of the EOSC-Nordic Knowledge Hub**
Discussion and outline of a plan for sustainability across the EOSC-Nordic project incl. a list of Knowledge Hub assets (lead: WP2, D2.9: Sustaining the coordination of EOSC national initiatives at Nordic level)
- **Foster and leverage synergies with other INFRAEOSC-05b projects in the direction of resources sharing, including technical, knowledge and technical resources**
Discussion and outline of the plan for fostering and leveraging project synergies (lead: WP6, D6.5 Final Communications and outreach strategy report)

10. References

EOSC-Nordic (2019) Annex to the Grant Agreement – Part B, Table 3.3. List of Deliverables.

EOSC-Nordic (2020) D6.1. The report, EOSC-Nordic: Stakeholder identification, engagement, and communication strategy (M6)

EOSC-Nordic (2021) D6.3 Communication and Outreach Strategy Report

O'Dell, C., & Hubert, C. (2011). The new edge in knowledge: How knowledge management is changing the way we do business. Hoboken, NJ: John Wiley and Sons.

Annex I: Training activities supported and exploited by the Knowledge Hub

“A total of five training activities will be delivered from M13-36,” according to the EOSC-Nordic report (2019).

The training activities provided by EOSC-Nordic are outlined to be six workshops (planned deliverables M1-36) and an additional two webinars as outlined below. Due to the COVID-19 situation all workshops after February 2020 have been virtual.

To support and exploit the training activities further, the Knowledge Hub provides the EOSC-Nordic’s ‘[Training Library](#).’ Keywords support the user’s navigation in the extensive Training Library (fig 7.1). The intention is for the user to pick-and-choose according to interest and needs rather than having to go through material slavishly.

Table: List of EOSC-Nordic training activities

When	Work Package	Training activity	Title	Details
M6 06.02.2020 (Done)	WP2	Policy workshop	Nordic Policy Workshop	Table 7.2
M9 22.04.2020 (Done)	WP4	Workshop	FAIRification of Nordic and Baltic data repositories	Table 7.3
M16-30 26.11.2020 13.02.2021 (Done)	WP4	Hackathon (workshop)	<ul style="list-style-type: none"> FAIRification workshop - STEP 1 Global Unique Identifiers for Datasets FAIRification STEP 2 on DATA /METADATA webinar 	Table 7.4
M18 09.03.2021 (Done)	WP2	Policy workshop	Second EOSC-Nordic Policy Workshop: Nordic and Baltic collaboration as EOSC Enablers	Table 7.5
M20-30 29.04.2021 (Done)	WP4	Metadata Workshop	FAIRification STEP 3 - generic metadata standards	Table 7.6
M30	WP2	Policy workshop	EOSC-Nordic Policy Workshop	Table 7.7
M13-36	WP3	Webinar	How to get onboard European Open Science Cloud - the Nordic way	Table 7.8
M13-36 Planned for 30.09.2021	WP5	Webinar and Face-to-face option	Use cases – Research demonstrators of Nordic e-Infrastructure Services	Table 7.9

Keywords

[Access policy](#)

[Archeology](#)

[Assessments](#)

[automation](#)

[B2FIND](#)

[Communications strategy](#)

[Compliance checklist](#)

[cross-borders computing](#)

[Data repositories](#)

[EOSC Service](#)

[FAIR](#)

[FlutoF](#)

[Framework](#)

[Galaxy](#)

[Interoperability](#)

[Machine-actionable](#)

[Maturity evaluations](#)

[Maturity model](#)

[Metadata](#)

[Open data](#)

[Open science](#)

[Open science policy](#)

[PIDs](#)

[Policy](#)

[Presentation](#)

[Report](#)

[Resource provisioning](#)

[Services](#)

[Strawman](#)

[Tinman](#)

Figure: List of the keywords for navigating the Training Library

Table: Training activity (M6): EOSC-Nordic Policy Workshop.

When	WP	Training activity	Title
M6	2	Policy workshop	EOSC-Nordic Policy Workshop
Responsible Partner(s):		DeiC, CSC, NorduNet, Rigsarkivet	Joint workshop with OpenAIRE (Copenhagen)
Parameter		Examples	
Training aims / Learning goals		Present and discuss the state of play of open data policy, barriers and opportunities and contribute to the discussion on the implementation of the EOSC at the Nordic and Baltic level.	
Themes		EOSC policies, Open data, Open access.	
Means and Methods		Workshop, Streaming of event, presentations available at EOSC-Nordic web page, news article on EOSC-Nordic webpage, social media visibility.	
Approaches		Give input on policy-related matters relevant for EOSC, such as sharing information about landscape survey. Relying on expertise from the partner network (Share experiences).	
Targeted public		Research and academic institution representatives, research communities, e-Infrastructure service providers, policymakers, and funding agencies.	

Table: Training activity (M9): FAIRification of Nordic and Baltic data repositories.

When	WP	Training activity	Title
M8	4	Workshop	FAIRification of Nordic and Baltic data repositories
Responsible Partner(s):		Nordforsk, GFF, UHel, CSC, UTar, RTU, SND, NSD	(Sweden)
Parameter		Examples	
Training aims / Learning goals		Present FAIR Maturity evaluation results and discuss how repositories can improve their services. Provide guidelines and specific recommendations for organisations hosting data repositories to maximise the findability, accessibility, interoperability, and reusability of research data hosted by such entities.	
Themes		FAIR principles, FAIR metrics, FAIR maturity indicators, Maturity evaluations of repositories, FAIRification recommendations	
Means and Methods		Workshop, evaluation results (e-mail prior to even), presentations available at EOSC-Nordic web	
Approaches		Guidelines and recommendations	
Targeted public		Research data repository managers, repository developers, community stakeholders (e.g. data stewards)	

Table: Training activity (M16): FAIRification Hackathon.

When	WP	Training activity	Title
M16-30	4	Hackathon	FAIRification Hackathon <ul style="list-style-type: none"> FAIRification workshop - STEP 1 Global Unique Identifiers for Datasets

		<ul style="list-style-type: none"> FAIRification STEP 2 on DATA /METADATA webinar
Responsible Partner(s):	Nordforsk, GFF, +++	
Parameter	Examples	
Training aims / Learning goals	Provide group activities to facilitate FAIRification of data repositories and the data hosted thereby fostering the adoption of Best Practices that adhere to the FAIR principles.	
Themes	Onboarding, Open data, FAIRification, Repository certification, Data management, FAIR principles, etc.	
Means and Methods	Workshop format, BYOD (bring-your-own-data), hackathon, webinar / face-to-face meetings, online training, videos	
Approaches	Community specific knowledge base, learning-by-doing, relying on expertise from GO-FAIR partner	
Targeted public	Specific research communities, End users, Service providers	

Table: Training activity (M18): EOSC-Nordic Policy Workshop.

When	WP	Training activity	Title
M18	2	Policy workshop	EOSC-Nordic Policy Workshop
Responsible Partner(s):	CSC		
Parameter	Examples		
Training aims / Learning goals	Present and discuss the state of play of open data policy, barriers and opportunities and contribute to the discussion on the implementation of the EOSC at the Nordic and Baltic level.		
Themes	EOSC policies, Open data, Open access.		
Means and Methods	Workshop, Streaming of event, presentations available at EOSC-Nordic web page, news article on EOSC-Nordic webpage, social media visibility.		
Approaches	Give input on policy-related matters relevant to EOSC.		
Targeted public	Research and academic institution representatives, research communities, e-Infrastructure service providers, policymakers, and funding agencies.		

Table: Training activity (M20): Metadata-4-machines.

When	WP	Training activity	Title
M20-30	4	Workshop	Metadata for Machines: FAIRification STEP 3 - generic metadata standards
Responsible Partner(s):		Nordforsk	
Parameter		Examples	
Training aims / Learning goals		Workshop to assess the state of metadata practices in data-related communities and stimulate the creation and re-use of FAIR metadata standards and machine-ready metadata templates.	
Themes		Machine-actionable metadata, FAIR principles, data standards, automation of metadata creation and harvesting	
Means and Methods		Workshops (will consider online training, webinars)	
Approaches		FAIR maturity evaluation and community engagement event early in the project is intended to identify candidate communities that can benefit from such events.	
Targeted public		Specific research communities, End users, Data creators	

Table: Training activity (M30): EOSC-Nordic Policy Workshop.

When	WP	Training activity	Title
M30	2	Policy workshop	EOSC-Nordic Policy Workshop
Responsible Partner(s):		CSC	
Parameter		Examples	
Training aims / Learning goals		Present and discuss the state of play of open data policy, barriers and opportunities and contribute to the discussion on the implementation of the EOSC at the Nordic and Baltic level.	
Themes		EOSC policies, Open data, Open access.	
Means and Methods		Workshop, Streaming of event, presentations available at EOSC-Nordic web page, news article on EOSC-Nordic webpage, social media visibility.	
Approaches		Give input on policy-related matters relevant for EOSC, such as sharing information about landscape survey. Relying on expertise from the partner network (Share experiences).	
Targeted public		Research and academic institution representatives, research communities, e-Infrastructure service providers, policymakers, and funding agencies.	

Table: TO COME: Training activity (M13-36): How to get onboard the European Open Science Cloud - the Nordic way.

When	WP	Training activity	Title
M13-36	3	Webinar	How to get onboard the European Open Science Cloud - the Nordic way
Responsible Partner(s):		UT/ETAIS	
Parameter			Examples
Training aims / Learning goals			Develop an understanding of services and approach that EOSC-Nordic is using for bringing services to EOSC, Train-the-trainers
Themes			Onboarding, EOSC services, Service management.
Means and Methods			Webinars, Support material via Knowledge Hub and Competence Map
Approaches			Self-training material, Dedicated national contacts for follow up and support
Targeted public			Service providers

Table: TO COME: Training activity (M13-36): Distributed computing and data sharing — the cross-borders challenge from the user community perspective

When	WP	Training activity	Title
M13-36	5	Webinar	Use Cases: Showcase solutions to enable computing and data sharing cross-borders
Responsible Partner(s):		Sigma2	
Parameter			Examples
Training aims / Learning goals			Showcase solutions for better use of EOSC Services and data to solve the challenges related to cross border collaboration
Themes			Data management and EOSC services
Means and Methods			Webinar
Approaches			Community specific knowledge bases
Targeted public			Specific research communities, End users, Service providers