

Nordic Biodiversity Framework

Supplementary material



Activities and publications

This supplementary material is a part of the [Nordic Biodiversity Framework](https://biodice.is/nordic-biodiversity-framework/), a project funded by the Nordic working group for Biodiversity of the Nordic Council of Ministers in 2024. biodice.is/nordic-biodiversity-framework/

The network

Rannveig Magnúsdóttir was hired as an operational manager and she is based in Iceland. Hanna-Kaisa Lakka was hired as a co-manager and she is based in Finland. Members that were hired part-time in Iceland are Ole Martin Sandberg and Rebecca Thompson. Other members in Iceland (Skúli Skúlason and Ragnhildur Guðmundsdóttir), Denmark (Katherine Richardson, Carsten Rahbek, Lars Dinesen and Anders Petersen) and Finland (K. Emily Knott and Katja Räsänen) were self-funded. An online kick-off meeting was held on the 15th of March 2024 with attendants from Iceland, Denmark and Finland. One of the most important activities in this project has been to establish and develop trust, cooperation, and communication among the participants across the member countries. This has been carried out by having regular meetings, online and in-person, where methodologies and visions, as well as divisions of responsibility, were shared and discussed. Information on the NBF project and its results are found on the [Biodice homepage](#).

CBD meetings

The subsidiary bodies of the Convention on Biological Diversity (CBD) met in Nairobi, Kenya on 13-29 May 2024. The meeting aimed to compile scientific tools and guidance to support the implementation of the Global Biodiversity Framework as well as to outline the framework of indicators that will monitor progress. Snorri Sigurðsson, a member of BIODICE and the NBF project, who also represented the Icelandic government, participated in this meeting. Snorri furthermore represented the NBF project at COP16 in Cali, Colombia on 21 October – 1 November 2024.

European Congress of Conservation Biology, Bologna, Italy, June 17-21 2024

Hanna-Kaisa Lakka and Ragnhildur Guðmundsdóttir attended the 7th European Congress of Conservation Biology (ECCB). They organised a workshop on the GBF Target 3. At the congress, they also carried out a survey among conservation biologists on their views on approaches to conserve biodiversity. They got 26 answers from 15 countries, the data is being analysed and will be published (2025-2026 Figure 1). Results were used in the project workshops in Finland and Denmark. This is part of the broad networking of the project.



Figure 1. The project team organised a survey about the 30 by 30 conservation targets (Target 3). These are the preliminary results which underline the importance of equal protection for all biomes' land, seas, and inland waters. Conservation scientists stated that will is the main barrier to successful conservation in land, sea and inland waters.

Outreach

The project has been extensively engaged in scientific and public outreach as well as meetings with the private sector and NGO's. Here is a list of publications, presentations and events attended by NBF members.

Workshops

- Workshop 1 in Iceland, April 23, 2024¹
- Workshop 2 in Finland, October 7, 2024²
- Workshop 3 in Denmark, December 10-11, 2024³

¹ See more info on: <https://biodice.is/nbf-workshop-in-iceland/>

² See more info on: <https://biodice.is/nbf-workshop-in-finland/>

³ See more info on: <https://biodice.is/nbf-workshop-in-denmark/>

Publications, in both academic and popular media, by members of the project

- Sandberg, O.M., Schultz, A., Guðmundsdóttir, R. and Skúlason, S. (2025). 'Species' Is Not the (Only) Unit of Biodiversity: A Process-Philosophical Perspective on Conservation Concepts. *Marine Ecology*, 46 (1), 1-10. <https://doi.org/10.1111/maec.12857>
- Rannveig Magnúsdóttir. Fjölbreytni í náttúru Íslands. Article on Visir to celebrate Day of Icelandic nature, 16 September 2024.
- Ragnhildur Guðmundsdóttir. Hatar þú heiðlóur? Article on Visir to celebrate Day of Icelandic nature, 16 September 2024.
- BIODICE, on behalf of the NBF, supported the report Joint Nordic Effort for Biodiversity - Recommendations from Nordic civil society. September 2024.
- Ragnhildur Guðmundsdóttir, Rannveig Magnúsdóttir, Skúli Skúlason, Ole Martin Sandberg and Sæunn Júlía Sigurjónsdóttir. 2024. Líffræðileg fjölbreytni á Norðurlöndum. *Náttúrufræðingurinn* 94 (1-2). 49-53.
- Rannveig Magnúsdóttir, Ragnhildur Guðmundsdóttir, Skúli Skúlason, Ole Sandberg and Sæunn Júlía Sigurjónsdóttir. Fögnum á degi líffræðilegrar fjölbreytni (Celebrate on the International Day for Biodiversity). Visir on 22 May 2024.
- Hanna-Kaisa Lakka. Four news releases were in the University of Jyväskylä newsletter BIOSKA.
 - The first BIOSKA release was a news article about the new NBF project. February 2024.
 - The second was an article about the project's first workshop in Iceland. May 2024.
 - The third one was a new article about a workshop in Italy. September 2024.
 - The fourth article was about the project workshop in Finland. November 2024.
- Ole Martin Sandberg, Anthony Schultz, Ragnhildur Guðmundsdóttir, Skúli Skúlason: "Species Are not a Good Unit for Biodiversity Conservation: a Process Philosophical Perspective", submitted to the journal *Marine Ecology* (accepted for publication pending revisions).
- Lakka, H-K., Finstad, A.G., Rautio, M., Kristjánsson, B.K., Guðmundsdóttir R., & Skúlason S. (2024). Is the Arctic overlooked in global biodiversity protection goals for freshwaters? *Arctic, Antarctic, and Alpine Research*. *Accepted*.
- Qvenild, Fjellheim, Hesthagen & Lakka. "Quantitative Ecology of the Arctic Tadpole Shrimp *Lepidurus arcticus* (Branchiopoda, Notostraca) in the Fennoscandian Mountain Range and on the Svalbard Archipelago". *Under review*.

Manuscripts in progress:

- Joseph Culp J., Kirsten S. Christoffersen, Kimmo Kahilainen, Willem Goedkoop, Michael Power, Milla Rautio, Hanna-Kaisa Lakka., et al. Future research and monitoring needs for Arctic freshwaters. The Steering Committee held an in-person workshop in Copenhagen, Denmark from November 13-15 to review questionnaire responses and develop a

manuscript draft. There are many interesting trends in the data, one of which is that Biodiversity and Taxonomy were considered the most important categories by experts in North America, Europe and among the mid- to late-career researchers. Submission for journal review is anticipated by early May 2025.

- EU Bird Directive: Rethinking rights to hunt endangered species MS status: Results: Finland, Norway and Sweden data is ready. Denmark data still needs to be added.
- Policy brief on the management and conservation needs of birds listed in EU bird's directive in Nordic countries. MS status: Results: Finland, Norway, Sweden and Iceland data are ready. Denmark data still needs to be added.
- Research needs in relation to 30% of global conservation needs in inland waters, sea and land. This manuscript is related to results (survey and workshop) collected from scientists in the ECCB conference.

Presentations and events

- 10-11 December 2024. Presentations by NBF members Carsten Rahbek, Hanna-Kaisa Lakka, Skúli Skúlason, Ole Sandberg and others at Workshop 3 in Denmark.
- 20 November 2024. Presentation on biodiversity at the Natural history museum in Kópavogur by Rannveig Magnúsdóttir.
- 21 Oktober – 1 November 2024. CBD COP16 in Cali, Colombia. Snorri Sigurðsson attended on behalf of BIODICE and the NBF.
- 22-23 October, 2024. Nordic Symposium for Biodiversity, Trondheim, Norway.
- 7-10 October 2024. Presentations by NBF members Hanna-Kaisa Lakka, Katherine Richardson, Skúli Skúlason, Rannveig Magnúsdóttir, Rebecca Thompson and others at Workshop 2 in Finland.
- 27-28 August, 2024. Joint Nordic Effort for Biodiversity conference, Oslo, Norway. Rannveig Magnúsdóttir participated on behalf of the NBF project. By attending this event, a good working relationship with the Forum for utvikling og miljø (ForUM) in Norway was developed and the NBF participated
- July 17, 2024. The FSBI Annual Symposium 2024, Bilbao, Spain. Presentation by Beverton Medal winner Skúli Skúlason.
- July 13, 2024. Nature and Art Festival for kids at the Sheep Farming Museum in Strandir. Two nature and art events in collaboration with the Icelandic Museum of Natural History.
- July 2, 2024. Presentation on biodiversity, BIODICE and NBF for rangers and other staff members of Vatnajökull National park by Skúli Skúlason
- June 27, 2024. Webinar: Engagement Across Multiple Disciplines. Ole Martin Sandberg.
- June 17-21 2024. 7th European Congress of Conservation Biology in Bologna, Italy. Workshop and surveys *"Communicating Conservation Status to Policy: Pros and cons about the 30% protection needs of land, sea and inland waters"* conducted by Hanna-Kaisa Lakka and Ragnhildur Guðmundsdóttir.

- June 16-21, 2024. World Biodiversity Forum, Davos, Switzerland. Bjarni Kristófer Kristjánsson participated on behalf of BIODICE and the NBF.
- June 7, 2024. Presentation on biodiversity, BIODICE and NBF for staff members of the Icelandic Regional Development Institute (Byggðastofnun) by Skúli Skúlason.
- May 31, 2024. Keynote lecture on nature, art and science at the conference Art and Nature held at the Kópavogur Art Museum by Ole Martin Sandberg.
- May 23, 2024. Hanna-Kaisa Lakka attended the Helsinki Biodiversity Day event in Helsinki, Finland.
- April 23rd, 2024. Presentations by NBF members Skúli Skúlason, Rannveig Magnúsdóttir, Ragnhildur Guðmundsdóttir, Hanna-Kaisa Lakka, Katherine Richardson and others at Workshop 1 in Iceland.
- April 17, 2024. Presentation on biodiversity, BIODICE and the NBF project for BPW Iceland (Business and Professional Women) by Rannveig Magnúsdóttir.
- April 5, 2024. Icelandic Ecological Society meeting. Presentation on BIODICE and NBF by Skúli Skúlason.
- March 8, 2024. Presentation on BIODICE and NBF at the Conference of Humanities at the University of Iceland, by Ole Martin Sandberg.
- March 7, 2024. Ragnhildur Guðmundsdóttir and Skúli Skúlason presented the NBF project to the team of area protection (teymi friðlýsinga og friðlýstra svæða) at the Environmental Agency in Iceland.
- February 22, 2024. Ragnhildur Guðmundsdóttir attended a meeting at the University of Copenhagen in the project FishFAR where the Nordic Biodiversity Framework was introduced. Presentation title: Strategies for monitoring and protection of freshwater biodiversity in Iceland.
- January-February 2024. Hanna-Kaisa Lakka attended two training sessions on how to write effective policy briefs. Short-term effect: Cooperation and Networking and submitting Policy Brief. Long-term effect: Leading practices how 30 % fulfil the 30 % inland water conservation in Arctic Countries.