GRUDE

Kine Charlotte Jakobsen, Maarit Timonen & Ulf Hägglund

Networking for Green Transition in the Rural Arctic

Networking Manual













Troms og Finnmark fylkeskommune Romssa ja Finnmárkku fylkkagielda Tromssan ja Finmarkun fylkinkomuuni





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Lapland University of Applied Sciences Rovaniemi 2022 Kine Charlotte Jakobsen Maarit Timonen Ulf Hägglund

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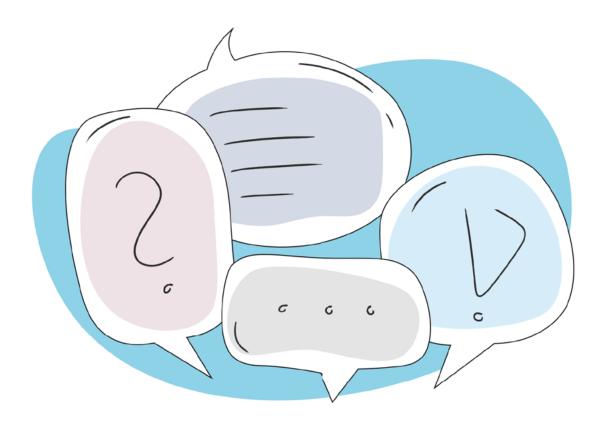
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1 Introduction

The importance of networking and collaboration across value chains, sectors and borders has been pointed out by several researchers (Ghisellini et al., 2016; Hauge et al., 2018; Leising et al., 2018; Zagragja & Rydningen, 2016), as well as organisations like the Ellen MacArthur Foundation (2013). Further, during the GRUDE project, we have observed a consensus regarding the need for and importance of networking and collaboration to enable the green transition in general, and in the rural Arctic specifically.

Thus, the lack of recognition or acceptance of the utility value of networking are not the issue. The big questions seem to be: How do we facilitate successful networking for enabling the green transition? Who needs to be involved, and how do we get them involved? To what means do people and organisations network? And how do we establish robust structures that support stakeholders facilitating networking and collaboration for the green transition?

In this manual, we address these questions by building on the experiences gathered during the GRUDE project. It contains information about different models and methods of networking, together with experiences and recommendations drawn from interviews with regional networks working to facilitate the green transition across sectors and different regions in the Arctic, as well as from the GRUDE project itself. The intent of this Networking Manual is to support others working to facilitate networking and collaboration enabling the green transition.



2 What is known about Networking?

This section is based on a topic article, written by the GRUDE project team members. The article was published in Lumen (Lapland UAS Journal) in the autumn 2021 (Timonen, Jakobsen, Ervasti 2021).

The importance of collaboration to enable the green transition has been widely acknowledged. In their study, the Ellen MacArthur Foundation (2013) identified four building blocks to mainstream the circular economy, together with four enabling factors, amongst these cross-chain and cross-sector collaboration. Further, collaborative platforms facilitating cross-chain and cross-sector collaboration have been identified as an important enabler of circular economy in various literature (Ellen MacArthur Foundation 2013; Zagragja and Rydningen, 2016; Leising et al. 2018; Ghisellini et al., 2016).

Digital Networking - The Covid Effect

When COVID-19 struck, it radically affected work processes, accelerating the trend towards working digitally. Early estimates from Eurofound (2020) indicated that close to 40 percent of workers in EU began working remotely fulltime because of the pandemic and imperatives for social distancing. Although societies have now re-opened and people have returned to the office, digitalisation of work and everyday life is here to stay, bringing both possibilities and challenges.



This digital transition is particularly interesting in the context of rural areas, hallmarked by long distances and sparse population. For one, utilising digital infrastructures and work processes when possible, can ease the logistics of work and information flow. Secondly, although having digital meetings was a necessity due to COVID-19, there are obvious economic and environmental benefits in reducing travel and physical meetings. Therefore, the global pandemic has accelerated virtual and digital collaborations and alternative ways of communication, also when working to realise the green transition and circular economy in the Arctic. This requires, however, efficient platforms for digital collaboration.

Transition to a new age of Digitalization



3 Green Networks in the Rural Arctic

In this section, we present the findings of the GRUDE project regarding networking for green transition in the rural Arctic. The information in this chapter is based on interviews made during the project. GRUDE has interviewed five networks (four regional and one international) that are working to support and facilitate green development for businesses and municipalities. In this chapter, we present findings from the interviews related to the organisations' networking models, experiences and recommendations.

CirEko



CirEko is a non-profit, independent, membershipbased organisation, focusing on promoting circular economy transition processes in business life, companies and the whole society. The vision **CIREKO** is 'prosperous businesses and communities within the carrying capacity of the planet'. To get there, CirEko promotes circular markets by setting

up regional member networks, as well as strategic actions within training, information sharing, matchmaking and business opportunities.

Today, CirEko has about 200 members all over Sweden. The organisation is funded by membership fees. Businesses' membership fees are set by their number of employees. CirEko has a rather wide target group, including everyone with an interest in circular economy, whether they are new to the circular economy concept, and would like to start learning, or are already in the loop and ready for collaboration, innovation, and business. For municipalities, joining CirEko offers a tool for branding and a possibility to position themselves as a city where circular economy matters.

Actions are managed via platforms that, together with CirEko's regional networks, form the CirEko concept: Knowledge, Inspiration, Development and Positioning within Circular economy:

- Businesses get access to knowledge, business partners and resources that will increase profitability - in sustainable ways
- The public sector finds increased knowledge on circular economy and circular management. Joining CirEko networking and training events will lead to better resource efficiency and decrease public spending.
- Strategic actions and activities such as political hearings and capacity building directed towards politicians are managed jointly with the Cradlenet network
- CirEko is a member of a national working group (under the Delegation for Circular Economy) focusing on SME's transition. The rganization has also joined Ecopreneur, the European Sustainable Business Federation, to strengthen the voice of sustainable business in Brussels (the EU)

Cradlenet

Cradlenet is a non-profit, memberdriven, member-funded network organisation based in Stockholm. Work is run by employees, the

Crodlenet

operational board and by local networks in the North, South and West of Sweden.

Cradlenet is probably one of the world's oldest circular economy networks, as it was established back in 2009, before Ellen MacArthur invented the term circular economy. Instead, a group of likeminded people gathered to discuss the book Cradle to Cradle – Remaking the Way We Do Things by Michael Braungart and William McDonough. The funding of Cradlenet is based on membership fees. The levels of the fees have been recently re-structured to match the level of access to services and support.

Cradlenet's target is that by 2040, Sweden will have circular economy in place as a prerequisite for achieving the national climate goal for 2045. The work towards these objectives is structured around the following actions:

- Individual support to members in issues related to circularity and circular economy, through the newly established hotline service
- Collaborative activities such as network meetings and matchmaking
- Knowledge and capacity building via events and seminars
- Trend analysis, foresight, circular case studies
- Information and communication through its own well-developed social media platform
- Influencing policy makers, politicians and decision makers

Cradlenet invites both businesses and organisations as network members. Initially, most members have been small, single-person companies, but today, also bigger companies have become members of the network. Presently, the network has about 150 members, being a mix of companies, organisations and privateers. The main focus of Cradlenet is to help its members manage the transition to a circular economy better. In the long term, the network will play a vital part in enabling Sweden to become circular already by 2040.

Hinku



The Hinku network was originally created in a project called 'Towards a Carbon Neutral Municipality' led by the Finnish Environment Institute (SYKE) in 2008. Initially, the network consisted of only five municipalities. The goal of Hinku is to reach an 80 percent reduction of emissions by 2030 compared to the levels of 2007, while emphasizing that other sustainability goals must be considered alongside the climate goal.

Hinku is still led by SYKE where the network operates as "an umbrella" for other shorter, fixed-term projects. The Hinku network's management team consists of the Hinku municipalities mayors, chairpersons of working groups in Hinku counties and regional Hinku-actors. The municipality must also have a Hinku contact person who acts as a link between the municipality, SYKE and the rest of the network.

Joining Hinku does not cost the municipality or county anything. However, the municipality must set aside working time for Hinku work. Companies associated with Hinku are charged a small annual membership fee based on turnover.

Nowadays, the Hinku network has grown to include 82 Finnish municipalities and cities. The majority of these are from the south of Finland, but also 5 municipalities from Lapland have joined the network. Hinku brings together municipalities committed to reducing emissions, companies offering climatefriendly products and services, and energy and climate experts, as well as provinces.

LET'S CONNECT!

The Hinku network offers the following assets to its members:

- Networking opportunities both at the national level between municipalities and provinces and at the international level, for example in the Nordic Circular Arena (NCA) and the European consortia Covenant of Mayors and ICLEI (ICLEI, 2022)
- Exchange of information at various project events
- Support for the preparation of separate projects in cooperation with various parties
- Emission calculation services and tools: The total emissions of all municipalities are calculated on the Carbon Neutral Finland website. The site also has a scenario tool for evaluating the impact of the measures on municipalities
- Communication co-operation: the project raises the profile of member municipalities' climate work in various media and by highlighting and rewarding good practice
- Visibility for companies' products and services

Participating in the network demands climate actions that affect all activities in the municipalities. Thus, engaging in Hinku requires commitment from the municipal leadership to certain goals, as well as attitude, motivation and inspiration. Through these measures, the network is promoting concrete climate actions in the municipalities. The most important affects have been witnessed in the fields of energy production, energy efficiency in buildings, transportation and solar electricity.

Klimapartner Troms and Finnmark

Klimapartner (= climate partners) is a Norwegian network concept, where regional networks are organised as independent projects in each region and are owned by the respective county authorities. Each region has its own leader and steering group with representatives from the partners in the region. In addition, there is a national region coordinator who helps new regions get started. In Troms, the Klimapartner network was launched in 2017. In Finnmark, the network launch in 2019 was



initially suggested at the political level as a means to bridge the knowledge gap related to climate issues. The regional network is now jointly managed and funded by Troms' and Finnmark's County (fylkeskommune).

Klimapartner Troms and Finnmark has a twofold funding stream:

- a basic financial contribution from both Troms and Finnmark County
- member fees depending on number of employees

The vision of Klimapartner is that the average rise in global temperature would remain under 1,5 degrees by 2030. The objectives are to reduce businesses and public sector's climate impact by decreasing emissions and by supporting a green development process. Klimapartner's operation is closely connected to United Nations Sustainable Development Goals (SDGs), launched in 2015. The network focusses, first and foremost, on enhancing the goals number 13 (Climate action) and 17 (Partnerships for the goals), thus outlining a clear ambition to be an active and important player in the process of green transition.

Currently, Klimapartner Troms and Finnmark consists of almost 40 partners, representing a cross-sectoral approach that involves stakeholders from education and research, as well as public and private sectors. Partners sign a binding partnership agreement and are challenged to become fossil free (direct emissions) by 2030 and to establish at least one spearhead project.

In summary, what Klimapartner offers to partners is:

- Partnership and cooperation
- Profiling and branding
- Competence and support
- Climate revision report
- Knowledge and inspiration

The emphasis of Klimapartner Troms and Finnmark is on knowledge sharing, innovation and collaboration-to create a more sustainable future for companies, individuals and society. In addition, the agenda includes actions for profiling the network, both externally and internally, as well as arranging events and promoting good practices. To support this approach, the organisation has launched their own Green Solution Bank already in 2020 (Klimapartner, 2022).



Nordic Circular Hotspot / Nordic Circular Arena

Nordic Circular Hotspot (NCH) was founded in June 2019 and is, presently, run by ten managing partners from five Nordic countries, as well as one addition from The Netherlands. Each partner has extensive experience, knowledge and circular networks on regional, national and international levels. Recently, NCH launched the Partner Programme: a tenyear collaboration project designed for a strategic, systematic, and efficient circular market transition to secure sustainable development in the Nordics.



The purpose of the Partner Program is to:

- Build a common market culture and economic language for circular and sustainable value development
- Stimulate cross-market segment, cross-economic sector and cross-regulatory silo collaboration and dialogue in the Nordic market sphere
- Provide an accessible overview to help stakeholders navigate and co-ordinate in the Nordic market
- Increase market dynamics, transactions, and investments in circular and sustainable solutions
- Define and align on the core circular and sustainable values of the Nordic market (Nordic Circular Arena 2022.)

NCH is funded by Nordic Innovation, an organization under the Nordic Council of Ministers, and by contribution from the ten strategic partners. In addition, individual network partners contribute with a yearly fee, depending on annual revenue. There is also a possibility that partners, instead of paying the financial fee, can deliver in-kind efforts, or in other words, offer working hours as payment.



The overall objective is to promote and contribute to a circular society by 2030, and the way to manage that is by collaboration and joint efforts. Collaboration is the key factor, and that is why NCH wants to promote themselves as a multistakeholder platform. The mission is to accelerate the transition to an inclusive, resource-efficient, regenerative, and circular market in the Nordic region, and contribute in a meaningful way in order to:

- REINVENT how the Nordics design, produce and market products
- RETHINK how the Nordics use and consume goods and services
- REDEFINE growth in the Nordics and what is possible through reuse, reduction, repairing, regeneration and, most importantly, systems change

In June 2021, NCH launched Nordic Circular Arena (NCA), a digital collaboration platform initiated, developed and managed by Nordic Circular Hotspot as a 'go-to place for everyone involved or interested in the circular economy transition in the region' (Nordic Circular Arena 2022). As collaboration is an important tool of NCH, networking is essential also in the NCA.

Members are, therefore, encouraged to get in touch with each other to create opportunities and share experiences, also at a cross-border level. Activities, or rather, opportunities to learn, participate and collaborate, are presented continually on the platform. Anything from circular news, events, projects and foresight reports are made available to the members at no cost. All this is done to help accelerate the transition to a circular economy in the Nordic region.

Summary

Experiences and recommendations derived from the interviews with the regional green networks:

Networking and collaboration are essential for a successful transition into circular economy. In other words, the logic of circular economy itself calls for collaboration between stakeholders and across existing value chains. Further, the scarcity of resources in organisations creates efficiency requirements for networking operation.

Further, there is a general need for robust structure supporting engaged individuals – 'a fire needs logs to keep burning'. Networks and such forms of organized collaboration can serve as an important tool for the people that otherwise work separately with green or circular initiatives all around the region. It is often said that people working with green development are so called 'fiery souls', that is, people with a strong personal motivation to contribute to a more sustainable future. It is important to build viable structures and organisations around these people to support their work and engagement, and to prevent them from burning out.

3.1 COVID-19 pandemic and networking on digital platforms

Several of the networks interviewed for in this manual, reported an increasing interest for green development and circular economy since the COVID-19 pandemic and lockdown, which is interesting in itself. The transition to digital events also resulted in an increasing number of participants in events. Regarding issues related to network activities during the pandemic, the general experience seems to be that digital meetings have one significant advantage: in geographically large regions, more people can participate. This has led to a lasting transition to digital and hybrid solutions, supplementing physical meetings.

However, the networks acknowledge a need for further development of digital platforms and solutions. Several of the networks interviewed, mentioned difficulties concerning digital interaction. Especially informal interaction seems to be mostly absent on online platforms, which leaves out an important part of the interaction

which naturally occurs during physical events. Moreover, acknowledging individual members is considered more difficult in online communication. This creates a need to develop a format that ensures this type of informal and more personal networking in digitally facilitated communication.

Recommendations

- Provoke action Idleness is kills engagement and motivation.
- Have clear goals Be sure to set up clear, realistic and transparent plan and agenda – clarifying the 'why, how and what' of the network also makes it easier to recruit more likeminded people. Be true to your mission.
- Market efficiently With the power of example, move forward to get the media interested and communicate successfully about the work. Look for help from other actors and networks that can help spread the word.
- Connect with others There is a lot of good initiatives out there. Find others who are also working towards the same goal to find support and make the marketing of your network easier.
- Listen and understand members' needs and wants and develop a value proposition that is coherent with their visions, objectives and expectations.

3.2 Networking in the GRUDE project

This section explains the GRUDE project's internal experiences and offers recommendations related to networking and collaboration – What can be learned from the project?

Organising events has been one of the main activities during the GRUDE project. The events have focused on different aspects of green economy and circularity and have engaged participants from several target groups, such as municipalities, education, research and business. In the feedback surveys from these events, participants have been asked the following question:

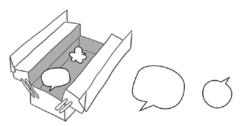
> "How important do you think **networking** and **co-operation** between all actors in society is for **promoting Green Economy?**"

This question has received top score from the participants throughout the project period and across all different types of events, confirming the importance of networking. This conception is also supported by literature (see e.g., Ghisellini et al., 2016; Hauge et al., 2018; Leising et al., 2018; MacArthur, 2013; Zagragja & Rydningen, 2016). The clear need for collaboration leads to questions, like, how networking should be done and what are the most efficient ways of bringing people together?

At the initialisation phase of the GRUDE project, the idea of networking was focused on the recognition that it was necessary to create a platform where people could join forces to succeed with the green shift in the rural areas. As the project went on, the approach shifted more towards seeing networking as an action that was incorporated in all project events and communication, rather than deeming network building as a separate activity.

The networking tools of the GRUDE project

Events



- Workshops
- Regional information sharing campaigns
- Greennovation Camps
- Collaboration with other projects/networks

Online and Social media platforms

- Project webpage
- Facebook page and groups
- Nordic Circular Arena (Nordic Circular Hotspot's newly established online platform)

Other tools

 "Networking padlets": online boards where event participants were able to share business cards and contact information

This networking toolbox was, of course, also a consequence of the COVID-19 pandemic and the associated restrictions. Initially, the project had planned for a series of physical events across the project region, but because of the pandemic restrictions, all networking activities had to be conducted on digital platforms.

This transition resulted in more resource efficient event planning and execution, making it possible to arrange more events, as well as reaching out to more individuals than initially planned. According to original plan the project would have reached 150 individuals, but due to the transition to digital events approximately 900 participants were engaged. This was in addition to people who visited the project web-page, and watched the videos on the project's YouTube channel.

However, in this transition from physical to digital interaction, there were also a few downsides. For example, we found that mobilising strong engagement and interaction on an individual level was harder compared to the experiences from previous projects and activities.

3.3 GRUDE Project Experiences and Recommendations

Connect to what is already going on

Early on, GRUDE acknowledged that there are already several active green initiatives in the Arctic region. Thus, it was considered useful to connect and collaborate with these initiatives, rather than compete with the existing networks. However, none of these stakeholders seemed to share the Arctic focus of the GRUDE project. This became the unique selling point of GRUDE, differentiating it from other active networks and stakeholders in the region.

Furthermore, we have recognised the value of connecting project activities to national, regional and local strategies related to the green transition and sustainability, as well as secondary strategies related to business and societal development. Connections to relevant strategies is, of course, a requirement for receiving funding, but in addition, it can make recruiting easier in the sense that relevant stakeholders can relate their own strategies to that of the project.

Targeting

During the project, GRUDE had a rather wide target group, addressing both public (municipal, county level) and private sector stakeholders, as well as students. This was a consequence of the Interreg Nord track, under which the GRUDE project was financed, but also a result of the recognition that circular economy inherently calls for collaboration between stakeholders in different industries and sectors of society.

The large coverage of different target groups made it possible for GRUDE to share information about green economy extensively, as well as allowed a multi-sector focus on choosing the topics of our events. The extensiveness came, however, on some occasions, at the expense of depth, both regarding the topical focus of events, as well as recruiting people to the GRUDE network. As the focus of the project was on reaching out to "as many people as possible", it might have been beneficial to rather invest time and resources on a limited number of stakeholders.

Online format

Having an online project activity format had several positive effects:

- Resource efficiency Online formats of networking, collaboration and overall project execution can contribute to overcoming geographical barriers, reducing the climate footprint, as well as investment costs for event participants (both in terms of time- and travel costs), thus increasing the availability of events. Further, it allows an increased frequency of project activities and events within the same budget frame.
- Recruiting expert keynotes and finding participants Meeting online can make it easier to recruit experts from outside the project region. In addition, it can also lower the threshold to join events.

Although online tools have been proved to be efficient in some cases, the experience in the GRUDE project has been that some aspects were lost along the way. As an example:

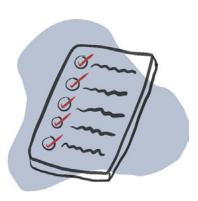
- Lack of informal networking Online events easily became monologues, since on platforms, such as Teams and Zoom, only one person could talk at once, while all other participants would have to listen. This works well for a presentation mode, but does not allow informal interaction such as small talk during breaks etc. The experience in the GRUDE project is that the online formats of interaction cannot replace face-to-face meetings, but can work well in supplementing them.
- Lack of investment In an online-networking context, experiences suggest that it can be harder to get participants fully invested and committed when face-to-face interaction is missing. Our experience is that it is also challenging to invest sufficiently on an individual participant or stakeholder when meeting online.

4 Summary - Key Findings and Recommendations

Rationale of networking

Collaboration is inherent to circular economy





Networking – targeted and structured collaboration

- Networking is a measure or a tool, not a goal in itself: it means joining forces in solving a common challenge
- The key is to facilitate community building between stakeholders – this makes it easier to reach out to others when necessary
- Structure is essential for successful collaboration

Clear targets and objectives for networking

- Networking is in itself not enough motivation for stakeholders and organisations to join the network
- It is necessary to define the "what, why and how" of the network



Networking – win-win, but also give and take

- The collaboration must add value to the life and work of participants or network members.
- The network must invest in its members, and the members must invest in the network





Online networking

- An efficient tool with certain trade-offs
- Meeting online cannot replace face-toface meetings, but the online format can supplement physical meetings and events, bringing several positive effects to a project.

Success Factors for

Timing - in line with the

Relevant and efficient platforms for networking and collaboration

Financial stability

Devotion – a genuine and honest interest in bringing the circular approach higher up on the agenda

Professionalism, strategy and structure

Lobbying based on relevant data, research and intelligence compiled in reports and state-of-the-art analysis



Continuity of staff members

Clear goals with a transparent, cle

Green Networking

overall Green Trend

The possibility and openness for members to bring in own ideas, projects, questions, and issues

Voluntariness and commitment

Knowledge sharing – relevant tools and methods

Political interest and support

Network must invest in actors, and actors must invest in the network

Partner and consortium building

Large companies and organisations take the lead, and have ownership – where networks act as a 'brokers' in the process

ear and relevant message

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References

Ahrendt, D., Cabrita, J., Clerici, E., Hurley, J., Leončikas, T., Mascherini, M., Riso, S. & Sándor, E. 2020. Living, Working and COVID-19. Publications Office of the European Union. Accessed 31 August 2022

https://www.eurofound.europa.eu/sites/default/files/ef_publication/field_ef_document/ ef20059en.pdf_

Ellen MacArthur Foundation 2013. Towards the Circular Economy, Economic and Business Rationale for an Accelerated Transition. Accessed 31 August 2022

https://www.werktrends.nl/app/uploads/2015/06/Rapport_McKinsey-Towards_A_Circular_ Economy.pdf_

Ghisellini, P., Cialani, C. & Ulgiati, S. 2016. A Review on Circular Economy: The Expected Transition to a Balanced Interplay of Environmental and Economic Systems. Journal of Cleaner Production Vol. 114, 11-32. Accessed 31 August 2022

https://www.sciencedirect.com/science/article/abs/pii/S0959652615012287

Hauge, Å. L., Hanssen, G. S., Flyen, C. & Strømø, E.-B. 2018. Nettverk for å lære klimatilpasning. Hvorfor og hvordan? Klima 2050 Report Nr. 9. Accessed 31 August 2022 <u>https://sintef.brage.unit.no/sintef-xmlui/bitstream/handle/11250/2503729/</u> <u>klima%2b2050%2breport%2bno%2b9.pdf?sequence=2&isAllowed=y_</u>

ICLEI 2022. About us. Accessed 31 August 2022 <u>https://iclei.org/about_iclei_2/</u>

Klimapartner 2022. Den grønne løsningsbanken. Accessed 31 August 2022 https://klimapartnere.no/losninger/

Leising, E., Quist, J. & Bocken, N. 2018. Circular Economy in the Building Sector: Three Cases and a Collaboration Tool. Journal of Cleaner Production Vol. 176, 976-989. Accessed 31 August 2022 <u>https://www.sciencedirect.com/science/article/abs/pii/S0959652617329402?via%3Dihub</u>

Nordic Circular Arena 2022. Accessed 31 August 2022 <u>https://nordiccirculararena.com/</u>

Nordic Circular Hotspot 2022. Accessed 31 August 2022 <u>https://nordiccircularhotspot.org/</u>

Timonen, M., Jakobsen, K. & Ervasti, S. 2021. Arctic Networking to Make the Green Shift Happen in Lapland. Accessed 31 August 2022

https://blogi.eoppimispalvelut.fi/lumenlehti/2021/10/26/arctic-networking-to-makegreen-shift-happen-in-lapland/

Zagragja, A. & Rydningen, J. K. 2016. Circular Economy in Norway: A Qualitative Study of How Collaboration Across Firms, Industries and Sectors Act as an Enabler of a Circular Economy in Norway. Norwegian School of Economics. Faculty of Economic Nordic Circular Arena 2022. Accessed 31 August 2022 This publication has been prepared by the Green Rural Economy – GRUDE project (2019 – 2022). The development objective of the project, funded by the Interreg Nord 2014 – 2020 program, is to achieve increased awareness of the possibilities within circular economy and resource efficiency in the North in order to gain green growth. By establishing a green growth practice in the program region, we can form a blueprint or standard which can be adapted in other sparsely populated areas.

By informing different stakeholders about the possibilities of green growth through strong communication, knowledge dissemination and changing best practices between the Nordic regions, it is possible to gain greener attitude and resource efficiency to the northern areas to advance the transition to greener economy.







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