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Cultivating communication

Participatory approaches in land restoration in Iceland

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Clarification of contribution

I hereby declare that the study design, data collection, data interpretation and writing of the following thesis and the two included papers is my work. It was done under the supervision and with the assistance of my two supervisors, Ása L. Aradóttir and Lars Hallgren. No part of this work has previously been submitted in pursuit of a higher degree.

Brita Berglund

The contribution of the authors to the two papers included in this thesis was as follows:

Brita Berglund developed the project idea and the specific focus of both papers with feedback from Ása L. Aradóttir and Lars Hallgren. Data collection was planned and carried out by Brita Berglund and she transcribed all interviews. She also developed the theoretical framework and planned and carried out the data analysis and interpretation with support from Lars Hallgren. Brita Berglund wrote the first drafts and Lars Hallgren, and especially Ása L. Aradóttir, took an active part in focusing and refining the content and the texts. Brita Berglund corresponded with the journal for Paper I.

Abstract

Stakeholder participation in environmental management is increasing. Environmental agency personnel, however, often lack training in communication and conduct of participatory processes. How they interpret participation affects how it is practiced, which in turn affects the outcomes of participatory projects. This study explored how participation was interpreted within the Soil Conservation Service of Iceland (SCSI) and how this interpretation affected implementation in two land restoration projects: Farmers Heal the Land (FHL) and Hekluslógar. How the SCSI district officers experienced and dealt with stakeholder interaction was also explored. The main methods were semi-structured interviews with SCSI staff, FHL farmers and members of the Hekluslógar collaboration committee, and participant observations during district officers' visits to FHL farmers. The study builds on the theoretical perspective of symbolic interactionism.

The findings revealed that the SCSI interviewees focused primarily on the outputs, or products, of the participatory processes. The outputs fulfilled their expectations and many of the other interviewees' expectations as well. Other consequences of the "product focus" were, however, less attention to factors related to the participatory processes themselves, e.g., ensuring ongoing interaction, stakeholder influence and joint gains, and attending to other stakeholders' process-related expectations. This caused dissatisfaction among some of the other stakeholders. It also seemed that limited efforts had been made to adapt the agency itself to participatory approaches. The district officers handled interaction with farmers in a way that promoted collaboration and had improved relations between farmers and the SCSI. This contact helped the SCSI to support and influence farmers' land restoration activities, and thus to achieve the agency's main goals. Insufficient resources for stakeholder interaction and a legal duty to assess vegetation condition on farmland complicated the district officers' work and might have undermined collaboration. The officers also experienced a limited understanding and acknowledgement of interaction tasks and participation within the SCSI. Dealing with own emotions during stakeholder interaction could also be challenging sometimes.

The conclusions are that the SCSI's "product focus" yielded positive outputs, but that it might in the end have limited the gains of the participatory processes. Participatory approaches and

collaboration could be further enhanced by balancing product and process factors in participatory projects, increasing training in communication and participation and resource allocation to interaction tasks, and by ensuring a general understanding and acknowledgement within the SCSJ and other authorities of participation and stakeholder interaction. Finally, the emotional side of participation needs attention and further research.

Ágrip

Íslenskur titill verkefnisins: Að (g)ræða saman: Þátttökuaðferðir í landgræðslu á Íslandi

Þátttökuáðferðir verða sífellt algengari í umhverfisstjórnun, en starfsmenn sem sinna þessum málefnum vantar oftast faglega þekkingu á samskiptum og þátttökuferlum. Túlkun þeirra á þátttöku hefur áhrif á hvernig þátttökuverkefni eru útfærð, sem hefur síðan áhrif á útkomuna. Í verkefninu var skoðað hvernig þátttökuhugtakið hefur verið túlkað innan Landgræðslu ríkisins og hvaða áhrif sú túlkun hefur haft á útfærslu þátttöku í tveimur landgræðsluverkefnum: Bændur græða landið (BGL) og Hekluskógum. Líka var skoðað hvernig héraðsfulltúar Landgræðslunnar upplifðu og útfærðu samskipti við aðra hagsmunaaðila. Helstu aðferðir voru hálfstýrð viðtöl við starfsmenn Landgræðslunnar, bændur í BGL og aðila í samráðsnefnd um Hekluskóga, sem og þátttökuathuganir við heimsóknir héraðsfulltrúa til BGL-bænda. Verkefnið byggir á kenningum um táknbundin samskipti.

Niðurstöðurnar leiddu í ljós að starfsmenn Landgræðslunnar lögðu megináherslu á hinn áþreifanlega árangur, eða afurðina, af þátttökuverkefninum. Árangurinn uppfyllti væntingar starfsmanna Landgræðslunnar og að mörgu leyti væntingar annara viðmælenda líka. Afleiðingar þessarar áherslu voru hins vegar líka minni áhersla á þætti sem tengdust þátttökuferlunum sjálfum, til dæmis að viðhalda samskiptum, tryggja áhrif annara hagsmunaaðila og að huga að væntingum þeirra til þessara ferla. Þetta leiddi til óánægju hjá sumum hinna aðilanna. Einnig virtist lítið hafa verið gert til að laga stofnunina sjálfa að þátttökunálgunum. Samskiptaaðferðir héraðsfulltrúana stuðluðu að samvinnu og bættum tengslum milli Landgræðslunnar og bænda. Þessi tengsl gerðu þeim kleift að styðja við landgræðslustörf bænda, sem var mikilvægur liður í að uppfylla meginmarkmið Landgræðslunnar. Tímaskortur og gróðureftirlitsskylda Landgræðslunnar gerðu störf héraðsfulltrúana hins vegar erfið og vann gegn samvinnu. Þeir fundu líka fyrir takmörkuðum skilningi og viðurkenningu innan stofnunarinnar á þátttökunálgunum og samskiptum sem mikilvægum starfsþætti. Tilfinningaleg hlið samskiptana gat líka verið erfið stundum.

Af niðurstöðunum má álykta að afurðaráherslur Landgræðslunnar hafi skilað miklum árangri, en að þær hafi hugsanlega takmarkað ávinninginn af þátttökuáðferðunum. Mögulegar leiðir til

Þess að þróa þáttökunálganir og samvinnu væri að gefa þáttökuferlunum sjálfum meiri gaum, tryggja nægilegt fjármagn til samskipta og auka þekkingu á samskiptum og þáttökuferlum. Einnig þarf að auka almenna viðurkenningu og skilning innan Landgræðslunnar og hjá yfirvöldum á þáttökunálgunum og mikilvægi mannglegra samskipta fyrir árangur í landgræðslu. Hin tilfinningalega hlið þáttökunálgana þarf líka meiri athygli.

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Papers included in the thesis

This thesis is based on the following papers, referred to by Roman numerals in the text.

- I. Berglund, B., Hallgren, L. & Aradóttir, Á.L., 2013. Cultivating communication: participatory approaches in land restoration in Iceland. *Ecology and Society*, [Online], 18(2), 35. Available at: <http://dx.doi.org/10.5751/ES-05516-180235>
- II. Berglund, B., Hallgren, L. & Aradóttir, Á.L. “We know how to talk to farmers”: dealing with stakeholder interaction in participatory land restoration in Iceland. Manuscript.

Contents

Clarification of contribution	
Abstract	
Ágrip	
Acknowledgements	
Papers included in the thesis	
1 Introduction	1
1.1 Aims and research questions	3
2 Theoretical perspective and framework	5
2.1 Theoretical perspective	5
2.2 Theoretical framework	6
2.2.1 <i>Central aspects of participation</i>	6
2.2.2 <i>Collaboration</i>	9
3 Case background	11
4 Materials and methods	14
4.1 Selection of case studies	14
4.2 Interviews	14
4.3 Participant observations	16
4.4 Data analysis	16
4.5 Ethical considerations	18
5 Summary of findings	19
5.1 Paper I: Cultivating communication: Participatory approaches in land restoration in Iceland	19
5.1.1 <i>Aims, expectations and gains</i>	19
5.1.2 <i>Influence and control</i>	20
5.1.3 <i>Interaction</i>	21
5.1.4 <i>Ability and commitment of the SCSI</i>	21
5.2 Paper II: We know how to talk to farmers: Dealing with stakeholder interaction in participatory land restoration in Iceland	22
5.2.1 <i>To establish and maintain contact</i>	22
5.2.2 <i>To accomplish SCSI's objectives</i>	23
5.2.3 <i>To represent SCSI and the government</i>	24
5.2.4 <i>To have adequate skills, knowledge and background</i>	24
5.2.5 <i>To deal with oneself</i>	25
6 Discussion	26
6.1 Aims and expectations underlying the SCSI's use of participatory approaches	26
6.2 How aims and expectations affected practice	26
6.3 How other stakeholders' experienced the way participation was practiced	29
6.4 Interpretation of participation and the consequences for practice	30
6.5 The situation of environmental professionals involved in stakeholder interaction	32
6.6 Concluding remarks	34
6.7 Future research	36
References	37

1 Introduction

Stakeholder involvement in dealing with complex environmental and natural resource issues has increased steadily since the 1960s (Buchy & Hoverman 2000; Reed 2008). One of the main drivers has been a growing realization that these issues cannot be adequately handled by authorities and experts alone (Pretty 1995; Warburton 1997; Buchy & Hoverman 2000; Beierle 2002; Ison et al. 2007; Reed 2008). Their traditional “top-down” and single-discipline approaches are considered suitable for simple problems but not for more complicated ones characterized by uncertainty and complex interactions between biophysical, social, economic and political factors. It is argued that in such cases, different kinds of knowledge—scientific and other forms—as well as values, ideas and interests of different stakeholders have to be taken into account in order to develop more sustainable solutions. In addition, people increasingly demand to be involved and have more influence in matters that affect them (Buchy & Hoverman 2000; Senecah 2004; Eksvärd et al. 2006; Reed 2008). Many of them see stakeholder participation as a democratic right, but the demand for involvement might in part also be a reaction to the ways environmental matters have been handled in the past.

Stakeholder participation in environmental and natural resource management is now a legal requirement in many countries, and in the European Union (cf. Warburton 1997; Buchy & Hoverman 2000; Moore et al. 2001; Depoe & Delicath 2004; Senecah 2004; Aasetre 2006; Stenseke 2009; Hage et al. 2010; Westberg et al. 2010). Many international conventions also state that environmental matters should be handled participatory, for example the Convention on Biological Diversity (UNEP 1992), the United Nations Convention to Combat Desertification (UNCCD 1994), and the so-called Aarhus Convention—the UNECE Convention on Access to Information, Public Participation in Decision-making and Access to Justice in Environmental Matters (UNECE 1998). Iceland has ratified all three conventions (Umhverfis- og auðlindaráðuneytið 2013; UNTC 2013). Farmers, local communities or other groups of people have also taken initiatives to handle environmental challenges in a participatory way, sometimes supported financially or in other ways by authorities (see e.g., Campbell 1995; Catacutan et al. 2009).

The implication of the mainstreaming of participation is that an increasing number of environmental agencies are either required to involve other stakeholders in their operations, or decide by their own accord to try this alternative way. Implementing participation is not always an easy task, however. Despite a growing body of literature on participation, many scholars have pointed out that it is still an unclear concept (e.g., Rowe & Frewer 2005; Stringer et al. 2007; Bergeå 2007; Stenseke 2009; Westberg et al. 2010), which complicates its interpretation and implementation. Furthermore, the regulations and policies dictating that participatory approaches should be used seldom include definitions of the concept or guidelines for how participation should be practiced (Webler et al. 2001; Bergeå 2007; Stringer et al. 2007; Stenseke 2009). It has also been shown that participation practitioners might have to handle other stakeholders' distrust, anger and frustration resulting from previous unpopular governmental interventions (Luz 2000; Bergeå 2007; Durán 2009; Stenseke 2009).

Several scholars have mentioned that the leaders and employees of environmental agencies seldom have formal training for their new roles as communicators and facilitators of stakeholder processes (cf. Campbell 1994; Eksvärd et al. 2006; Stenseke 2009; Westberg et al. 2010). They are usually trained to deal with bio-physical and technological matters and are more familiar with the traditional "top-down" approaches (Campbell 1994; Stenseke 2009; Westberg et al. 2010). Communication skills might not even be acknowledged as a competence in its own right within these organizations (cf. Stenseke 2009). Participatory projects, however, seem to stand and fall with the skills and performances of the individuals conducting them (cf. Warburton 1997; Stenseke 2009), and the initiating organizations' commitment and ability to engage meaningfully in participatory processes (Senecah 2004; Reed 2008).

The apparent discrepancy between the increased requirements for participation, the challenges connected to operationalization of the concept, and intended implementors' lack of adequate background for these tasks, seems to pose a considerable dilemma. It is therefore interesting to know how environmental agency personnel handle this situation; how they interpret and operationalize participation, and how they experience stakeholder interaction in participatory processes. This was explored in this study through interviews with staff members of the Soil Conservation Service of Iceland (SCSI, *Landgræðsla ríkisins*) and stakeholders participating in two land restoration projects.

The SCSI is one of many environmental agencies that have adopted participatory approaches (cf. Arnalds 2005; SCSI 2013). It is a governmental agency that was established in 1907 to handle Iceland's serious soil erosion and land degradation problems (Arnalds 2005; Crofts 2011). During the first 75 years of the agency's existence, staff members carried out most of the soil conservation work themselves (Arnalds 2005). Farmers and other land users were very little involved, even though unsustainable land use, especially grazing, has been a prominent contributor to land degradation (Barkarson & Jóhannsson 2009). This lack of involvement, and little attention to preventive measures, led to the general perception that soil conservation was the responsibility of the Icelandic government (Arnalds 2005). The current law on land restoration also states governmental control of soil conservation matters and the SCSI is required to obtain full custody over land where the agency performs soil conservation work, either through agreement with landowners or through expropriation. (Lög um landgræðslu no. 17/1965). These "top-down approaches" (Arnalds 2005, p.115), and continuous disputes over the role of grazing in land degradation (Crofts 2011), contributed to a certain hostility between many farmers and the SCSI. The agency was often "perceived as an 'enemy' rather than a partner in rangeland management" (Barkarson & Jóhannsson 2009, p.59). In the end the SCSI's old methods proved inadequate for achieving the agency's official tasks. In the 1990s, they therefore started to involve farmers and other stakeholders in their operations (Arnalds 2005; Barkarson & Jóhannsson 2009).

1.1 Aims and research questions

This study had two main aims:

- 1) To explore how the concept "participation" was interpreted within the Soil Conservation Service of Iceland and how this interpretation affected the way participation was practiced. This is of interest because interpretations and operationalization, of participation affect the outcomes of participatory projects.
- 2) To explore how environmental professionals involved in participatory projects—in this case SCSI district officers—handle and experience stakeholder interaction. This is valuable to know because environmental professionals often seem to lack education or training in dealing with people but the outcomes of participatory projects depend to a large extent on how they handle stakeholder interaction.

The overall objective was to increase the understanding of these subjects in order to enhance participatory approaches in land restoration and other forms of environmental and natural resource management.

The specific questions addressed in the study were as follows:

- a) What were the aims and expectations underlying the SCSI's use of participatory approaches? (Mainly Paper I, but also in Paper II)
- b) How did these aims and expectations affect how participation was practiced in two land restoration projects; Farmers Heal the Land (FHL) and Hekluskógar? (Paper I). How did the SCSI district officers handle stakeholder interaction? (Paper II)
- c) How did other stakeholders involved in FHL and Hekluskógar experience the way participation was practiced in these projects? How did they experience interaction with SCSI staff? (Paper I)
- d) How did the SCSI district officers experience stakeholder interaction, primarily in the FHL project? How were they prepared for their interaction tasks? (Mainly Paper II, but also in Paper I)

A couple of studies have looked at farmers' experience of the FHL project (Schmidt 2000, Petursdottir et al. 2013) but no previous study has addressed how SCSI personnel experience and deal with participatory approaches and stakeholder interaction. The participatory part of the Hekluskógar project has not been studied before. In general there seems to be a lack of literature looking at participation from the practitioners' point of view—a lack also observed by Cooper and Smith (2012).

2 Theoretical perspective and framework

2.1 Theoretical perspective

Theoretical perspectives are the assumptions about reality with which researchers approach their studies (Crotty 1998). They guide the research focus and formulation of research questions, inform the choice of methodologies and methods, and offer guidelines for interpretation of the results. The theoretical perspective of my study was symbolic interactionism.

Symbolic interactionism is based on three core premises, or assumptions, about human reality (Blumer 1969, p.2):

The first premise is that human beings act toward things on the basis of the meanings that the things have for them. Such things include everything that the human being may note in his world...physical objects, ... other human beings, ... institutions, ... guiding ideals, and activities of others ... The second premise is that the meaning of such things is derived from, or arises out of, the social interaction that one has with one's fellows. The third premise is that these meanings are handled in, and modified through, an interpretive process used by the person in dealing with the things he encounters.

The meanings people ascribe to "things" are thus seen as a key factor in human affairs. From the symbolic interactionist perspective, things as such are real (Blumer 1969), but their meanings are constructed through the defining processes described in the citation above. Meanings are therefore context-dependent and the same "thing" can have different meanings for different individuals, which in turn might lead to different actions. The implications for research are that in order to get an understanding of peoples' actions and interactions in a certain context one has to focus on the preceding interpretations or meaning-making processes. The interpretations should be mirrored in the actions themselves, and therefore possible to detect in peoples actions and in the way they talk about them. These assumptions guided the study approach and formulation of the first aim of this study; to explore how the concept "participation" was interpreted within the SCSI and how this interpretation affected how participation was practiced (Paper I).

2.2 Theoretical framework

In this section, the theoretical framework that guided data presentation, analysis and interpretation in this study is presented.

2.2.1 Central aspects of participation

Campbell (1995, p.28), defines participatory approaches as “involving people directly in tackling issues that concern them by mobilizing resources and knowledge in a cooperative way”, and there are also numerous other definitions, or interpretations, of participation. Because one of the objectives of this study was to identify the SCSI’s own interpretation, however, pre-existing definitions or interpretations of the concept could not be used for data analysis and data interpretation. Instead, I used four central aspects of participation that I compiled from literature (Paper I). The assumption was that expressions of these aspects in the interview data would reveal how participation was interpreted within the SCSI and give a comprehensive enough understanding of the agency’s participatory approaches to answer the research questions.

The compilation process started with a general literature review, but because the literature on participation is very extensive, I decided to select about 20 papers for a more thorough review. The selected papers were mainly of the research and “insight” types, but some were literature reviews. I chose these papers because I found them relevant to my study and because they were the ones that had given me the most insights or understanding of the phenomenon participation during the first review. The participation described in them is of different kinds and from different contexts, but my pre-assumption was that there are some central aspects that apply to all participatory approaches independent of kind and context. The sequences in the papers describing aspects of participation were coded and the resulting codes were then refined and sorted into categories. The final categories thus derived were the four aspects of participation used in Paper I. They were: (1) aims and expectations with participation, and the actual gains; (2) control and stakeholder influence, (3) interaction, and (4) ability and commitment of those organizing and conducting participatory processes. They are further described below, together with the indicators I used to identify them in the empirical material.

1) Aims, expectations and gains. Participatory processes are initiated for a reason, and stakeholders also have their reasons for participating in them. Aims, expectations and

claimed benefits with participation can be roughly divided into two broad categories: pragmatic and normative (cf. Reed 2008). From the pragmatic, or instrumental, point of view, participation is seen as a method to achieve specific goals, and the focus is mainly on the outcome of the participatory process; the product (Beierle 2002; Buchy & Hoverman 2000; Reed 2008). Normative aims and expectations, on the other hand, are more related to how participatory processes are conducted and how the participants experience them (Moore 1996; Michener 1998; Buchy & Hoverman 2000). It can be argued that all participatory projects involve both pragmatic and normative considerations—or, in other words, “product” and “process” factors—but the emphasis varies because each participatory undertaking is unique.

Examples of pragmatic aims are increased cost efficiency (Pretty 1995; Warburton 1997; Beierle 2002), effectiveness in reaching project targets (Buchy & Hoverman 2000; Rowe & Frewer 2005; Senecah 2004), higher quality outputs (Senecah 2004; Beierle 2002) and stakeholder “ownership” of the participatory processes and their outcomes (Pretty 1995; Moore et al. 2001; Reed 2008). The reasoning behind the latter is the belief that ownership will lead to higher quality and durability of project outcomes. Some examples of normative aims are wishes for a fair process (Moore et al. 2001; Beierle 2002; Rowe & Frewer 2005), empowerment (Arnstein 1969; Pretty 1995), increased trust and improved relationships between the involved parties (Pretty 1995; Warburton 1997; Senecah 2004), and democracy (Arnstein 1969; Pretty 1995; Buchy & Hoverman 2000; Rowe & Frewer 2005; Hickey & Mohan 2004).

The actual gains for those involved in participatory processes also seems an important factor to consider. Beierle (2002) found that participants had to perceive that all involved parties gained something in order to be satisfied with the outcomes of participatory projects, and Pretty (1995) emphasizes that participatory projects should result in lasting positive effects on participants’ life. Moreover, Warburton (1997, p.37) argues that “[p]eople will not participate if they are not going to get anything out of it”.

2) *Control and stakeholder influence.* Many scholars claim that stakeholder influence and shared control over the participatory processes and their outcomes are the cornerstones of participation and should be present to a certain degree for a process to be “participatory” (e.g., Arnstein 1969; Pretty 1995; Beierle 2002; Senecah 2004). One of the main claims

behind participation is that stakeholder influence will improve decisions and solutions (see e.g., Pretty 1995; Warburton 1997; Beierle 2002; Senecah 2004), so limited stakeholder influence might therefore limit the gains of the participatory processes. Furthermore, participants usually expect to have some influence and might get frustrated if they are not allowed to have real impact (cf. Arnstein 1969; Buchy & Hoverman 2000). To let others have a say often means a radical change for authorities, however, and they might be reluctant to release their customary control (Arnstein 1969; Pretty 1995; Buchy & Hoverman 2000). According to Pretty (1995, p.1252), authorities “both need and fear people’s participation. They need people’s agreements and support, but they fear that this wider involvement is less controllable”.

3) Interaction. Some authors argue that interaction, especially face-to-face, is the most important aspect of an effective participatory process (e.g., Warburton 1997; Bentrup 2001; Depoe & Delicath 2004; Rowe & Frewer 2005), and that it should preferably be characterized by two-way communication (Senecah 2004, Rowe & Frewer 2005).

Intensive stakeholder interaction in participatory projects creates opportunities for more stakeholder input, deliberation, and creation of win-win solutions which in turn results in better project outcomes than if interaction is less frequent (Beierle 2002; Evely et al. 2011). The more interactive and intensive forms of participation are also said to offer opportunities for mutual learning, joint production of knowledge, and integration of different kinds of knowledge (Pretty 1995; Buchy & Hoverman 2000; Webler et al. 2001; Rowe & Frewer 2005; Stringer et al. 2006; Blackmore 2007; Stenseke 2009). These learning processes are considered the prerequisite for other, intended and unintended, outcomes of participatory projects.

4) Ability and commitment of organizers of participatory processes. Organizers lack of commitment and ability to engage meaningfully in participatory processes is a main contributor to failure of participatory projects according to some scholars (e.g., Warburton 1997; Senecah 2004; Reed 2008), as is their general reluctance to change (Warburton 1997). It is meaningless to involve other stakeholders if the outcomes are pre-determined by the initiators, so they have to be able and willing to handle the uncertainty and shared influence embedded in these processes (Campbell 1994; Buchy & Hoverman 2000; Reed 2008). This often contradicts organizational cultures, and might even be perceived as a threat. Buchy and Hoverman (2000) point out that ongoing stakeholder interaction requires

time and other resources, so adequate resource allocation is a sign of commitment. When it comes to ability, a potential problem seems to be that agency personnel often lack training in communication and conduction of participatory processes (cf. Campbell 1994; Eksvård et al. 2006; Stenseke 2009; Westberg et al. 2010).

2.2.2 Collaboration

Participation implies some degree of collaboration between the involved parties, and the interpretation of findings in Paper II therefore explored the potential of the SCSI district officers' interaction strategies to promote collaboration. Many scholars have dealt with collaboration, but I used a symbolic interactionist interpretation of the concept (cf. Charon 2010) because it combines five aspects that are only covered separately by other authors. I found it a more comprehensive representation of collaboration than the other, single aspect descriptions. It was also relevant because symbolic interactionism is the theoretical perspective of this study. Charon (2010) describes collaboration, or cooperation, as a certain kind of human interaction focused on problem solving and attaining common or compatible goals. According to him, human society is characterized by cooperation at all levels of interaction, from informal day-to-day communication to structured cooperation around certain issues. This study focuses on the more structured kind of collaboration.

According to Charon (2010, p.155–157) there are five interactive processes that should all be present for any form of interaction to be collaborative: (1) the parties develop similar or complementary goals in the situation, (2) the parties develop a shared focus for action by defining objects important to the situation in a similar way, (3) ongoing communication, (4) mutual role-taking, and (5) the parties acknowledge each others' identities as useful in the situation. Role-taking and identity are central concepts in symbolic interactionism and will be briefly described below.

To interact effectively with others, we need to understand the situation from their point of view, and to anticipate their actions (Blumer 1969; Charon 2010). In other words, try to put ourselves in their shoes. This is an important part of the definition process foregoing our actions and humans do it continuously. Still, some people are more skillful role-takers than others according to Charon (2010). He claims that effective and constructive communication requires skillful role-taking, while inaccurate role-taking can cause misunderstandings and conflicts. Effective role-taking is therefore essential for

collaboration as well as for teaching, learning, and relationships. In interview data, indicators of someone taking the role of another person can be when they describe e.g., themselves, their roles and their actions, as well as other individuals and organizations as if they were seen from that person's perspective. Other indicators can be when peoples' descriptions of their considerations in relation to interaction situations reveal signs of role-taking.

Our identity is how we see ourselves and the way we want to be seen by others (Charon 2010). We also want to be treated in accordance with this image so we try to affect others' actions by controlling our own behavior. Each person has many identities, but they differ in importance to us, and are often situation-dependent. Our actions also communicate to other people how we see them. Charon (2010) maintains that in order to collaborate, people have to acknowledge each others' identities and the identities' mutual importance for dealing with the situation, while ignored or rejected identities can cause anger and conflicts.

3 Case background

Soil erosion and land degradation are serious problems in Iceland, with about 40 per cent of the country's area affected by considerable to extremely severe erosion (Arnalds et al. 2001). The main causes are climate conditions, volcanic ash fall, wind- and waterborne glacial sediments, and unsustainable land use (Arnalds & Barkarson 2003). From its establishment in 1907 and up until the 1950s, the SCSI concentrated mainly on stopping acute cases of erosion, but since then there has been a growing emphasis on revegetation of eroded areas (Arnalds 2005). In the last decades, the agency has also promoted sustainable land use by addressing overgrazing and other causes of land degradation, and has increased research and consultation activities (Crofts 2011). Parallel with the introduction of participatory approaches in the 1990s, the SCSI also started to establish district offices (Figure 1 in Paper I) in different parts of the country. Until then the agency only had the headquarters in the south of Iceland, and a small office in Reykjavik. Currently, the SCSI's official tasks are to prevent and stop soil erosion, and to protect and restore vegetation cover, including assessment of vegetation cover condition (Lög um landgræðslu no. 17/1965).

The SCIS's participatory turn was inspired by the Australian Landcare movement, and the agency received some assistance from Australia when they started to develop their participatory approaches (Arnalds 2005; Barkarson & Jóhannsson 2009). The first SCSI project built on these new principles was Farmers Heal the Land (FHL, *Bændur græða landið*, Figure 1 in Paper I). The idea behind FHL was to support a growing soil conservation interest among farmers but it was simultaneously seen as “a step in reaching the long-term goal of making the land users the true custodians of the land” (Arnalds 2005, p.121). Through FHL the SCSI provides fertilizer subsidies and seed to individual farmers who want to revegetate degraded parts of their farmland. The farmers contribute part of the fertilizer costs, machinery and their own work and know-how—and often do more than the contracts require. An important component of FHL is extension services provided by SCSI district officers (*héraðsfulltrúar*) through regular visits to participating farmers. During these visits, district officers and farmers discuss land restoration matters and monitor the farmers' revegetation efforts together, but informal small-talk is also an important feature of these encounters. The officers used to visit each farmer annually, but because of budget

reductions some farmers have been visited less frequently after Iceland's economic crisis (Jónsson 2009).

Hekluskógar is another project in which the SCSI has worked with other stakeholders, i.e., local farmers and national and local organizations, both governmental and nongovernmental (Aradóttir 2007). The core idea of the project is to restore birch and willow woodlands on a large area close to Mt. Hekla in order to reduce the impact of volcanic ash and tephra. The project idea sprang from the SCSI and was further developed within the agency before inviting other stakeholders to form a collaboration committee in 2005 (see Table 2 in Paper I). The role of the committee was to plan and promote the project. In 2007, *Hekluskógar* became an independent governmental project under the formal lead of the SCSI and Iceland Forest Service, and the collaboration committee was assigned an advisory role (*Hekluskógar* 2007).

In addition to these two projects, the SCSI has worked with, and supported, other stakeholders in the project Better farms (*Betra bíú*), starting in 2002 but later terminated, and through the Land Improvement Fund (*Landbótasjóður*). They have also cooperated with numerous governmental and nongovernmental organizations, companies, schools and others, who are performing or financially supporting revegetation work all over Iceland (Arnalds 2005; Crofts 2011).

Two studies have looked at how farmers experience the FHL project, and how participating in the project has affected them. In a telephone survey in 1999, Schmidt (2000) found that 95% of the respondents were satisfied or very satisfied with the project. The farmers found the district officer visits very valuable and motivating, and claimed that this personal connection had created mutual trust and understanding between the officers and farmers. A substantial part of the respondents were interested in more frequent visits. Only 37% of them found the provided advice and education good or very good, however, and another 40% said that it was okay. About 75% gave ethical or esthetical reasons as their primary motive for restoring land. Only 10% mentioned better grazing economy, and another 7% stated economic reasons. On the question how they intended to use the revegetated land, on the other hand, the great majority intended to use it for grazing. Some 90% of the farmers had practiced revegetation before they joined FHL.

In a study by Petursdottir et al. (2013), semi-structured interviews were made with 10 participants in FHL. The study confirmed Schmidt's (2000) findings that the farmers found land restoration important and that their main reasons for practicing it were ethical and esthetical. Only a few gave economic aspects as the primary reason. The farmers reported that they had gained improved awareness of rangeland restoration and management through their contact with the SCSI. They said that participatory approaches were more effective in producing restoration outcomes than top-down approaches and wanted restoration projects to build on stakeholder collaboration, albeit supported financially by the government. The authors conclude that the FHL project had motivated farmers in their restoration work, which is in line with Schmidt's (2000) results, but that the project had not led to improved land management. On what premises the latter conclusion is drawn, however, is not clear from the results.

4 Materials and methods

I used qualitative methods in this study because they are suitable for “revealing the meanings people ascribe to particular events or activities ... [and for] understanding complicated social processes in context” (Esterberg 2002, p.2). Interviews provided the main data, while participant observations and document reviews gave background information and increased my understanding of the study topic and context. Two land restoration projects served as case studies; Farmers Heal the Land (FHL) and Hekluskógar.

4.1 Selection of case studies

The two case projects are described in Chapter 3, Paper I (FHL and Hekluskógar) and Paper II (FHL). These two projects were chosen because I wanted cases with as different approaches to participation as possible. The FHL project was selected because the SCSI claims that it is participatory (Arnalds 2005; SCSI 2013); it is the “flagship” of their participatory ventures; and it involves a large number of individuals. The interaction taking place in FHL is primarily on a one-on-one level between the individual farmers and the individual district offices. This in turn means that the district officers play a key role in the project, which was the reason why I decided to focus on their experiences in Paper II.

In the Hekluskógar case, I concentrated on the project collaboration committee, made up of SCSI representatives and other stakeholders, because this form of group interaction was a contrast to the individual interaction in FHL. In addition to the interviews, meeting minutes and other Hekluskógar documents were reviewed. Although it can be argued that Hekluskógar is not a SCSI project, I decided to treat it as such because the main project idea and the idea to make it into a multi-stakeholder project originated and was developed within the agency before other stakeholders were involved. Landowners are involved in tree planting in Hekluskógar, in an arrangement that resembles FHL. Some interviewees referred to this arrangement as participatory, but I decided not to use this component of Hekluskógar in my study just because of the similarity with FHL.

4.2 Interviews

The main data collection method was semi-structured interviews (e.g., Esterberg 2002). As the name indicates, the interviews have a certain structure in the form of basic themes to

cover, but the structure is light and flexible enough to allow the interviewer to follow up on responses and ask additional questions. In this way, each interview is shaped to a considerable extent by what emerges in the interview itself. I made 22 interviews with SCSi officials, SCSi district officers, farmers in FHL, and members of the Hekluskógar collaboration committee; in total 24 individuals. Some respondents belonged to more than one group. Further descriptions of the groups, number of interviewees per group, and main selection criteria can be found in Table 3 in Paper I. The interviews were made in the period March to September 2011, with the exception of one interview made in February 2012. Each interview lasted between 30 and 90 minutes and their average duration was one hour. I used mind maps (Buzan & Buzan 2006) with keywords as interview guides; different maps for different interviewee groups, and sometimes even for each individual. The interviews were recorded and later transcribed word-by-word by me. All interviews were used in Paper I, but only the seven district officer interviews in Paper II. The interviews were in Icelandic and I translated the quotations used in the two papers.

I contacted the interviewees either directly by telephone, or phoned them after I had sent an introductory email. In the first contact I presented myself, described my project and the reason for contacting the person, and then asked if I could interview them on a later occasion. Each interview started with some small talk and practical information. The interviewees were encouraged to ask questions and I stressed that they could always refuse to answer, or talk about certain subjects. They were informed that their names would not be revealed, only the names of the SCSi and the two projects. The ambition was to make all interviews face-to-face, but in the end four interviews had to be made by telephone because of practical reasons. To keep the data manageable, each respondent was only interviewed once.

To avoid bias, I selected the farmer interviewees myself instead of asking the district officers for suggestions. The SCSi provided the FHL participant list, after getting their lawyer's approval. I wanted the respondents to have experience of different district officers, so they had to live in different parts of Iceland. Time and travelling cost made it problematic to make interviews too far away from Reykjavik, however, so some interviews were made at a convenient driving distance, others during a vacation trip, and one by telephone. Four farms were selected by a random stratified process, while the rest were a

matter of using opportunities that presented themselves. I had met one farmer briefly before but the others were unknown to me.

For the Hekluskógar case, I interviewed all members of the collaboration committee listed in a report from 2005 (Hekluskógar collaboration committee 2005) except one: Ása L. Aradóttir, my supervisor. To prevent conflict of interest I did not interview her. Through the years there have been some variations in the member composition regarding organizations, individuals, and which organizations they represent, but most individuals on the list from 2005 were still members of the committee in 2011.

4.3 Participant observations

To get a better understanding of the interviewees' lifeworlds I made participant observations (e.g., Esterberg 2002) during SCSI district officers' visits to FHL farmers. I accompanied three different officers one day each and we visited in total 12 farms in different parts of Iceland. With one exception, the farmers visited were not the same as the ones interviewed. The exceptional case was pure coincidence and the interview took place before the district officer trip. The district officers introduced me and told the farmers briefly about my reason for coming along. My presence did not seem to disturb the officers and farmers, but I acknowledge that it must have had some effect on their interactions. I made notes directly after each trip. The notes were not analyzed systematically, but they provided insights and facilitated interpretation of the interview data. I could not make participant observations during Hekluskógar collaboration committee meetings because no meetings were held during the data collection period.

4.4 Data analysis

I used an inductive analysis approach, because its starting point in the empirical social world (cf. Esterberg 2002) was the most appropriate for this explorative study. This approach is also emphasized in symbolic interactionism (cf. Blumer 1969). The analyzed data, however, was the respondents' descriptions of situations, experiences and ideas, not the "real" social world. In symbolic interactionism it is proclaimed that people act on the basis of the meaning they ascribe to things or situations (Blumer 1969), so such subjective accounts of reality were appropriate for this study, regardless of how well they corresponded to any objective "reality". Separate data analyses were made for each of the two papers.

For Paper I, I used two analysis approaches described by Kvale (1969); meaning categorization and meaning condensation. In the meaning categorization step, the interview transcripts were coded into predefined categories built on the four central aspects of participation described in section 2.2.1; (1) aims, expectations and gains, (2) influence and control, (3) interaction, and (4) ability and commitment of project organizers. A second data segmenting process then gave the sub-categories. The meaning condensation step involved that the central meaning of the text in all categories was rephrased into shorter, descriptive sentences or words.

To identify aims, expectation and gains in the interview material, I looked at the interviewees' direct descriptions of their aims and intentions with participation and if these aims had been fulfilled or not. Expressions of satisfaction and dissatisfaction were also used as indicators for met and unmet expectations. In addition, accounts of unexpected outcomes that the interviewees described as positive were used as indicators for gains. Some indicators for influence and control were the interviewees' descriptions of situations where they or other stakeholders could or could not influence certain matters, and also their expressed satisfaction or dissatisfaction over decisions that were made in connection with the two projects. To explore the interaction aspect, I used the interviewees' descriptions of the frequency and character of stakeholder interaction in both projects, and also their expressions of satisfaction and dissatisfaction with interaction related matters. To identify the degree of commitment I used, for example, the SCSI interviewees' descriptions of how they experienced other stakeholders' attempts to influence project matters, and their accounts of resource allocations, especially for stakeholder interaction. I also looked at general descriptions of their own and other staff members attitudes towards participatory approaches. Descriptions of the interviewees' previous education and background, their in-job training and talk about challenges in relation to stakeholder interaction provided information about their ability to handle participatory processes.

In Paper II, I followed the recommendations of Blumer (1969, p.56), who claimed that the best way to analyze social action is "to see the acting unit as confronted with an operating situation that [he] has to handle and vis-à-vis which [he] has to work out a line of action." The data analysis therefore focused on the SCSI district officers' challenges and strategies when interacting with other stakeholders. The method of analysis was thematic content

analysis as described by Burnard et al. (2008). The steps are: 1) open coding, where themes and categories that “emerge from the data” (ibid p. 430) are identified, 2) reducing and refining categories by merging overlapping categories, removing duplications and grouping categories together built on “analytical and theoretical ideas developed during the research” (ibid p.431), and 3) analyze all transcripts with these final categories. In step 1), there were two pre-defined main categories, i.e., the district officers’ challenges and strategies in relation to stakeholder interaction, but the actual challenges and strategies themselves “emerged” from the empirical material.

4.5 Ethical considerations

Qualitative research involves many ethical considerations, including confidentiality and informed consent (Kvale 1969). Confidentiality implies that data should be handled in a way that protects the participants’ privacy and identity, unless they give their permission to reveal it (Kvale 1996; Boeije 2010). This creates a certain dilemma in scientific research where the general rule is that all studies should be reproducible by others (Kvale 1996) but it is nevertheless necessary. In this study, it did not make sense to hide the names of the SCSi, FHL and Hekluskógar, as the organization and the two projects are well known in Iceland. The names of the interviewees, on the other hand, were concealed and I made an effort to make the presentation of findings, and the interview quotations, as untraceable to single persons as possible. Identity protection was also the reason why the SCSi district officers and farmers are always referred to as “he” in the texts—the Icelandic words for farmer and district officer are masculine— even though some of them are female.

Prior to the interviews, the SCSi’s director gave his permission for using the SCSi as case study (Sveinn Runólfsson, email, 1 April 2011). Furthermore, I asked the interviewees’ consent after they were told about the project and that their names would not be revealed, only the names of the SCSi and the two projects. All persons I contacted agreed to take part. I also asked their consent before I started the recorder. During the participant observations I always asked the farmers and district officers for permission to take photos and to use their photos in future presentations.

5 Summary of findings

5.1 Paper I: Cultivating communication: Participatory approaches in land restoration in Iceland

Paper I covered the following research questions: a) how participation was interpreted within the SCSI and what aims and expectations were underlying the agency's use of participatory approaches, b) how this interpretation affected how participation was practiced in the FHL and Hekluskógar projects, and d) how other stakeholders involved in these two projects experienced interaction with SCSI staff and the way participation was practiced. Research question c, about the situation of the SCSI district officers, was also partly covered. Four aspects of participation served as main categories for the data analysis and presentation of findings: 1) aims, expectations and gains, 2) influence and control, 3) interaction, and 4) ability and commitment of project organizers; the SCSI. Below, the main findings from both case studies, FHL and Hekluskógar, will be presented under each category.

5.1.1 Aims, expectations and gains

The statements of some SCSI interviewees indicated that to them "participation" meant, literally, that other stakeholders participated in, e.g., revegetation activities. Both SCSI staff and interviewed farmers expressed mainly pragmatic aims and expectations regarding FHL (see Table 4 in Paper I). The most frequently mentioned aims and expectations of the SCSI staff were to increase landowners' soil conservation activities, their responsibility, and their knowledge about these issues. Cost-efficiency and improved relationship between the SCSI and farmers were also commonly mentioned. The FHL project had to a large extent fulfilled the expectations of both parties. They maintained that the project had improved the relationship between them, which was a prerequisite for other gains. Some farmers, however, had a good relationship with the district officers but still distrusted the SCSI. A lot of knowledge about soil conservation and revegetation was jointly created and circulated within the district officer-farmer network, but the FHL had no inbuilt system for documenting this knowledge and sharing it with others outside of the network.

The SCSI staffs' aims and expectations with inviting other stakeholders to form a collaboration committee for the Hekluskógar project were also pragmatic. The main

expectation was that the backing of a large group of stakeholders, especially with local groups (called “grass-roots” by many interviewees) among them, would convince the government to fund the project. The collaboration committee was also expected to take part in project design. The SCSI interviewees expressed general satisfaction with the project, and the fact that a considerable number of seedlings were planted yearly, despite recent budget reductions. Some of them also believed that what they called the “Hekluskógar model”—the restoration approach used in Hekluskógar—could be used in other projects. The collaboration partners were in many ways satisfied with the project, but they also expressed strong dissatisfaction over some expectations that had not been met. One of them was continued multi-stakeholder management after the project was formally established in 2007.

5.1.2 Influence and control

The SCSI staff managed the FHL project, and while farmers had the main say about FHL activities on their own land, they had little or no influence on the overall project arrangements. One of the few things the interviewed farmers complained about was this lack of influence.

The core idea of the Hekluskógar project originated within the SCSI, but during the collaboration phase (see Table 2 in Paper I) the collaboration committee made joint decisions about further project arrangements. Disagreements in the committee were usually solved through deliberation, but one interviewee maintained that the scientists carried the final responsibility. The committee proposed that the collaborative management should continue after the Hekluskógar project was officially established, but instead it was decided, at the governmental level, to put the SCSI and Iceland Forest Service in charge of the project. The collaboration committee was allocated an advisory role and meetings should be called twice a year, but in reality the meetings became increasingly sporadic (see Table 2 in Paper I). A committee member from one of the local stakeholder groups said that in this way, the project had been “stolen out of the hands of the grass-roots” and the projects’ potential for being a participation role model had been ruined. Contrary to the SCSI interviewees, this interviewee used the words “Hekluskógar model” for the collaborative aspect, and not for the restoration approach.

5.1.3 Interaction

Both projects involved interaction, especially face-to-face, and all interviewees found it mostly positive and constructive. The interaction activities were only loosely planned and built mostly on common communication skills. The SCSI's district offices, often situated in the vicinity of other organizations sought by farmers, facilitated the contact with local stakeholders.

An important part of the FHL was the district officers' annual visits to participating farmers. These visits gave opportunities for discussing soil conservation matters, mutual exchange of knowledge, and for building friendly relations, and both farmers and district officers found them very valuable. After the financial crisis, however, many farmers were only visited every other year or less in order to reduce costs. At the same time, the average quantity of subsidized fertilizer to FHL farmers had been kept intact, despite increased fertilizer prices. Interviewed farmers who did not get annual visits were dissatisfied with this lack of contact, and some also expressed dissatisfaction over frequent changes of district officers. They wanted to know who their contact person was.

The members of the Hekluskógar collaboration committee interacted frequently during the "collaboration phase". They described this interaction as generally positive, despite occasional heated discussions and incidents where local representatives felt that their ideas were not listened to. As mentioned above, the committee meetings became infrequent after the formal establishment of the project in 2007. The local stakeholders, whose only official connection with the project at the time of interviewing was through the collaboration committee, were very dissatisfied with this state of affairs. They felt left out and also saw this lack of involvement of the "grass-roots" as a potential threat to the survival of the project. One SCSI respondent expressed similar worries.

5.1.4 Ability and commitment of the SCSI

All SCSI respondents had natural science or agricultural education, but hardly any training in relation to participation and communication. They found participatory approaches interesting and valuable, but there was no formal evaluation of the participatory processes. The district officers got very little introduction and training for their interaction tasks, but the interviews with other stakeholders indicated that they were able communicators. The officers found lack of time and other resources, and a limited connection between their

division and the SCSi research division, problematic. They also revealed that they sometimes had to defend the agency's participatory approaches and resource spending on farm visits, to other staff members. The agency seemed to have allocated adequate resources to Hekluskógar during the collaboration phase. The SCSi staff members involved in Hekluskógar did not have previous training and experience of conducting participatory processes, but their collaboration partners described them as able communicators. Some interview statements indicated however that they were not entirely open to the uncertain outcomes inherent to participatory processes.

5.2 Paper II: We know how to talk to farmers: Dealing with stakeholder interaction in participatory land restoration in Iceland

Paper II primarily sought to answer research question c; about the situation of the SCSi district officers and how they experienced and dealt with stakeholder interaction. The paper also gives some insight into how participation was interpreted and practiced in the FHL project, i.e., research questions a and b. The data analysis focused on identifying challenges facing the district officers in their interaction activities and strategies for handling these challenges. Five main challenges and eight main strategies were identified. The challenges were: 1) to establish and maintain contact, 2) to accomplish the SCSi's objectives, 3) to represent the SCSi and the government, 4) to have adequate skills, knowledge and background, and 5) to deal with oneself. The main strategies were: 1) creating win-win scenarios (e.g., the FHL project), 2) direct and positive communication, 3) "going local", 4) motivation and knowledge sharing, 5) supportive district officer team, 6) own background, knowledge and skills, 7) self-reliance, and 8) self-control. Some of the strategies were used for more than one challenge. Below is a brief summary of the identified challenges accompanied with the relevant strategies.

5.2.1 To establish and maintain contact

The analysis revealed that the key challenge of the district officers was to establish and maintain contact with farmers and other land users. The officers found interaction and collaboration important and a precondition for other outcomes. Some barriers for establishing contact could be identified in the interviews: The officers maintained that many farmers' were wary of outsiders, especially authorities, specialist and people from the Reykjavik area, and the former hostility between many farmers and the SCSi as well as a general distance and lack of understanding between authorities and the public also posed

some problems. One of the strategies for overcoming these barriers was to create win-win scenarios by supporting farmers' land restoration work, e.g., through FHL. Another strategy was that the officers tried to "break the ice" when they visited a new farmer by intentionally demonstrating their agricultural background—which they all had, at least to some extent. That they lived and worked in the area also helped, they said, as did face-to-face communication.

To maintain the contact could also be a challenge. A major reason was lack of time and other resources for maintaining regular contact. Another challenge was to avoid negative interaction or disputes with farmers. A major problem, however, was that the SCSi has a legal duty to assess the vegetation condition on farmlands but no legal means to force farmers to do anything about land in bad condition. The district officers said that this was their most difficult task. It was emotionally difficult for themselves and the farmers, and they were also worried that it might destroy the positive relations between them. Their main strategies for handling these challenges were face-to-face interaction kept on positive terms and to "think in solutions" instead of arguing. FHL offered natural opportunities for regular, positive contact, but the officers also stressed the importance of using the same principles for the vegetation assessment encounters. To make up for the lack of time to some degree, the district officers helped each other with FHL visits, and the SCSi also "borrowed" staff part time from other organizations in some parts of the country.

5.2.2 To accomplish SCSi's objectives

The official task of the district officers was to achieve the SCSi's main objectives, which included both bio-physical results and behavioral change and increased awareness and knowledge among land users. Some challenges involved were to stimulate interest among the farmers who were not practicing land restoration, and to motivate those who were already engaged in restoration to continue. In order to increase farmers' knowledge, the farmers had to be willing to learn, the officers said, as they could not be forced to. Some farmers did not want advice, while others asked for it. Farmers' wariness towards outsiders, especially experts, was also an obstacle in this context. The FHL project was an important strategy for overcoming these challenges as it offered opportunities for restoring land as well as mutual transfer and creation of knowledge between farmers and district officers. The officers said that even though fertilizer grants and seeing fast results motivated the farmers, face-to-face interaction with farmers was vital for motivation. To

overcome farmer's resistance to taking advice, the officers tried to slip pieces of knowledge into the conversation rather than preaching. The officers said that the farmers experimented with many different revegetation methods, and they found farmers more open to new ideas if they told them that they came from other farmers, rather than from scientists, even though both origins applied. Farmers' experimentation created a lot of new knowledge, so the officers' role was just as much to transfer knowledge and ideas between farmers as distributing scientifically based knowledge, they said.

5.2.3 To represent SCSI and the government

The district officers lived in the districts and were therefore the outward face of the SCSI. They said that it was imperative for them to avoid behavior that could affect the agency's reputation negatively. Their major strategies in this respect were positive interaction, responsible conduct, and to avoid gossiping, quarrelling and favoring friends and relations. This required self-control and conscious separation of private life and work. The general rule was also that officers did not have professional interactions with close friends and relations.

Some officers stressed that as a governmental agency, the SCSI had to serve the whole country. They said that it was important to maintain and strengthen the SCSI's local activities, including the local offices, and the agency's collaboration with farmers because this made the SCSI visible to the people and showed that the agency was interested in the restoration work of others. The officers revealed, however, that they felt a certain lack of understanding for these concerns at the SCSI headquarters.

5.2.4 To have adequate skills, knowledge and background

The formal requirements for the district officer job were some form of natural or agricultural science education, but education or training in "dealing with people", e.g., communication or extension, was not required. The officers claimed that adequate scientific knowledge was indeed necessary in their job, but that higher education alone was not enough. An officer also needed both professional and life experience, and most of them stressed that some experience of farming and rural life was essential.

There were no communication guidelines and stakeholder communication was not formally monitored or evaluated within the SCSI. In most cases, the officers' only

preparation for their interaction tasks was a few visits to farmers with an experienced colleague. The district officer team also attended occasional short communication courses and communication issues were often discussed at district officer team meetings. In general, however, the officers said they had to rely mostly on themselves in their interaction activities. This could be both an advantage and a disadvantage. Many of them felt that they lacked adequate skills for their difficult vegetation assessment task, and some officers wanted more training in interview techniques.

5.2.5 To deal with oneself

To deal with their own emotions and opinions during interaction with other stakeholders came across as a significant challenge for the district officers. Their vegetation assessment duty was their emotionally most difficult task for many reasons. Some officers felt frustration over their own lack of skills for this duty and were anxious that the farmers' might get angry. Having to criticize FHL farmers, whom they looked upon as collaboration partners, was also hard. Really problematic situations were rare, but some officers had experienced long-time emotional problems after difficult incidents. Although generally agreeable, the FHL visits could also be emotionally trying. The officers found it exhausting to visit many farmers a day, day after day, and always have to talk about the same topics. They also felt cases where farmers tried to gossip or discuss very private matters uncomfortable. Furthermore, some farmers and their homes were lacking in hygiene, and a few farmers were seen as strange or even potentially violent. Other potential emotional triggers were discrepancies between the district officers' and farmers' opinions about soil conservation issues, or if FHL farmers were overgrazing parts of their land while the SCSI supported them to restore vegetation on other parts.

Getting help and support from their fellow district officers or their superior was an important strategy for dealing with emotions. The most important strategy, however, seemed to be self-control; to be able to control one's own emotions, temper and behavior in any situation. This was not always easy, and some officers wanted to learn more about self-control and how to handle difficult emotions.

6 Discussion

6.1 Aims and expectations underlying the SCSI's use of participatory approaches

The findings indicated that the SCSI interviewees focused primarily on the outputs, or products, of the participatory efforts (Paper I). This was evident in the mainly pragmatic aims and expectations (cf. Beierle 2002; Buchy & Hoverman 2000; Reed 2008) with involving other stakeholders that they expressed (Table 4 in Paper I). It also showed in the main purposes with FHL and Hekluskógar, i.e., the projects were intended to produce certain bio-physical outputs. Some respondents' literal interpretation of participation, i.e., that it meant that other stakeholders participated in land restoration activities, also revealed a product focus. It is interesting to note that only one normative aim (cf. Hickey & Mohan 2004; Reed 2008) was mentioned; to improve the relationship between the SCSI and farmers. Reed (2008) argues, however, that this is a pragmatic aim because improved relationships might increase other stakeholders' "ownership" of the outputs of participatory projects, which makes them more sustainable. This could apply in the SCSI's case because contact and good relations with farmers was seen as a key to achieving the desired outputs of FHL, i.e., mainly revegetated farmland and increased knowledge and responsibility among farmers (Paper I and II). The SCSI interviewees expressed general satisfaction with the outputs of the FHL and Hekluskógar projects, which indicates that they largely met their expectations.

6.2 How aims and expectations affected practice

The predominant "product focus" within the SCSI was detectable in the way participation was practiced. One sign was that process- and people-related aspects of participation, such as interaction and shared influence, seemed to get insufficient attention sometimes (Paper I). In both projects, the involved stakeholders could influence certain practical matters but the SCSI or the Icelandic government (in the Hekluskógar case) had the overall control. Other authors have described similar tendencies in environmental authorities' participatory approaches (e.g., Arnstein 1969; Campbell 1994; Pretty 1995; Warburton 1997; Buchy & Hoverman 2000). The FHL project, for example, had no inbuilt means for farmers to influence the project arrangements. In Hekluskógar, the intention with involving other stakeholders, especially locals, was to create political support and funding for the project. In other words, the understanding of "a stakeholder" seemed to be someone whom the project

had a stake in involving in addition to the more common understanding in participatory contexts, i.e., someone who had a stake in the project itself and its outcomes (cf. UNECE 1998; Collins & Ison 2006). The Hekluskógar collaboration committee was influential during the collaboration phase, but its influence decreased radically when the project was formally established in 2007. The decision to reject the committee's suggestion of continued collaborative management and instead put two governmental agencies—the SCSI and the Iceland Forest Service—in charge of the final project was made at the ministry level, however, and cannot be seen as a direct reflection of the SCSI's interpretation of participation. A similar tendency to put established agencies in charge of implementation of participatory programs, instead of ensuring continued stakeholder influence, was noticed by Arnstein (1969). In the light of some scholars' recommendations of continuous stakeholder involvement through all phases of participatory projects, from problem framing and decision-making to implementation, in order to get the best results (Senecah 2004; Reed 2008), it is possible that this decision has had some negative consequences for the project.

Face-to-face interaction was a significant aspect of both projects in this study (Paper I). The SCSI district officers visited FHL farmers regularly, and the Hekluskógar collaboration committee members interacted frequently during the collaboration phase. The accounts of the district officers (Paper II) showed that they were aware of the role of face-to-face interactions in creating positive outcomes of participatory projects (cf. Pretty 1995; Beierle 2002; Senecah 2004; Rowe & Frewer 2005; Stringer et al. 2006; Bergeå 2007; Stenseke 2009). To establish and maintain contact with other stakeholders, especially farmers, came forth as their core challenge, mainly because this contact allowed them to influence and support the others' land restoration activities. It was therefore seen as a key to accomplishing the SCSI's overall objectives—another of the district officers' challenges. In both projects, however, interaction with stakeholders was reduced, and the findings indicated that product focus was at play even here (Paper I). While the FHL visits were reduced to meet budget cuts after the economic crisis, the amount of subsidized fertilizer was kept more or less the same despite soaring fertilizer prizes, indicating a primary focus on the direct bio-physical outputs of the project. After the establishment of the Hekluskógar project in 2007, committee meetings were not held twice a year as the Hekluskógar contract stipulated (Table 2 in Paper I). It can be argued that as one of the responsible parties for the project, the SCSI could have, or even should have, requested

that committee meetings be called twice a year, but apparently they did not. This might be a result of predominant focus on the desired outputs—several SCSI interviewees pointed out that tree-planting was still going on despite budget cuts—and less awareness of the process- and people-related aspects of the project.

The strategies the district officers used in their interaction with FHL farmers seemed to have the potential to facilitate collaboration (Paper II), as together, four of the eight identified strategies encompassed the five processes characterizing collaborative interaction described by Charon (2010). These strategies were; creating win-win scenarios, e.g., through the FHL project; direct and positive communication; “going local”; and, motivation and knowledge sharing. The intended outputs of FHL served the interests of farmers and the SCSI alike (Paper I) and created a shared focus for action, and the district officers’ visits to farmers ensured ongoing communication. Built on other authors’ observations that people find it easier to take the role of familiar (Charon 2010) and non-critical individuals, and are more aware of how their own behavior affects familiar persons than unfamiliar (Cast 2004), it can be concluded that the strategies also involved many examples of district officers taking the role of the farmers, or making it easier for the farmers to take the role of the district officers. Because the officers had experience of the farmers’ lifeworld they knew how to conduct themselves during farm visits, and they also intentionally demonstrated this background to the farmers. The fact that the officers were local people themselves might also have alleviated farmers’ role-taking. The emphasis on positive communication, avoidance of criticism and the officers’ strategies for knowledge exchange and motivation were other examples. Finally, the idea behind the FHL project itself is built on an understanding of farmers’ situation (Arnalds 2005), i.e., an expression of role-taking. Other studies (Bergeå 2007; Schneider et al. 2009; Stenseke 2009) have shown that role-taking is vital for trust and relation building, so it can be assumed that it had played a significant role in creating the improved relations reported by farmers and SCSI interviewees (Paper I). Finally, by the support offered through the FHL project, the SCSI simultaneously presented an identity useful to the farmers and showed that they were also useful for the agency (cf. Charon 2010). This was a positive change from the past, when the SCSI and farmers did not see treat each other as useful partners (cf. Barkarson & Jóhannsson 2009).

Regular interaction requires time and other resources, and it seemed that the SCSI spent considerable resources on interaction activities in both projects to begin with (Paper I). Since the onset of the economic crisis in 2008, however, stakeholder interaction has been affected by budget cuts as discussed above (Paper I and II). Lack of resources for FHL visits and other local SCSI activities was a major problem for the district officers. They felt they had to defend spending resources on these activities, mainly because some fellow staff members did not recognize their importance. This could be seen as another expression of predominant product focus at the agency. Other studies have described that lack of resources for interaction tasks is a common problem, and a limiting factor for participatory projects (e.g., Lowndes et al. 2001; Senecah 2004; Eksvård et al. 2006; Durán 2009; Mahon et al. 2010). The findings also indicated that education and training in communication and participation had low priority within the SCSI, which could be another result of the dominant product focus (cf. Campbell 1994).

6.3 How other stakeholders' experienced the way participation was practiced

The FHL project met the interviewed farmers' aims with joining the project, and these aims were compatible with the aims of the SCSI staffs (Table 4 in Paper I). The farmers said they appreciated the district officers' visits and found them motivating (Paper I). They valued to have someone to discuss land restoration matters with and described how mutual exchange of knowledge took place during these encounters (cf. Beierle 2002; Evely et al 2011). Small talk also seemed important for creating rapport (cf. Bergeå 2007) and the farmers said that the regular contact with the district officers had promoted trust and positive relationships between them. These findings support the district officers' statements in this study (Paper II), and are consistent with the results of other studies (Schmidt 2000; Petursdottir et al. 2013). Senecah (2004) claims, that the extent to which participatory processes promote trust is a measure of the effectiveness of the process, mainly because trust is a prerequisite for other outcomes. It can be assumed that the same applied in this case. It was interesting, though, that some farmers reported that although they trusted the district officers, either they, or people they knew, still distrusted the SCSI.

During the collaboration phase, the members of the Hekluskógar collaboration committee became very interested in the project idea, so they were pleased that the project had been realized (Paper I). They found committee interactions during the collaboration phase

mostly enjoyable and friendly, despite some disputes and occasions where the lay people among committee members felt not listened to.

The findings suggested, however, that the interactive processes themselves had generated stakeholder expectations that were not met, mainly about influence and interaction. This agrees with Moore's (1996) findings that stakeholders have expectations not only to the outputs of participatory processes but, just as importantly, to how the processes are conducted and experienced. FHL farmers complained about the reduced district officer visits, frequent changes of district officers in some areas, and lack of influence on FHL project arrangements. Some Hekluskógar interviewees were strongly disappointed because the collaboration committee meetings were "not held anymore", as they said. They also disliked that the collaborative management of the project had discontinued and that only governmental organizations had been put in charge. The different interpretations of "the Hekluskógar model" also revealed different expectations with the project (cf. Moore 1996): One of the committee members used it in the context of the collaborative approach (i.e., process focus), while the SCSi interviewees were talking about the restoration approach used in the project (i.e., product focus).

6.4 Interpretation of participation and the consequences for practice

The findings indicate that the SCSi interviewees saw participation primarily as an effective and efficient method to achieve the agency's own goals and tasks. Their participatory approaches involved face-to-face interaction, allowed other stakeholders to influence certain practical matters, and certainly had the potential to promote collaboration when at its best. Success—or failure—of participatory projects, however, depend very much on the organizers' commitment and ability to engage meaningfully in the participatory processes (Warburton 1997; Senecah 2004; Reed 2008), and on their willingness to release control and to change (Arnstein 1969; Campbell 1994; Pretty 1995, Warburton 1997). Signs of limited commitment in the SCSi's case include insufficient attention to stakeholder interaction in the Hekluskógar project after 2007 and inadequate resource allocation to interaction with farmers in FHL (cf. Buchy & Hoverman 2000). Pre-defined goals with both projects, reluctance to release the agency's overall control, and low priority of training in communication and participation, i.e., of increasing the personnel's ability to conduct and engage in participatory processes could also be seen as potentially limiting factors. Several interviewee accounts of limited acknowledgement of participatory

approaches within the agency also suggest that little effort had been put into developing and integrating an understanding of the participatory ideas within the whole agency (cf. Arnstein 1969; Campbell 1994; Pretty 1995). In other words, the SCSI's participatory approaches seemed focused on changing the behavior of others, but less consideration had apparently been given to internal changes in order to adapt the agency itself to the participatory approaches.

By and large, the interpretation of participation mirrored in FHL and Hekluskógar corresponds to what Pretty (1995) describes as 'functional participation', where participation is seen as a method to fulfill the initiators pre-defined goals and where the authorities make all major decisions. Several scholars (e.g., Campbell 1994; Buchy & Hoverman 2000; Reed 2008) have claimed that the initiators ability and willingness to handle the uncertain outcomes and shared influence implicit in participatory projects is an important success factor. It can be argued, though, that in SCSI's case some of the pre-defined goals might not have had such a negative impact. The findings of this and other studies (Schmidt 2000; Petursdottir et al. 2013) show that the SCSI's overall goals with the FHL project were compatible with the farmers' overall goals with participating in it. This study also revealed that the Hekluskógar collaboration partners became interested in the project idea. The pre-defined overall goals with the two projects were therefore an uncontested focus for action for all involved parties (cf. Bergeå 2007; Charon 2010), and can thus be seen as positive. The findings showed, however, that the SCSI's and other participants' ideas about what the participatory processes involved, and how they should be designed and conducted did not always correlate. Participants in both projects also sometimes disagreed with the SCSI representatives about the desired end-state of the restoration efforts and what methods and materials to use. The findings therefore suggest that pre-defined goals in these areas might be the problematic ones.

The product focus had unquestionably contributed to considerable outputs, such as revegetated land, funding for the Hekluskógar project, increased knowledge and improved relations. But the findings also suggested that the SCSI's predominant focus on bio-physical outcomes meant that process and people related factors, such as joint gains, shared influence, and interaction, received less consideration. This caused discontent among some of the other stakeholders in both projects (cf. Senecah 2004). The SCSI staff did not seem much aware that the other stakeholders had aims and expectations that did not

necessarily correlate with their own, and that expectations could be process-related and generated by the participatory processes themselves. Other scholars have claimed that project organizers' predominant focus on their own intended outputs combined with insufficient attention to process factors can ultimately reduce the benefits of participatory projects (Pretty 1995; Chess & Purcell 1999; Buchy & Hoverman 2000; Moore et al. 2001; Beierle 2002; Rowe & Frewer 2005; Senecah 2004; Reed 2008). It can therefore be argued that the SCSI's product focus might in the end have limited the gains of the agency's participatory approaches.

6.5 The situation of environmental professionals involved in stakeholder interaction

This study revealed both similarities and dissimilarities between the situation of the SCSI district officers and that of practitioners' involved in stakeholder interaction elsewhere (Paper II). Several authors describe it as a dilemma that environmental agency personnel are required to handle environmental issues in a participatory way but the goals are often set at a national or international level (Stringer et al. 2007; Bergeå 2007; Stenseke 2009; Mahon et al. 2010; Westberg et al. 2010). This partly applied to the district officers' situation as well; the FHL project was presented outwardly as a participatory project, but the project's main purpose was to help fulfill the SCSI's goals, set by the Icelandic government. It did not seem much of a dilemma, however, as discussed above in relation to pre-defined goals. What seemed to be more of a dilemma was the contradiction between handling FHL interactions in a participatory way and at the same time having to perform the more authoritative vegetation assessment duty.

The officers had natural or agricultural science education but little or no formal training in communication or participation. This is in agreement with the notions of Campbell (1994), Eksvärd et al. (2006), Stenseke (2009) and Westberg et al. (2010) about the background of environmental practitioners involved in participatory undertakings. Furthermore, the officers' in-job training was rudimentary, and there were no communication guidelines. They even got very little preparation for the more complicated vegetation assessment task, and for dealing with the legacy of hostility and suspicion between SCSI and farmers in some areas (cf. Senecah 2004; Bergeå 2007; Durán 2009; Stenseke 2009). Still, the district officers' descriptions of how they handled stakeholder interaction showed signs of a deeper understanding of communication matters, as revealed by comparing their strategies with the five processes characterizing collaboration according to Charon (2010). The statements

of interviewed farmers confirm that the officers were able communicators and that the way they handled stakeholder interaction seemed indeed to have promoted collaboration (Paper I). This differs to some degree from other scholars' claims, that lack of training in communication makes stakeholder interaction problematic (cf. Campbell 1994; Bergeå 2007; Westberg et al. 2010). But the findings also revealed that the district officers found stakeholder interaction difficult in some situations, both to perform and emotionally.

Many environmental practitioners elsewhere apparently feel insecure and distrust their own ability to lead participatory processes because they perceive that they lack the necessary knowledge, competence, and experience (cf. Campbell 1994; Senecah 2004; Eksvärd et al. 2006; Durán 2009; Mahon et al. 2010; Westberg et al. 2010). The same applied to the district officers' more complicated interaction tasks, such as the vegetation assessment, but difficult emotions also had many other causes. Normal, friendly, FHL visits could be emotionally difficult because they were so repetitive, and at the same time required the officers to continuously adapt to different people and circumstances. The balancing act between, on the one hand, fulfilling the SCSi's tasks and ensuring that revegetation was carried out "properly", and on the other hand avoiding negative reactions from farmers' that could endanger friendly relations and collaboration, could also be trying. The officers' situation within the SCSi could apparently also be emotionally difficult at times, as shown by their accounts of having to defend resource spending on stakeholder interaction and of a lack of general recognition and understanding of participatory approaches and interaction tasks within the agency. They also described the seemingly limited collaboration with the research division as problematic (Paper I and II). This evidently created some problems for the officers and might have negatively impacted the SCSi's participatory activities.

The study also revealed some supportive factors (Paper II). The district officers' own blend of science education, farming background and life experience was helpful and the district officer team provided important support and an arena where even difficult matters could be brought up. The officers discussed communication issues among themselves, individually or at team meetings, and the interviews also showed that they reflected a lot over communication matters. These findings contradict the statements of Westberg et al. (2010) that participation practitioners do not discuss or reflect much on communication matters. It seemed, however, that their reflections and discussions were quite unstructured and not based on communication theories and concepts. The relatively unstructured nature of their

interaction tasks—the farm visits had a basic agenda but otherwise each situation was unique—and lack of communication guidelines made self-reliance a crucial strategy and ability. This freedom to act was in many ways an advantage and allowed for a necessary flexibility (cf. Bergeå 2007; Stenseke 2009; Cooper & Smith 2012) and it also helped the officers to improve their interaction skills through experimentation and reflection-in-action (cf. Schön 1991). The most common strategy to deal with difficult emotions was self-control, but it was not always easy.

6.6 Concluding remarks

The SCSI is a governmental agency with certain official tasks to fulfill (cf. Warburton 1997), so it is very relevant for its personnel to focus on concrete outputs. This study showed that their interpretation of participation had been quite successful in producing the SCSI's intended results, especially when process factors were adequately attended to. It also showed that the staff members involved in FHL had a natural ability to interact with other stakeholders in a way that promoted collaboration. But the findings also indicated that the SCSI's product focus had resulted in lower understanding and priority of process related factors, such as interaction and shared influence, and limited efforts to adapt the whole organization to the requirements of participation. This might have reduced the gains of their participatory approaches. The findings suggested that the limiting factors were not so much at an individual level but more at the organizational and governmental level (cf. Campbell 1994). Neither were they so much a consequence of limited communication skills, but rather of a limited understanding of what participation implies, especially for the project initiators and governmental authorities themselves. These conclusions agree with other scholars' observations that persistent organizational cultures can be major constraints to participatory approaches (Arnstein 1969; Campbell 1994; Pretty 1995; Warburton 1997; Cooper & Smith 2012). As Warburton (1997, p.23) argues: “[i]nstitutions have to recognize that a participatory approach is not just another initiative, but a fundamental change in philosophy”.

Collaborative interaction with other stakeholders came forth as a key factor for achieving the restoration outcomes of both the FHL and Hekluskógar projects and consequently for achieving the SCSI's goals. Stakeholder interaction also generated other outcomes, such as increased knowledge and improved relationship between the SCSI and farmers, which in turn contributed to the more tangible outcomes. Further development and encouragement

of stakeholder interaction and collaboration is therefore recommended. Interviewed FHL farmers in a study made by Petursdottir et al. (2013) also wanted land restoration projects to be collaborative. It is important in this respect to enhance supportive factors and reduce, or counteract, undermining factors, and to make sure that all five processes characterizing collaborative interaction (Charon 2010) are maintained.

Some supportive factors are already in place, e.g., the FHL project, the SCSI's local offices, a well-functioning district officer team, and district officers who are natural communicators with a blend of scientific and agricultural background. Some measures to reduce undermining factors would be to balance product and process factors of participatory projects and to give higher priority to interaction tasks, e.g., through increased training and education in communication and participation, increased resource allocation, and promotion of a general recognition of these activities' role in producing land restoration results and of communication as a valid task in its own right (cf. Stenseke 2009). These measures would in all likelihood also enhance the situation of the district officers and other staff members engaged in stakeholder interaction, and facilitate their work. To have different individuals, or even organizations, perform collaborative undertakings and assessment duties as has been done elsewhere (cf. Bergeå 2007), would also be beneficial. Or, at least to make sure that the personnel performing the assessments get appropriate training for the relatively complicated interaction involved in these tasks. The findings showed the significance of the emotional side of stakeholder interaction, something that has not been covered thoroughly in literature. This emotional part also needs recognition and further development of support mechanisms and strategies to deal with it. But first and foremost, the findings highlighted the importance of developing a participatory mindset within environmental agencies and governmental authorities for optimizing the use and outcomes of participatory approaches. This is not the least important in light of the growing emphasis on participatory environmental and natural resource management (cf. Warburton 1997; Buchy & Hoverman 2000; Moore et al. 2001; Depoe & Delicath 2004; Senecah 2004; Aasetre 2006; Stenseke 2009; Hage et al. 2010; Westberg et al. 2010).

This study only explored participation in the SCSI context, but I believe that the findings contribute to the general understanding of these subjects, especially of the situation of environmental professionals involved in participatory projects and the emotional side of

stakeholder interaction. Looking at the theoretical side of the study, the four aspects of participation and the five interactive processes characterizing collaboration (cf. Charon 2010) proved useful “tools” for exploring participatory approaches and stakeholder interaction. They could also be used by participation practitioners as aids and checklists and as focus for reflection. In general, I assume that many of the insights and recommendations of this study could be applied to other contexts in order to enhance participatory approaches in land restoration and other forms of environmental and natural resource management.

6.7 Future research

The findings revealed some concerns about a limited acknowledgement of participatory approaches within the SCSi and limited collaboration between agency divisions. In this study, I only interviewed the SCSi personnel involved in participatory approaches and some officials. It would therefore be interesting to explore the viewpoint of other staff members and to look at how the whole organization—and even other organizations undergoing similar transitions—deals with the participatory approaches and the inevitable changes they involve. It could also be beneficial to explore how other authorities and politicians handle the same issues. Knowledge and learning are some key aspects of participation that were only loosely touched upon in this study, mainly because the size of the study did not allow further considerations of this subject. The findings, however, show that it would be worth looking into knowledge and learning issues of especially FHL, but also Hekluslógar, and the SCSi in general. Finally, the emotional side of stakeholder interaction and how to deal with it is a subject that needs further investigation and attention.

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Cultivating Communication: Participatory Approaches in Land Restoration in Iceland

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ABSTRACT. Stakeholder participation in environmental management is increasing. Staff of environmental agencies, however, often lack training in communication and in conducting participatory processes. Their interpretation of “participation” is of interest because interpretation affects how participation is practiced. We explored how participation was interpreted within the Soil Conservation Service of Iceland and how the interpretation affected how participation was carried out in two land restoration projects. Our methods included semi-structured interviews with agency staff and involved stakeholders, participant observations, and document review. The findings showed that participation was seen as a method to accomplish the agency’s tasks, and the focus was primarily on the outputs, or products, of the participatory processes. This interpretation worked well and created positive outcomes as long as process factors, such as interaction with other stakeholders and shared influence, were adequately attended to and joint gains were assured, but other stakeholders expressed dissatisfaction when they were not. We conclude that, although tangible outcomes are necessary for environmental agencies, maintaining a balance between product and process focus in participatory projects is important for optimal results. To increase their ability to deal with process factors, environmental agencies, and ultimately environmental management, would benefit from enhancing their personnel’s understanding of participation, and capacity to conduct participatory processes. To facilitate participation, this understanding should also be integrated in the institutional framework the agencies work within.

Key Words: *environmental management; influence; interaction; interpretation of participation; joint gains; land restoration; participatory approaches; participatory processes*

INTRODUCTION

Stakeholder participation is now widely encouraged in environmental management (Reed 2008). One reason is an increased awareness that the “old” top-down and expert-driven approaches are inadequate for dealing with complex environmental issues (Campbell 1994, Pretty 1995, Buchy and Hoverman 2000, Beierle 2002, Reed 2008). Instead, knowledge, ideas, interests, and values of a wide range of stakeholders are needed to ensure the contemporary ideal of sustainability. This is reflected in several international conventions, e.g., the Convention on Biological Diversity (1991) and the Aarhus Convention (UNECE 1998), and is also evident in policies and practice (Buchy and Hoverman 2000, Moore et al. 2001, Senecah 2004, Stenseke 2009). An increasing number of environmental agencies are therefore either required to use participatory approaches or decide themselves to try this alternative way. Participation, however, is an ambiguous concept (Buchy and Hoverman 2000, Westberg et al. 2010), which makes it difficult to operationalize. Furthermore, the personnel of traditional top-down organizations seldom have formal training in communication (Campbell 1994, Stenseke 2009, Westberg et al. 2010), and participation is often in radical contrast to their previous knowledge and experiences. So what happens when they start involving other stakeholders?

According to Blumer (1969:2), “human beings act toward things [including guiding ideals] on the basis of the meanings that the things have for them,” and the meanings themselves are developed and modified through social interaction. Thus, agency personnel would be expected to practice “participation” on the basis of their interpretation of the concept, i.e., the meaning it has for them, and the interpretation itself would develop through participatory activities. A study of how participatory projects are carried out, and the considerations, actions, and interactions involved, should therefore provide understanding of both interpretation and its effect on how participation is practiced.

The Soil Conservation Service of Iceland (SCSI) started using what they describe as participatory approaches in land restoration on a systematic basis in 1990 (Arnalds 2005). The SCSI is a governmental agency that was established in 1907. Its main task is to halt soil erosion, restore degraded land, and promote sustainable land use. Before 1990, agency staff carried out most soil conservation activities by themselves, with little involvement of farmers and other land users. The general perception was therefore that the government carried the responsibility for soil erosion and conservation. This is also evident in the current soil conservation legislation (Lög um landgræðslu no. 17/1965), which asserts governmental control over soil conservation matters. The agency’s top-down

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Table 1. Frequently mentioned aims and benefits with participation.

Pragmatic aims and benefits	Normative aims and benefits
Cost efficiency (Pretty 1995, Beierle 2002)	Fairness, equity, joint gains (Beierle 2002, Rowe and Frewer 2005, Reed 2008)
Effectiveness in reaching specific targets (Pretty 1995, Moore et al. 2001, Rowe and Frewer 2005, Senecah 2004)	Trust (Buchy and Hoverman 2000, Senecah 2004, Reed 2008 [†])
Higher quality outputs (Senecah 2004, Reed 2008)	Improved relationships (Pretty 1995, Buchy and Hoverman 2000, Senecah 2004, Reed 2008 [†])
Stakeholder commitment; “ownership” of participatory processes and outcomes. Leads to higher quality and sustainability of outputs (Pretty 1995, Buchy and Hoverman 2000, Moore et al. 2001, Reed 2008)	Democracy, influence, shared control (Arnstein 1969, Pretty 1995, Buchy and Hoverman 2000, Rowe and Frewer 2005, Reed 2008)

[†]Reed (2008) describes trust and improved relationships as pragmatic aims and benefits, as they might lead to stakeholder “ownership” of process and outcomes.

approaches often led to tension between the SCSi and farmers (Barkarson and Johannsson 2009). Eventually this led to the realization that the agency’s old methods were inadequate for dealing with many of the underlying causes and thus for accomplishing its main tasks (Arnalds 2005). Subsequently, the SCSi started to involve other stakeholders in its activities.

We explored how participation was interpreted within the Soil Conservation Service of Iceland and how this interpretation affected how participation was practiced in two land restoration projects. We wanted to know how those involved in what they themselves defined as participation made sense of it in practice, from their internal interpretations. The objective was to learn from the SCSi’s experience, with the overall purpose of enhancing participatory processes in land restoration.

Key aspects of participation

In order to identify interpretations of participation, we first had to establish what constitutes participation. Because we wanted to know how the SCSi staff interpreted the concept, we could not use a pre-existing definition. A literature review, however, suggested some key aspects of participation that informed our analysis: aims, expectations, and gains; influence and control; interaction; and ability and commitment of organizers of participatory projects.

Aims and expectations with participatory projects can be said to reflect how people understand the role of participation. Aims, or expected benefits (Table 1), are often described as either pragmatic, where participation is perceived as a method to achieve a specific outcome, or normative, where participation is seen as an ideology and valuable in itself (Buchy and Hoverman 2000, Beierle 2002, Reed 2008). Pragmatic aims focus on the outputs, or products, of participatory processes, while normative aims are more people-centered (Michener 1998) and relate to how the

processes are conducted and experienced (Buchy and Hoverman 2000). All participatory projects involve both product and process considerations, but the emphasis varies. According to Pretty (1995), a process is participatory only if it involves joint gains and positive lasting effects for those involved. In order to be satisfied with a participatory project, stakeholders have to perceive that they gain something (Warburton 1997, Beierle 2002).

A frequently mentioned aspect of participation is influence and shared control, at least to some degree, but a common dilemma is that while most stakeholders expect to have some influence over the participatory process and its outcomes, authorities are often reluctant to release control (Arnstein 1969, Pretty 1995, Buchy and Hoverman 2000).

Interaction, especially two-way communication, is another key aspect, and the more intensive forms, such as dialogue and deliberation, provide opportunities for stakeholders to share ideas, values, and knowledge, and to have real influence (e.g., Pretty 1995, Buchy and Hoverman 2000, Beierle 2002, Senecah 2004, Rowe and Frewer 2005, Stringer et al. 2006).

Failures of participatory projects are often ascribed to initiating organizations’ lack of commitment and ability to engage meaningfully in participatory processes (Senecah 2004, Reed 2008), or to their resistance to change (Warburton 1997). Meaningful participation requires project organizers to be willing and able to share responsibility with other stakeholders, and commit themselves to the unpredictable outcomes embedded in participation (Buchy and Hoverman 2000, Reed 2008). An agency’s effort to adapt to these requirements is therefore an indicator of its commitment. Other indicators are the amount of time, staff, and other resources allocated to participatory projects (Buchy and Hoverman 2000).

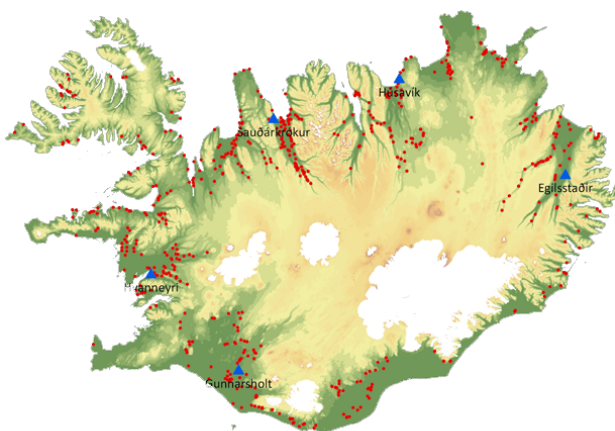
METHODS

We chose to focus on the SCSI because they explicitly state that they use participatory approaches (Arnalds 2005, SCSI 2012). We looked at how the SCSI staff made sense of participation, using two land restoration projects as case studies. Because we wanted extensive data, we deliberately selected projects with different approaches to participation. Farmers Heal the Land is an SCSI project, and the agency has been a driving force in the other project, Hekluskógar.

Case studies

Farmers Heal the Land (FHL) is a cost-share project, inspired by the Landcare movement (Arnalds 2005). Farmers participate in the project on an individual basis and carry out revegetation on their own land, while the SCSI provides extension services, seeds, and funding to cover fertilizer costs. Launched in 1990, it was the first SCSI project to systematically involve other stakeholders. Its purpose was to reach “the long-term goal of making the land users the true custodians of the land” (Arnalds 2005:121). The idea behind FHL was to support an interest in soil conservation already present among farmers. In 2011, about 20% of Icelandic farms (Farmers Association of Iceland 2010, Brynleifsdóttir 2011) participated in the project (Fig. 1). SCSI district officers, stationed in different parts of the country (Fig. 1), visit all participating farms regularly (Jónsson 2009). During visits, restoration activities are discussed and monitored, but they also provide opportunities for building relations and mutual trust (Arnalds 2005).

Fig. 1. Map of Iceland showing location of farms participating in the Farmers Heal the Land project 2011 (red dots) and district offices of the Soil Conservation Service of Iceland (blue triangles) (S. J. Brynleifsdóttir, Soil Conservation Service of Iceland 2011).



The aim of the Hekluskógar project is to restore native woodlands on about 900 km² of largely eroded land near Mt. Hekla in south Iceland through revegetation and planting of native tree and shrub species in clusters that later serve as seed sources for natural regeneration (Aradóttir 2007). The project idea was first developed within the SCSI, but in 2005, representatives of local farmers and relevant governmental and nongovernmental organizations were invited to form a collaboration committee for the project (Table 2). The committee took active part in planning and promoting the project until baseline governmental funding was secured in May 2007. Hekluskógar then became an independent governmental project (Hekluskógar 2007), and the collaboration committee’s role changed to be mainly advisory. An executive board—since 2010 made up of the directors of two governmental agencies: the SCSI and Iceland Forest Service—is now formally responsible for the project, while a project manager runs the daily activities (Table 2, Hreinn Óskarsson, *personal communication*). In this study we focused on the collaboration committee.

Data collection and analysis

The first author conducted 22 semi-structured interviews with SCSI officials and district officers, farmers participating in FHL, and members of the Hekluskógar collaboration committee (Table 3) from April 2011 to February 2012. Four of the interviews were completed by telephone and 18 face-to-face. Mind maps (Buzan and Buzan 2006) with keywords and themes served as interview guides, and the average interview duration was one hour. All interviews were recorded and transcribed word-by-word by the first author.

The first author also made participant observations (Boeije 2010) during district officers’ visits to farmers on three separate occasions, each time with a different officer in a different area. Each occasion lasted one full day, and altogether 12 farms were visited. Furthermore, reports from both projects, and contracts and meeting minutes from Hekluskógar were reviewed.

Interview transcripts were analyzed through two approaches described by Kvale (1996): meaning categorization and meaning condensation. The following aspects of participatory processes served as main categories: (1) aims, expectations, and gains, (2) influence and control, (3) interaction, and (4) ability and commitment of project organizers.

FINDINGS

The main categories are central to the analysis; therefore, relevant findings from both case studies are presented under each category.

Table 2. Hekluslógar project development and time line.

Time	Period	History	Collaboration committee: role and frequency of meetings
-2005	“Germination phase”	Project idea originates and is further developed by a working group within the Soil Conservation Service of Iceland (SCSI)	
2005-2007	“Collaboration phase”	Representatives of relevant governmental and nongovernmental organizations, and groups invited to collaborate with SCSI on the project Collaboration committee [†] established Meeting held in spring 2005, where farmers and other landowners could express ideas and concerns, and appoint their committee representative	Co-ordinate activities, preparation and planning, promotion of project in order to get funding, decisions about project design Frequent meetings, up to several times per month
2007-	“Project phase”	Committee appointed several working groups for planning and promoting the project May 2007: Contract for 10 years of funding signed between SCSI, Iceland Forest Service, and Ministries of Agriculture and Finance Hekluslógar executive board responsible for project. One representative each from SCSI, Iceland Forest Service, and the Ministry of Agriculture Project manager in charge of daily activities. Volunteers involved in tree planting (e.g., summer house owners in area, only few farmers). Tree plants for free. Farmers’ representative on collaboration committee in charge of plant distribution January 2008: Hekluslógar transferred from Ministry of Agriculture to Ministry of the Environment May 2010: Directors of SCSI and Iceland Forest Service become the only members of the executive board	New role according to contract: strategic planning, approval of yearly executive plans and financial statements At least two meetings to be held per year according to contract. Annual general meeting no later than 31 January Meetings held in reality: [‡] 5 June 2008 10 November 2008 8 January 2009 10 May 2010

[†]The committee members were representatives of the following organizations or groups: SCSI; Iceland Forest Service; Soil Conservation Fund; South Forests Farmer Project; The Forest Associations of Rangárvallasýsla and Árnessýsla; local farmers of the Hekluslógar area. (Source: Hekluslógar collaboration committee 2005, Hreinn Óskarsson, personal communication, meeting minutes and other documents from Hekluslógar.)

[‡]The meetings listed are the collaboration committee meetings held after Hekluslógar became an independent project and before interviews were conducted with committee members in April–June 2011. Additional meetings might have taken place after that.

Aims, expectations, and gains

The SCSI staff expressed mainly pragmatic aims and expectations with FHL (Table 4). Project outcomes matched the expectations of the SCSI staff and participating farmers (Table 4), and both parties were generally satisfied. Many of them pointed out that improved relationships between the SCSI and farmers was a prerequisite for other gains. The following statement by one farmer reflected this view:

“And it is no longer ‘us’ and ‘them,’ now ... we talk about ‘us’. We are on the same team and working together on tasks, and there is mutual understanding...”

Nevertheless, several interviewees also mentioned examples where farmers had positive relationships with SCSI district officers but still distrusted the agency itself. Another outcome, mentioned by district officers and farmers, was joint creation and accumulation of knowledge about soil conservation matters in the farmer-district officer network. There were, however, no built-in mechanisms in FHL to document this knowledge.

In Hekluslógar, collaboration partners were strategically chosen with the expectation that the support of a larger group of people, mainly with local connections—often called “grass-roots” in the interviews—would convince politicians and help

Table 3. Description of interviewee groups and number of interviews.

Interviewee group	No. of interviews (<i>n</i> = 22) [†]	Description of group	Criteria for choice of interviewees
Soil Conservation Service of Iceland (SCSI) officials	5	Director and managers at the SCSI	Relevance to case studies
SCSI district officers	7	District officers, stationed at five SCSI district offices	All current (spring 2011) district officers with > 1 year experience
Farmers in Farmers Heal the Land project	9	Farmers taking part in Farmers Heal the Land; two males, three females, and two couples (husband main respondent). All had been in the project for > 14 years, except one, who started in 2006	Involved in project > 5 years, from different parts of Iceland, gender balance
Members of the Hekluskógar collaboration committee	9	Two representatives from SCSI, six from other governmental and nongovernmental organizations, one from local farmers. Current project manager [‡]	Member of the collaboration committee at some time during the collaboration phase (2005–2007)

[†] Some interviewees belong to more than one group.

[‡] The current project manager previously represented Iceland Forest Service in the collaboration committee.

attain governmental funding. Furthermore, the SCSI and fellow committee members alike expected the collaboration committee to contribute to project design. The SCSI staff expressed satisfaction with the project and also saw what they called the “Hekluskógar model”—using clusters of native species as seed sources for reclaiming trees and shrubs on large areas—as a potential model for other projects. The collaboration partners seemed to have developed a deep interest in the project and were satisfied with it as such, although some of them expressed strong disappointment over expectations that were not met. One such expectation was that the project would generate increased funding for the forestry sector, but according to some interviewees, a portion of governmental funding to other forestry projects was rechanneled to Hekluskógar. Several stakeholders were also disappointed because the final Hekluskógar arrangements (Table 2) did not involve continued multi-stakeholder management, as they had expected.

Statements of some of the SCSI staff denoted that, to them, participation meant literally that other stakeholders participated in activities such as tree planting and environmental education.

Influence and control

The SCSI staff controlled the overall design and administration of FHL, while the farmers decided whether to join the project and made decisions about activities on their own land. They also hosted the district officer visits, while the visit schedule, duration, and examination of restoration plots was decided by the district officers. The district officers said they continually tried to improve FHL, but except for requests for feedback when the project started, statements of district officers and farmers indicated that farmers had little influence

on project arrangements. This lack of influence was one of the few things farmers complained about. Many of them had either suggested changes to no avail or had ideas for improvement that they had not communicated.

The core idea of the Hekluskógar project was developed within the SCSI before involving other stakeholders, and it stayed essentially unchanged through the participatory process. During the collaboration phase, the collaboration committee decided about project arrangements, although one nongovernmental organization interviewee stated that “the scientists carried the final responsibility.” Many interviewees described how the committee members strongly disagreed on some points, especially about what species to use, but after deliberation, they settled on the SCSI’s original idea to use only native species because “it was considered most likely to succeed, financially.”

The committee suggested continued collaborative management of the final Hekluskógar project (Hekluskógar Collaboration Committee 2005), but in the end it was decided, at the governmental level, to make the SCSI and Iceland Forest Service responsible for its implementation (Table 2). In the Hekluskógar contract from 2007, the collaboration committee was assigned an advisory role during project implementation, but in reality, committee meetings became less and less frequent (Table 2). One committee member put it like this:

“[T]his project was simply stolen out of the hands of the grassroots... And when that happened, then the original Hekluskógar model, about this powerful collaboration, it was just done with.”

The same person believed that this course of events ruined Hekluskógar’s potential for being a participation role model.

Table 4. Aims, expectations, and outcomes of Farmers Heal the Land, mentioned by interviewed Soil Conservation Service of Iceland (SCSI) staff and participating farmers.

SCSI staff		Farmers	
Aims and expectations [†]	Outcomes [‡]	Aims and expectation [†]	Outcomes [‡]
Activate landowners and others to attend to soil conservation. Change attitudes	Landowners show more interest in soil conservation. Care about the land. Change of attitude	More land for grazing [§]	Have more grazing now, higher economic returns, increased land value
Increase others' knowledge about soil conservation. Educate others	Landowners and others have learned and gained more skills and understanding about soil conservation	Improve condition and/or sight of land, stop erosion	Improved condition/sight of land. Larger area vegetated than before
Cost-efficiency	Cost-efficiency. Landowners contribute more than agreed on in contract	Decrease grazing impact on other land	Protects sensitive land from grazing. Controls grazing
Ownership. Landowners take responsibility for conservation and state of land	Farmers demonstrate ownership of own conservation project Landowners monitor and maintain results Better, less destructive grazing regimes	Prepare land for growing trees	Have land for trees, have planted trees
Improve relationship between SCSI and farmers. Gain mutual understanding	Improved relationship between SCSI and farmers Increased local acceptance of SCSI		Improved relationship between SCSI and farmers
SCSI learning from others	SCSI has learned from farmers		Have learned from district officers Have personally gained more understanding/skills/ experience in soil conservation Have personal interest in soil conservation and state of the land. Experiments with revegetation methods by own initiative
Higher quality and sustainability of results	Sustainability of results Image of SCSI and farmers more positive Revegetation results "contagious". Other farmers become interested Landowners have gained. More grazing, higher economic returns		Monitors and maintains revegetation results. Proud of results Personally contributes more than agreed on in contract Image of SCSI and farmers more positive Neighbors have become interested by seeing results

[†]Aims and expectations with participation in descending order after frequency in interviews. Due to the semi-structured nature of the interviews, the frequency is just an indication and is not statistically significant.

[‡]We use the word outcome in a broad sense, meaning perceived changes, benefits—or losses—and other end results, material or nonmaterial, of project activities.

[§]Mentioned by all interviewed farmers

People elsewhere would be reluctant to engage themselves in similar projects because the government might take over and exclude them.

Interaction

Interaction, especially face-to-face, was an integral part of both projects. It relied mainly on common communication

skills and received little formal planning or training. Nevertheless, all interviewee groups found it mostly positive and constructive. Parallel with the launching of FHL, the SCSI started to establish district offices in different parts of the country in order to, as one SCSI official said, "...move our operations closer to the people and build stronger bridges to the locals."

A yearly visit to participating farms was a key component of FHL. The visits were informal and offered opportunities to talk about soil conservation matters, something farmers rarely discuss among themselves according to many interviewed farmers:

“[W]hen farmers meet... soil conservation is not the main subject on the agenda even though it is a large part of our daily tasks.”

Farmers and district officers alike talked about mutual exchange of knowledge and experiences during these encounters, and said that the officers carried knowledge both to farmers and between them. Both parties considered conversations about other unrelated issues—often over a cup of coffee—to be important and said that they contributed to friendly relations. The district officers occasionally contacted farmers in between visits, and sent FHL newsletters annually. Farmers, however, said that they seldom contacted the SCSi by their own initiative—something district officers complained about—but many of them felt welcome to do so if they wished. The SCSi staff revealed that they tried to facilitate more spontaneous contacts by moving their district offices to buildings housing other organizations sought by farmers.

Governmental agencies in Iceland have undergone substantial budget cuts since the country underwent a financial crisis in 2008. One of the SCSi's cost reducing measures was to decrease visits to some FHL farmers to every second year. At the same time, and despite increased fertilizer prices, the average subsidized quantity of fertilizer per farm was maintained. The interviewed farmers who did not get annual visits complained about this lack of contact. Some also complained about frequent changes of district officers and not knowing who their contact person was or even what district office they belonged to.

The Hekluslógar participatory process was improvised along the way. During the collaboration phase, the collaboration committee usually met monthly, and committee members stayed in contact between meetings. All interviewees experienced this period as positive. Meetings were described as informal and friendly, although they also involved heated discussions. All interviewees said they felt free to express themselves and usually felt listened to, but some representatives of local organizations occasionally felt that their ideas were not taken into consideration. After formal establishment of the project in 2007, collaboration committee meetings should be called twice a year. This was initially adhered to, but then meetings became scarcer (Table 2). Committee members with no other connection to the project at this stage expressed strong disappointment about this lack of involvement. They personally wanted to stay involved, but one of them also saw this as a risk for the project:

“[I]t is not enough to involve the grass-root, you also have to nourish it... for example by continuing the committee meetings... [The grass-root] thrives on information... And in the end, it is the grass-root that obtains the [project] funding.”

Two SCSi interviewees also mentioned that the committee was not kept involved, and one of them was worried that this would have negative consequences for the project.

Ability and commitment of the Soil Conservation Service of Iceland

Both the SCSi staff and one farmer mentioned that the SCSi had changed from doing mostly practical conservation work to focusing more on research, advisory activities, and supporting others' restoration work. SCSi respondents had either agricultural or natural science education, and only a couple of them had any kind of formal training related to participation. They all expressed interest in these approaches and found them valuable, but the participatory processes were not formally evaluated.

The district officers said they received little introduction to the communication part of their work, usually only a few farmer visits together with an experienced colleague. They got sporadic communication courses, but no formal communication guidelines existed. Participant observations and interviews with farmers showed, however, that the district officers were able communicators. They described how they support each other and discuss communication matters, especially when there are difficulties. Some of them expressed concern about limited connection with the SCSi research division, and about low priority of participatory projects within the SCSi; many colleagues did not acknowledge the value and importance of such projects, and the district officers felt they sometimes had to defend them, including the need for spending money on farm visits. They also mentioned problems with lack of time, and farmers were also aware of this. In 2010, the cost of FHL was 9.4% of the SCSi's total expenses, while the project accounted for 44% of the revegetation (in hectares) performed or supported by the SCSi that year (Jónsson 2010, SCSi 2010).

The SCSi staff members organizing the Hekluslógar process had no prior experience of conducting participatory processes, but other stakeholders' statements indicated that they were competent communicators. The agency also seemed to have spent ample resources on the project during the collaboration phase. The interviews, however, revealed some problems with being open to uncertain outcomes. A recount of the first Hekluslógar collaboration meeting illustrates this:

“[When we] tried to sell them our idea, we got all kinds of reactions... and I got the feeling that, ‘damn, now they will destroy our project... and this was such a great project... maybe we should just have done it by ourselves’.... But I'm so glad we continued... because this is the only way to realize such a large project, to let many parties buy it.”

DISCUSSION

The interviews gave a picture of a predominant product focus at the SCSI. The main indicator was that the SCSI interviewees expressed primarily pragmatic aims and expectations with involving other stakeholders. The antagonism between farmers and the SCSI used to be a limiting factor for soil conservation in Iceland, so the wishes for improved relationships could also be seen as pragmatic (cf. Reed 2008). The SCSI staff and some Hekluslógar partners seemed to have somewhat diverging understandings of the collaboration initiative (cf. Moore 1996). The SCSI's main objective with inviting other stakeholders was to realize the project idea, that is, product oriented. The partners also wanted the project to come true, but in addition they expected collaborative management of the future project, i.e., a process-oriented objective. That the SCSI interviewees used the "Hekluslógar model" concept in an ecological and pragmatic sense, while one collaboration partner used it to refer to the collaboration initiative, supports this interpretation.

Some farmers' and Hekluslógar partners' expectations seemed to have developed during, and as a result of, the participatory processes themselves. These expectations were mainly about influence and interaction, which is in line with Moore's (1996) observations that expectations can be directly related to how participatory processes are conducted and experienced. In our case studies, most of the unmet expectations were process related. The SCSI staff did not seem well aware that aims and expectations with participation can be process related or that the processes themselves might generate expectations that need attention.

A common discourse at the SCSI was that land users should take more responsibility for soil conservation matters. Still, while other stakeholders had a certain influence over practical issues in both projects, it can be said that the SCSI and the Icelandic government retained the overall control. The apparent power asymmetry was evident mostly at a structural and institutional level. On a personal level, all stakeholders seemed on equal terms, which is the common way of relating in Iceland. In FHL, there was no formal procedure for farmers to influence project arrangements. The Hekluslógar collaboration committee had significant influence during the collaboration phase, but the administrative arrangements of the final project, decided at a governmental level, ignored the committees' suggestions of continued collaborative management and put two governmental agencies in charge of project implementation (cf. Arnstein 1969). During the collaboration period, the image of a "grass-root" project was considered likely to create political support for the idea (cf. Arnstein 1969, Mosse 2001), but with the final project arrangements, the "grass-roots" were practically excluded from having genuine influence on the project. This could be a sign of reluctance to release control (cf. Campbell 1994, Pretty 1995) and commit to the shared influence implicit in

participatory processes (cf. Warburton 1997, Buchy and Hoverman 2000, Reed 2008). Furthermore, this example illustrates how political and institutional structures can constrain governmental agencies in their attempts to use participatory approaches.

Face-to-face interaction between the SCSI representatives and other stakeholders was a key factor for creating outcomes in both projects (cf. Warburton 1997, Bentrup 2001, Rowe and Frewer 2005). In FHL, an annual visit seemed sufficient as long as it was consistent, and in Hekluslógar, the intensive contact during the collaboration phase contributed to the collaboration partners' strong "ownership" of the project (cf. Warburton 1997, Senecah 2004). Campbell (1994:15) suggested that the general lack of training in "people skills" creates problems for professionals involved in participatory projects. In our case studies, this was not so evident at the face-to-face level, where common social skills seemed enough in most cases. Instead, dissatisfaction occurred when interaction with other stakeholders was reduced or the contact became inconsistent and unpredictable. This suggests that the problem was rather related to limited knowledge about the crucial role of interaction in participatory projects, which might be ascribed to lack of training.

Participation usually requires environmental agencies to change and develop new institutional cultures (Campbell 1994, Pretty 1995, Warburton 1997, Reed 2008). Several interviewees stated that the SCSI has indeed changed since they started to involve other stakeholders. Nevertheless, the need to defend the use of resources on participatory projects, felt by some district officers, and the lack of connection between them and the SCSI research division may be a sign that participation was not fully integrated within the agency culture (cf. Reed 2008).

Interpretation of participation and effect on practice

From our analysis we draw the conclusion that participation was seen mainly as a method to accomplish the SCSI's own goals effectively by engaging others to, literally, "participate" in soil conservation activities. Their interpretation of participation encompassed considerable interaction with other stakeholders but involved very limited requirements on themselves to release overall control and build capacity in communication and participation. This understanding of participatory approaches resembles what Pretty (1995) calls functional participation, or participation as a method to fulfill the initiators' goals. Functional participation might be interactive, but the processes allow for only minor decisions, while the authorities make the major decisions, often based on predetermined objectives. FHL also bears some resemblance to what Pretty (1995) defines as participation for incentives. Contrary to FHL, however, participation for incentives does not involve learning, farmers' experimentation, and sustainability of practice. It can even be argued that FHL

does not qualify as participation because of its individually based partnership structure, but the scope of our study does not allow conclusions about that.

Tangible outputs are essential for participatory projects (Moore et al. 2001), so product focus is relevant and necessary for governmental agencies that have certain duties to fulfill (Warburton 1997). Furthermore, the SCSI is well known in Iceland, so the other stakeholders were familiar with their role and overall objectives before they joined the projects. By and large, the soil conservation and revegetation outputs of the two projects matched the interests of the SCSI and the other interviewees, although they expressed somewhat different reasons for wanting them. There were also other gains, such as improved trust and relations (cf. Buchy and Hoverman 2000, Senecah 2004), and joint production of knowledge that stemmed from the interaction between district officers and farmers (cf. Pretty 1995, Buchy and Hoverman 2000). The lack of mechanisms in FHL to systematically record and disperse this knowledge might, however, indicate that the extent of it was unanticipated. We conclude that the product focus contributed to considerable gains in these projects.

The FHL farmers and Hekluskógar partners were mostly satisfied with the projects, but some of them also complained about lack of influence and interaction, and other unmet expectations. This suggests that the agency's product focus worked well as long as there were perceived joint gains (Pretty 1995, Warburton 1997, Beierle 2002) and adequate attention to process factors such as interaction (Pretty 1995, Beierle 2002, Rowe and Frewer 2005) and shared influence (Arnstein 1969, Pretty 1995). But when these aspects were not attended to, dissatisfaction occurred among some stakeholders. Other scholars have observed similar problems when process factors were not sufficiently considered, e.g., discontent (Senecah 2004), exaggerated stakeholder expectations, and limited stakeholder inputs (Buchy and Hoverman 2000). It may also negatively affect trust and relationships (Pretty 1995, Senecah 2004), and render outcomes unsustainable (Pretty 1995, Warburton 1997). Ultimately, this means potential loss of benefits (Buchy and Hoverman 2000), which highlights the need to view participation not only as a means to an end but also as a process (cf. Warburton 1997).

The emerging picture is that, even though successful in achieving tangible results, particularly the agency's own goals, the SCSI's product focus might have led to limited attention to process and people-related factors and little sensitivity to other stakeholders' expectations that did not correlate with the SCSI's own. This had some negative consequences in our case studies and might have limited the effectiveness of the SCSI's participatory approaches. Relatively low priority of training in communication and in conducting participatory processes could also be a consequence of product focus (cf. Campbell 1994).

It is pertinent for environmental agencies to emphasize tangible outputs of participatory projects, and this study showed that in many ways, the SCSI's interpretation of participation was effective in dealing with complex soil conservation issues. But it also showed that it is important to consider, and balance, both product and process aspects to optimize the effectiveness of participatory approaches. For agency personnel with agricultural and environmental science background, product aspects may be easier to deal with than process aspects, which are generally just as complex as biophysical matters. This highlights the necessity for thorough knowledge and understanding of participation and thus for providing agency staff with training and education in participation and communication. To further facilitate participatory approaches, efforts should be made to integrate this understanding within the agencies and also within the institutional frameworks in which they operate. We argue that this will enhance participatory processes and, ultimately, benefit land restoration and other forms of environmental management.

Responses to this article can be read online at:

<http://www.ecologyandsociety.org/issues/responses.php/5516>

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“We Know How to Talk to Farmers”: Dealing with Stakeholder Interaction in Participatory Land Restoration in Iceland

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ABSTRACT. Environmental agencies are increasingly adopting participatory approaches. Stakeholder interaction is a key component of participation, but environmental agency employees typically lack training in dealing with people. This study explored how seven district officers at the Soil Conservation Service of Iceland (SCSI) experienced and dealt with stakeholder interaction in participatory land restoration. Semi-structured interviews revealed five challenges facing the officers and eight strategies that they used to deal with these challenges. Their core challenge was to establish and maintain contact with farmers and other stakeholders, as it enabled the SCSI to support and influence their soil conservation practices and thus to achieve the agency’s goals. Dealing with personal emotions was also a prominent challenge. Four of the identified strategies—creating win-win scenarios; direct and positive communication; “going local”; and motivation and knowledge sharing—promoted collaboration. The other four strategies—supportive team; the officers background, knowledge and skills; self-reliance; and self-control—supported the officers in their collaboration efforts. We conclude that the officers’ background and abilities helped them to handle stakeholder interaction well under most circumstances. But we also identified several undermining factors: insufficient time and other resources, limited understanding and acknowledgement within the SCSI of the value of stakeholder interaction; and a legal duty to assess vegetation cover condition on farmland, which contradicted collaboration. Some measures to counteract these factors could be to increase resource allocation to local operations, and to ensure a general recognition within the agency of the importance of collaboration and communication for accomplishing the overall tasks. It is also preferable to have different individuals, or organizations, perform collaboration promoting activities and vegetation assessments. Emotional issues in connection with stakeholder interaction also need more attention.

Key Words: collaboration; participatory approaches; land restoration; participation practitioners’ experience; stakeholder interaction

INTRODUCTION

Environmental agencies are now increasingly adopting participatory approaches, either by their own choice or because they are required to by higher authorities (cf. Buchy and Hoverman 2000, Moore et al. 2001, Reed 2008, Senecah 2004; Westberg et al. 2010). This is in part due to a growing recognition that in order to achieve sustainable solutions, different stakeholders must have a say in decision-making, problem framing and implementation, and their knowledge, values and interests have to be taken into account (Pretty 1995, Buchy and Hoverman 2000, Beierle 2002, Senecah 2004, Reed 2008). Interactive communication, especially face-to-face with dialogic properties, enables these processes (e.g., Pretty 1995, Buchy and Hoverman 2000, Beierle 2002, Senecah 2004, Rowe and Frewer 2005, Stringer et al. 2006). Interaction with stakeholders therefore becomes a core activity for environmental agency personnel involved in participatory undertakings.

The form of participation portrayed above implies collaborative interaction. Drawing on a symbolic interactionist perspective, Charon (2010:155-157) describes five interactive processes characterizing, and necessary for, collaboration: (1) the actors develop similar or complementary goals in the situation, (2) the actors develop a shared focus for action by defining objects important to the situation in a similar way, (3) ongoing communication, (4) mutual role-taking, and (5) the actors acknowledge each others' identities as useful for dealing with the situation at hand.

The concept "role-taking" means that while interacting, people try to understand the situation from the others' viewpoint, and to anticipate their actions (Blumer 1969). Competent role-taking is essential for effective communication, cooperation, learning and good relationships, while incompetent role-taking can lead to misunderstandings and conflicts (Charon 2010). Usually, it is easier to take the role of familiar, supportive and non-confrontational persons, than of those who are critical or act in other upsetting ways (Cast 2004). Someone who easily takes the role of a particular individual will normally be more aware of how their own behavior affects that person.

Charon (2010) claims that our identity is the person we present outwardly by acting according to the impression we want others to have of us. In this way we try to influence their behavior towards us. Each individual has many identities but they are of different importance to us, and to the situations we are in. By our actions, we also communicate to others how we perceive them. In this way, identities are constructed and continuously negotiated through social interaction. People can, for example, reject, acknowledge or become suspicious of the identities others present, and they usually react angrily if someone attacks an identity precious to them.

To carry out and facilitate stakeholder interaction can be a complicated task, requiring special competencies, considerations and techniques. This is especially relevant in environmental and natural resource management where conflicts are frequent (Buchy and Hoverman 2000) and hostile relationships between authorities and the public are common owing to the traditionally used "top-down" approaches (Luz 2000, Stenseke 2009). In addition, there is no consensus on how to operationalize "participation" (Pretty 1995, Warburton 1997, Michener 1998, Buchy and Hoverman 2000, Rowe and Frewer 2005, Stenseke 2009, Westberg et al. 2010) and the national and international decrees for participatory environmental management seldom outline how it should be done in practice (Webler et al. 2001, Stringer et. al. 2007, Stenseke, 2009). The environmental agency employees who are supposed to carry out participatory activities typically have natural or agricultural science background, but little or no education or formal training in communication (Campbell 1994, Stenseke 2009, Westberg et al. 2010). They may not even have consciously chosen communication as a main task. Because the way they handle stakeholder interaction is crucial for the outcomes of participatory projects, it is important to support these employees in their interaction activities. To find out how to support them it is necessary to know how they currently experience and deal with stakeholder interaction. There is a lack of literature looking at participation from this angle (Stenseke 2009, Cooper and Smith 2012).

The aim of this study was to explore how district officers working for the Soil Conservation Service of Iceland (SCSI) experienced and dealt with stakeholder interaction. The SCSI was chosen because the agency openly claims to use participatory approaches (Arnalds 2005,

SCSI 2012) and the district officers because they are in regular contact with other stakeholders.

Following Blumer (1969:56), who argues that social action is best analyzed by seeing the actor as “confronted with an operating situation that [he] has to handle and vis-à-vis which [he] has to work out a line of action”, our approach was to identify the challenges the district officers faced in their interaction activities, and the strategies they used to deal with these challenges. Our objective was to contribute to the understanding of the situation of environmental professionals involved in stakeholder interaction, with the overall purpose of enhancing participatory processes in land restoration.

METHODS

The setting

The SCSI is a governmental agency, established in 1907 to handle Iceland’s longstanding land degradation problems (Arnalds 2005). It is now generally acknowledged that unsustainable grazing regimes have contributed significantly to the severe degradation in many parts of the country (Barkarson and Jóhannsson 2009). Still, until the 1990s, farmers and other land users were not systematically involved in the SCSI’s operations (Arnalds 2005). Legislation states governmental authority over soil conservation matters (Crofts 2011), conservation work was usually carried out by agency staff and little was done to promote sustainable land use (Arnalds 2005). Some private land in serious need of restoration was put under SCSI control, and there were frequent disputes between the SCSI and farmers about the actual impact of grazing on land condition. These approaches caused alienation between many farmers and the SCSI and also proved insufficient to accomplish the agency’s overall objectives (Arnalds 2005), which are to halt soil erosion, restore degraded land and promote sustainable land use (SCSI 2012). As a consequence, the SCSI began to involve other stakeholders more systematically in the 1990s.

Farmers Heal the Land (FHL) was SCSI’s first project applying participatory approaches (Arnalds 2005). Through FHL, the SCSI supports revegetation on private farmlands by providing fertilizer subsidies and seeds (Jónsson 2010). Farmers, who apply to the project individually, supply labor, machinery, fuel, and part of the fertilizer cost. In 2011, about 20% of Icelandic farms (Farmers Association of Iceland 2010, Brynleifsdóttir 2011) were registered in FHL (Figure 1). District officers, operating from SCSI’s five district offices (Figure 1), visit all participants regularly to discuss land restoration matters and monitor revegetation plots together with the farmer. This interaction has contributed to mutual learning and improved relations between farmers and the SCSI, and most farmers find it valuable (Schmidt 2000, Berglund et al. 2013). The officers, who live in the districts, usually have natural or agricultural science background, but no formal training in communication, extension or adult education (Berglund et al. 2013).

Data collection and analysis

The first author made semi-structured interviews with all SCSI district officers who had been at least one year in office at the time of interviewing (April-September 2011). That made seven respondents; two female and five male. Four interviews were conducted face-to-face and three by telephone. The average interview duration was 55 minutes and mind maps (Buzan and Buzan 2006), with themes and keywords, were used as interview guides. All interviews were recorded and transcribed word by word. The first author also accompanied

three district officers one day each during their visits to farmers in different parts of Iceland. In total, 12 farms were visited.

The interview transcripts were analyzed through thematic content analysis (Burnard et al. 2008). The steps were: (1) identify themes and categories that “emerge from the data” (ibid:430), (2) reduce and refine categories by merging, removing duplications and grouping categories built on “analytical and theoretical ideas developed during the research” (ibid:431) (3) use the final categories to analyze all transcripts. Main categories can have many sub-categories. Thus, even though our theoretical perspective directed our focus to the district officers’ challenges and strategies, the actual challenges and strategies described below were derived from the empirical data.

In this paper we refer to district officers and farmers as “he”, even though some of them are female, reflecting the fact that the Icelandic words for district officer and farmer are masculine words.

FINDINGS

Our analysis revealed five main challenges facing the SCSi district officers in their interaction with farmers: (1) to establish and maintain contact, (2) to accomplish SCSi’s objectives, (3) to represent the SCSi and the government, (4) to have adequate skills, knowledge and background, and (5) to deal with oneself. Each challenge will be presented separately, together with relevant strategies identified through data analysis. Some strategies apply to more than one challenge.

To establish and maintain contact

The analysis showed that the district officers’ key challenge was to establish and maintain contact with farmers and other land users. Constructive interaction and collaboration were considered very important and a pre-requisite for other outcomes, as this interview quotation reveals:

It’s really quite simple; if you work with others, then you get them on your side, but if you try to force them, then they will not join you. ... You get much better results if you can get into some kind of collaboration with someone, be it municipality, farmer or someone else. You might not achieve exactly what you want, but perhaps you get started, and then the project is less likely to be stopped ...and you kindle their interest. They start seeing things with our eyes and we, maybe, with their eyes.

Most officers said that their first visit to a farmer could be demanding; they had to *break the ice*. A recurring theme in the interviews was farmers’ wariness towards outsiders, especially people from the capital area; authorities and specialists in particular.

...if we were always coming from some 101 Reykjavik or something, then we would be considered foreigners: ‘Some people who do not understand us. Just coming here from the South and bossing us around and don’t understand our life’.

“101”, the postal code of downtown Reykjavik, and “from the South” are expressions used in rural parts of Iceland to refer to the capital area. The history of antagonism between farmers and the SCSi still presented occasional problems and several officers also mentioned a general lack of contact and understanding between governmental authorities and the public as a barrier.

We identified three main strategies for establishing contact. The first was to create win-win scenarios by supporting farmers' land restoration efforts. The FHL project had, according to the interviewees, played a major role in improving relations between farmers and the SCSI:

[FHL] is of course also a tool to establish positive communication with farmers ... And this has enhanced communication and mutual understanding between this agency and farmers all over the country.

All officers had at least some agricultural background and the second strategy, mentioned by most of them, was to *break the ice* in the first visit to a farmer by intentionally demonstrating this background, and their knowledge of agricultural and local matters. The fact that they lived in the area, and that SCSI had decentralized some of their operations by establishing the district offices, supported them in this strategy. The third strategy was face-to-face communication. The following citation provides evidence of all three strategies:

[W]e have managed to stay in good contact with those who are working on land restoration, and it's FHL that plays a huge role. ... What helps us a lot is that we help people restore the land. We are coming to them. We provide funding so they can revegetate their own land the way they want to. ... And then, we start coming in, and we start talking about the revegetation, and then we talk about other things. We talk about sheep, rams, tractors, the land, politics, or whatever. It is this direct connection to this group of people, the grassroots, all around the country. We are not some authority, or someone coming from 101 or somewhere. ... We are the people. They don't receive a letter from [mentions two urban areas], instead it is this closeness.

Once the contact was established, however, another challenge was to maintain it:

First and foremost, we need to nurture our ties to each and every farmer. And make sure that we have an overview over our clients ... and are able to be in personal contact with all of them. And that we have time to visit and look at [their restoration plots]. That is very important.

This ambition was evident in all interviews, but one officer stated that after several visits, most farmers had gained enough competence to manage land restoration by themselves ...*and then we don't have to visit ... just as often. But the results are always better and better.*

Most officers mentioned lack of time and other resources as a major constraint to maintaining contact. They were short numbered and the farms were widely dispersed. Looking at the restoration plots together with the farmers took time, and socializing, often over a cup of coffee, was an important but time consuming part of the visits. Another challenge was to avoid disputes and other negative interaction with farmers. All officers had experienced negative encounters, but they stressed that they were rare. A potential source of negativity was if district officers and farmers had diverging ideas about e.g., choice of restoration methods, or the actual state of the farmer's land. A considerable dilemma in this context was that while the SCSI increasingly sought after collaboration with farmers, the agency was also required by law to assess the vegetation condition on farmlands. In cases of bad condition, the district officers had to alert the farmers to the problem but they had no legal power to force them to do anything about it. Many officers revealed that *to criticize others*, as in this

assessment duty, was their most difficult task. It was emotionally hard for themselves and the farmers alike, but it might also disrupt an otherwise positive relation.

Regular face-to-face interaction was a crucial strategy for maintaining contact, and FHL provided opportunities for that. The district officers stressed the importance of keeping the interaction on positive terms and treating people as equals. It was also important to show interest by taking the time to discuss whatever the farmer wanted to discuss (*The farmer should not get the feeling that you don't have time for him*) and to respect the farmers' work-cycle and not plan visits during the lambing season, for example. To deal with the reported lack of time, the district officers sometimes helped each other out by undertaking part of the visits in other officers' districts. The SCSi also "borrowed" staff part time from other organizations for the same purpose. These individuals were considered members of the district officers' team and attended team meetings.

The main strategy to handle vegetation assessment situations was to meet farmers in person rather than sending letters. If a farmer started to argue, the officers sought to steer the conversation in positive directions. Instead of criticizing, they said that they tried to *think in solutions*—something their superiors also emphasized—and offered to help the farmers resolve the problems:

Let's say that you notice some grazing land in very bad condition ... it's the most unpleasant of our tasks. People take it so personally. ... But it helps me to say "the other day I noticed that one of your pastures could be in better condition." And then I say "could be in better condition", even though it's really horrible. "And if you wish, I can help you fix it." Then, I'm not saying "the pasture is in a horrible condition and you have to fix it yourself". I'm offering assistance. ... Then you are not forcing them either ... we cannot force assistance on people ... but by doing it this way it's easier to keep it on friendly terms.

In the very few situations where a farmer was considered difficult, or even dangerous, the district officers often went two and two together, or another officer took over the case. But sometimes the only thing to do was to just leave it at that.

To accomplish SCSi objectives

The district officers' official task was to accomplish the SCSi's main objectives. The objectives involved bio-physical results as well as changed behavior and increased awareness, knowledge and skills among land users. A challenge in this connection was to kindle farmers' interest in land restoration—if it was not already there—and maintain it. Some farmers were unaware that their land was in bad condition, or thought that degradation was inevitable, while others doubted that the condition could be improved.

A major challenge when it came to increasing farmers' knowledge and skills was that the farmers had to be interested in learning: *You know, you never tell a farmer that he should do something*. The previously mentioned wariness about outsiders', especially experts, was evident in this connection. Several district officers mentioned that some farmers wanted advice while others definitely did not:

...some of them think they know everything and have found the solution to land restoration. ... But their farm is only as it is, and we have comparison with other places. ... It annoys me a bit. ... And then there are others who are always asking questions:

“What can I do and how can I do it?”, and that’s much more fun. ...while others just say: “I know all about this, you don’t have to tell me anything.”

The FHL project was an important strategy for simultaneously achieving restored land and increase knowledge and skills. Discussions about land restoration and joint inspections of the farmers’ restoration plots offered great opportunities for mutual transfer and creation of knowledge. All district officers said they had learned something from farmers and from observing the countless land restoration methods they experimented with:

[Through FHL] the agency gets in contact with the landowners ... and it gives us the opportunity to help them and instruct them and teach them about our experience in land restoration, and our methods, and disperse this knowledge around the country. And on the other hand, many of them also have knowledge which we can adopt and transmit.

The district officers maintained that the fertilizer grants were motivating, and that skeptical farmers had to see fast results to stay interested. All district officers, however, stressed that direct interaction with farmers was crucial for motivation, and many farmers also found security in the partnership. In addition, the visits showed the farmers that the SCSi was interested in their land restoration efforts.

Officer: The formal part ...is to instruct them about the right methods ... But in reality, my role is to make sure they continue their project.

Interviewer: How do you do that?

Officer: Just by coming. These visits are very important. Just coming to them shows that the SCSi finds their project important ... And once you are there, it’s often a question about praising a little. And go out and have a look together. ... So my role is to praise and motivate rather than giving actual advice. ... Advice is okay as far as it gets, but it doesn’t help the least to keep the project alive. ... What keeps it alive is this interactivity.

Farmers’ wariness towards outsiders made it important to *approach people as equals, not coming as the expert from the South*. As one officer pointed out, the district officers were *the local experts* so farmers were more likely to listen to them. To counteract farmers’ resistance to taking advice from others the officers tried to *sow seeds* by strategically *slipping in pieces of knowledge* into the conversation, or coaching the farmer to come up with his own solutions. Another strategy, mentioned by six officers, was to tell the farmers about methods they had seen other farmers use:

I always find it good to say “I saw this at your neighbor’s. He has tried this and it works really well at his place” ... More trying to use it as some kind of local knowledge ...And after traveling around, then you have seen everything work in the field and it’s good to be able to convey this knowledge... even though it is something you have [also] learnt from science; to be able to carry it between people in this way.

Generally, carrying ideas and knowledge from one farmer to another seemed just as important as disseminating knowledge built on scientific research or the SCSi’s own experience.

To represent the SCSi and the government

As the *outward face of the SCSi*, the district officers' behavior inevitably affected the agency's reputation. The fact that they were local persons and on friendly terms with most farmers posed some potential threats that they had to avoid, for example favoring friends and relations, gossiping, and quarreling. Some officers mentioned that they were sometimes treated as private persons when they were in professional errands, and the other way round. Several officers also pointed out that as a governmental agency the SCSi was obliged to serve the whole country and had to be *visible* to the people.

The major strategies to handle these challenges were responsible conduct and positive interaction. This was emphasized at district officers' team meetings and by their superiors, and required a great deal of self-control and conscious separation of work and private life. Several officers said that it was important for them to know and adhere to their duties, rules and regulations in order to maintain a good reputation and other stakeholders' willingness to collaborate: *A district officer has to know his limits and always be aware of how he talks and how it can be interpreted.* As a general rule, district officers did not handle professional interactions with their own close friends and relations.

The officers stressed the importance of maintaining and strengthening the SCSi district offices and the agency's local activities but they felt some lack of understanding for this point of view at the SCSi headquarters. The relevance of spending resources on visiting farmers had also been questioned on some occasions. From the district officers' point of view, the local offices played a key role in making the SCSi's activities *visible* to the general public. Visibility also involved collaborating with locals, visiting farmers, and showing that the agency was interested in other peoples' land restoration efforts:

If the SCSi is to continue to be an agency that serves the whole country, we have to show it in practice. ... It's always good to save money but we have to make sure that activities among the people are maintained so that the agency does not become too self-centered ... Instead, that the agency is alive and the employees are walking among the people ... exchanging ideas, educating and helping.

Adequate skills, knowledge and background

The district officers' tasks called for diverse knowledge, skills and personal abilities. The formal requirement was relevant education in natural or agricultural sciences, and all officers stated that without thorough knowledge in these fields they might come across as untrustworthy or risk losing face; they had to know what they were talking about. But four of them emphasized that higher education was not enough. *Good communication skills, whatever that means*, were also asked for but formal training or education in this field was not required. Neither was training in adult education or extension even though part of the job was to educate others in land restoration. This meant that the only training most, if not all, of the officers got before they started to interact with other stakeholders was a few visits to farmers together with an experienced district officer. Stakeholder communication was not formally monitored or evaluated and there were no formal communication guidelines, but the officers got occasional short communication courses. The only course mentioned in the interviews, however, was a half-day course in how to *tackle difficult individuals*, but according to most respondents, they still lacked adequate skills to handle communication with farmers in association with their vegetation assessment duties: *We feel that we don't really know how to criticize.* Some of them also wanted to learn more about interview skills, and expressed a

desire for more opportunities to visit other districts in order to learn from their colleagues and look at land restoration approaches in different parts of the country.

The district officers felt they had support from their superior, and communication matters were often discussed at team meetings. Some basic directives on how to behave were also given, but in general they mostly had to rely on themselves when it came to stakeholder interaction, as these quotations show:

They just rely on us, and what we know and can and are. ... Nothing else has been on offer.

It has been much up to each of us to shape our own communication. And personally, I have just tried to play it by ear. It just depends on who you are visiting.

A third officer added that this was *both an advantage and a disadvantage*. The officers said they needed to have both professional and life experience, but, as some of them pointed out, the job itself also gave a lot of experience they could not have gotten otherwise. And most of them stressed that experience of farming and rural life was essential; at least, the job would be much more difficult for someone without it.

Dealing with oneself

The last, but not least, challenge for the district officers was to handle their own emotions and opinions during interaction with other stakeholders. This statement reveals the weight of this challenge: *I know that many persons don't last long in this job. They find this [interaction] too difficult*. The emotionally most difficult task was to confront farmers whose land was in poor condition, and difficult incidents had had long-term effects on the emotional wellbeing of a couple of officers. Emotional triggers included frustration over their own limited *criticizing skills*, anticipated anger and abuse from farmers, and the risk of meeting their *antagonists* at the local supermarket. It was also hard to have to criticize a collaboration partner:

... it is one of the great flaws of this job that we are collaboration partners, but ... if we come across something that is not okay ... then we are in the assessing- and police role. And it is often very trying and difficult, especially because you work alone and this is a small community, and you are one of the locals and still you have to be unpleasant towards another local person.

The district officers stressed that problematic situations were rare, but that might change in the future because their vegetation assessment activities were increasing. But as one officer said, the friendly relations they had with many farmers could also make it easier to deal with problematic subjects.

Even the FHL visits could be emotionally difficult. Five officers revealed that although they liked meeting farmers, visiting farms all day, day after day, could be exhausting. They sometimes felt like a *scratched record*, talking about the same subjects over and over. The flipside of the friendly relations was that farmers might interpret them as more private than the officers intended. One officer, for example, described how uneasy he felt when a farmer started to talk about difficult private matters and he did not know how to stop him. Others found it difficult to handle situations when farmers wanted to gossip about their neighbors. A strong discrepancy between the officer's opinions and the farmer's could also trigger

emotions, as could situations where the officer's sense of justice was offended. This could be, for example, if farmers who got FHL support to restore part of their land were overgrazing other parts, or grazing their sheep on severely eroded commons. Furthermore, occasional farmers, and farmers' homes, could be revoltingly unclean, and a few farmers were considered *strange* or even potentially violent. Several officers confessed that they felt uneasy about visiting them.

One strategy to handle emotions was to get help or support from fellow district officers, their superior, or someone else. On the whole, the district officer team seemed very valuable to the officers. The officers apparently used different strategies to handle visits to *strange* people and shabby homes. Some seemed to rely mainly on self-control and said they tried to treat all farmers the same way, while others avoided entering some homes. Self-control was also a key strategy to deal with discrepancies of opinion between farmers and district officers, and the officers had to find the right balance between being firm and flexible depending on the circumstances:

...in this job, you are always dancing on this line: you have this basic recipe of land restoration, but then much depends on circumstances, and of course on the farmers point of view. We don't want to kill the farmers' interest and ideas but rather motivate them, so if this is within reasonable limits compared to the basic recipe, then of course we accept it.

In general, self-awareness and ability to control one's own emotions, temper and behavior whatever the situation seemed essential for handling interaction tasks. Many interviewees also stressed the importance of not letting work related problems affect them personally. This was easier said than done, however, and several officers expressed a wish to learn more about self-control and how to deal with difficult emotions.

DISCUSSION

The findings showed that the SCSi district officers' core challenge was to establish and maintain contact with farmers and other land users. The multitude of considerations and strategies they used to either promote contact or avoid disrupting existing contacts support this conclusion. Through regular contact with farmers, the officers could motivate and support them in their land restoration efforts, and knowledge could be exchanged and created interactively. Active contact with farmers and other stakeholders can therefore be seen as important for achieving SCSi's overall objectives. Little or disrupted contact, on the other hand, would make it difficult for the SCSi to influence others' restoration work and land use practices, and would thereby limit the agency's achievements.

To view relation-building as a core activity represents a change from the past, when good relations with land users was apparently not prioritized by the SCSi (cf. Arnalds 2005). Because other stakeholders are now increasingly involved in the agency's activities, the role of at least part of the staff has changed from carrying out restoration work themselves to encouraging and enabling others to carry out land restoration. It was therefore highly relevant for the district officers to have contact with farmers as a central concern. Many scholars have suggested similar role and focus changes for environmental professionals and organizations (e.g., Campbell 1994, Pretty 1995, Warburton 1997, Buchy and Hoverman 2000, Schneider et al. 2009, Stenseke 2009). Some interview statements indicated, however, that this change was

not totally acknowledged and supported within the SCSI, which seemed to somewhat hamper the participatory activities.

Participation involves at least some degree of collaboration, and four of the identified strategies; FHL—a win-win project, direct and positive communication, “going local”, and motivation and knowledge sharing, indeed covered all five processes characterizing collaborative interaction (cf. Charon 2010). The FHL gave SCSI access to farmers in a natural way and it has been shown elsewhere that the outputs of the project served the interests of both parties (Berglund et al. 2013). Farmers and district officers knew beforehand what FHL encounters were about, so land restoration was their uncontested “shared focus of attention” (cf. Charon 2010:156). Because they had different experience, knowledge and ideas, however, further definitions of details associated with land use and restoration had to be negotiated along the way. These negotiations can be seen as part of the learning process and were not always easy, as the findings showed.

Regular face-to-face interaction was an important feature of FHL. The district officers’ statements indicated that it had proved crucial for building mutual trust and understanding between them and the farmers, for enhancing farmers’ capacity and motivation, and for mutual exchange and creation of knowledge. Studies on farmers’ experience of the FHL project confirm these conclusions (Schmidt 2000, Berglund et al. 2013) and numerous scholars have described similar effects of regular face-to-face interaction (e.g., Pretty 1995, Buchy and Hoverman 2000, Beierle 2002, Senecah 2004, Rowe and Frewer 2005, Stringer et al. 2006, Stenseke 2009). Our findings showed that the district officers were generally aware of the value of direct communication, even in situations where it caused discomfort to themselves, such as the vegetation assessment duty.

We found many signs of the role-taking necessary for constructive interaction and collaboration (cf. Blumer 1969, Charon 2010). The design of the FHL project revealed an understanding of farmers and their situation, as did the strategy of “going local” by having district offices staffed by individuals who, simultaneously, were experts in their field and locals with agricultural background. The officers’ personal experience of the farmers’ lifeworld meant that they knew how to conduct themselves during farm visits, and it helped them time the visits and find suitable small talk topics. Because they counteracted farmers’ caution about outsiders and authorities, we suggest that these expressions of role-taking were vital for establishing and maintaining contact and trust between the SCSI representatives and farmers. Our observations agree with findings from other settings (Bergeå 2007, Schneider et al. 2009, Stenseke 2009). Furthermore, we argue that the officers facilitated farmers’ role taking by intentionally revealing their own farming background and knowledge of local matters (cf. Charon 2010), and by behaving supportively and avoiding criticism (cf. Cast 2004). To show interest in the farmers’ restoration efforts and life in general had the same effect. This reveals that the officers were aware of how their behavior affected farmers, which in turn shows that they were able role-takers (cf. Charon 2010).

The way the district officers conducted knowledge exchange also showed evidence of role-taking. To offset many farmers’ reluctance to take advice from others, the main strategy was to motivate rather than dictate, to *slip in pieces of knowledge* in order to *sow seeds*, and to present restoration methods and knowledge as locally derived rather than scientific or coming from the SCSI. Apart from their farming background, the district officers also had scientific knowledge. This evidently created a fruitful “boundary” (cf. Wenger 2009), which enabled both parties to learn new things. We conclude that the described strategies facilitated mutual

learning and creation of knowledge, as well as integration of local and scientific knowledge, which is needed to deal with complex environmental issues according to many authors (e.g., Pretty 1995, Buchy and Hoverman 2000, Beierle 2002, Reed 2008).

It was evident that farmers and district officers acknowledged each others' identities as mutually useful, which is necessary for collaboration according to Charon (2010). By supporting farmers' soil conservation activities through FHL, the SCSI presented an identity that was useful to the farmers while at the same time showing that farmers were useful for achieving the agency's own goals. This was a change from the past, when farmers were perceived, and consequently treated, as part of the problem, rather than as the solution (Schmidt 2000). The farmers in turn, reacted with suspicion and anger towards the SCSI (Barkarson and Jóhannsson 2009) when their farmer identity was rejected in this way (cf. Charon 2010). On the whole, identities came forth as a significant aspect of the district officers' interaction with other stakeholders. Several of them were negotiated in interaction with farmers (cf. Charon 2010), for example the change from SCSI being the "enemy" to being a collaboration partner. Sometimes the officers had to deal with conflicting identities, e.g., collaboration partner vs. *police*. They also had to be able to separate identities, for instance private person and SCSI representative, depending on the situation.

While the first four strategies we identified—creating win-win scenarios; direct and positive communication; "going local"; and motivation and knowledge sharing—facilitated collaboration with farmers, as discussed above, the other four strategies seemed to support the district officers' in their collaboration efforts. These strategies were: supportive district officer team; own background, knowledge and skills; self-reliance; and self-control.

Self-reliance was an important strategy and skill. Even though FHL visits and vegetation assessment encounters had a basic agenda, each situation was unique and thus impossible to entirely predict and plan beforehand. In addition, there were no formal communication guidelines and the officers usually operated alone. This meant that they had to rely mostly on themselves and play stakeholder interaction "by ear". According to Schön (1991), such "reflection-in-action" leads to experimentation. It is therefore both a way to deal with a situation and to learn about how to deal with both the current situation and similar situations in the future. It can therefore be argued that relatively loosely planned interaction assignments can, at least in part, be beneficial because they offer opportunities to reflect-in-action (cf. Forester 1999, Bergeå and Ljung 2007, Stenseke 2009, Mahon et al. 2010). Controlling own emotions and behavior came forth as another important strategy, or skill, in this context. Built on Charon (2010), who claims that self-control is what makes cooperation possible because it helps people align their behavior with others', we argue that this strategy was essential for the district officers' collaboration efforts.

The eight strategies discussed above seemed to facilitate collaboration with farmers. The adoption of these strategies also indicated that the officers had the understanding and abilities needed to induce and maintain collaborative interaction (cf. Charon 2010), at least under normal circumstances. Many of the sub-strategies we identified aimed at avoiding or diminishing factors that could endanger collaboration and positive relations with farmers, which suggests that the officers were aware of them. One such factor, mentioned by the officers, was inadequate allocation of resources for the SCSI's local operations and for maintaining satisfactory levels of stakeholder contact. The aim is to visit farmers in FHL once a year, but in order to meet recent budget cuts, some farmers are now visited less often (Jónsson 2009). Some interview statements indicated that this was a matter of priority at the

SCSI, and mirrored a certain lack of recognition within the organization of the role stakeholder interaction played in achieving the agency's objectives. Similar problems with lack of time and other resources needed for stakeholder interaction are often mentioned in literature on participation (e.g., Lowndes et al. 2001, Senecah 2004, Mahon et al. 2010)

The vegetation assessment duty was also problematic as it contradicted the officers' collaboration partner identity and inhibited farmers' role-taking. In addition, it was emotionally difficult for both farmers and district officers, and the officers seemed to lack legal backing and sufficient skills to handle it satisfactorily. On the whole, dealing with own emotions in relation to stakeholder interaction came across as a major challenge—something Campbell (1994) also noticed in an Australian setting—and it seemed that this issue needed more acknowledgement and attention. As one officer commented, it was a strong reason for why some people did not last long in this occupation.

Conclusions and recommendations

Our study showed that the core challenge of the SCSI district officers was to establish and maintain positive relations with farmers and other land users, as it would enable the agency to support and influence their soil conservation practices. To deal with oneself in connection with stakeholder interaction was also a major challenge. We identified eight main strategies the officers used to deal with these challenges; four of them promoted collaboration while another four supported the officers in their collaboration efforts. The study also revealed that despite their lack of previous training in communication and adult education, the district officers had the ability and background needed to handle stakeholder interaction well, at least in positive and collaborative scenarios. This somewhat contradicts the accounts of Campbell (1994) and Westberg et al. (2010). The interaction featured in the interviews, however, was mainly on a one-on-one basis so our findings do not reveal how the district officers would handle group situations.

Collaboration with farmers and other stakeholders can be seen as essential for achieving the SCSI's overall goals and should be further developed and encouraged. It is therefore important to support all five processes needed for collaborative interaction (cf. Charon 2010), to eliminate or diminish factors that undermine them, and to support staff members involved in stakeholder interaction. Some supportive factors were already present: the FHL project; district officers who were familiar with the farmers' lifeworld; decentralized agency operations; and a well-functioning team where communication and emotional issues could be discussed. A certain freedom in how to conduct stakeholder interaction also seemed beneficial.

Undermining factors were: lack of resources, especially time; a certain lack of acknowledgement and understanding within the agency of the importance of stakeholder interaction; and the counterproductive vegetation assessment duty. Insufficient training and legal backing for handling this duty, as well as emotional issues, were other obstacles. Some measures to counteract these undermining factors could be to allocate more resources to the SCSI's local operations, especially to regular communication with farmers and other stakeholders (cf. Buchy and Hoverman 2000, Stenseke 2009) and to promote a general acknowledgement within the agency of the importance of communication and collaboration for the SCSI's undertakings. To recognize communication as a valid and necessary task and working tool (cf. Stenseke 2009) in land restoration contexts could strengthen the district officers' work and its status within the organization. Good relations with farmers could probably counteract the negative influence of the vegetation assessment duty to some degree,

but it is still a good idea not to have the same person, or even organization, perform both tasks (cf. Bergeå 2007). Or at least to provide the district officers with appropriate support and training for this duty. Finally, the emotional part of stakeholder interaction needs more attention and research.

We believe that this study contributes to the understanding of the challenges facing environmental agency employees engaged in stakeholder interaction. Many of the support mechanisms and collaboration promoting strategies identified could also be adapted to other contexts in order to enhance participatory processes in land restoration, and environmental management in general.

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Fig. 1. Locations of the Soil Conservation Service of Iceland’s district offices (blue triangles) and farms participating in the Farmers Heal the Land project in 2011 (red dots) (S. J. Brynleifsdóttir, Soil Conservation Service of Iceland 2011).

