

# A matter of scale – Study on the politics of agri-environmental policy implementation

MINNA KALJONEN

Finnish Environment Institute SYKE

**ABSTRACT.** We need a more thorough understanding of the ways in which vertical scales and horizontal networks hang together in tension in order to understand policy failures experienced within agri-environmental policies in Europe. In this paper I ground this argument with the experiences gained from the implementation of Finnish agri-environmental policy. I bring together an extensive body of empirical material of the Finnish implementation practices during 2000–2006 and examine how the concept of mode of ordering (developed by Law, 1994) could assist us in analysing the complexities of implementation. I elaborate the modes of orderings enacted by the various civil servants, how they have come to depend upon one another and evolved as they have interacted. The opening of the implementation practices reveals how the Finnish agri-environmental policy has taken a fixed scalar form contributing to a hardening of conventional categories and actor positions. This fixed scalar form has not had the capability to meet the challenge of fragile environmental relations. I close the article with a discussion on alternative routes of action.

**T**his is a paper on form. In this paper I explore the implementation of Finnish agri-environmental policy and trace the scalar form the policy has taken. I argue that we need a more thorough understanding of the ways in which vertical and horizontal scales hang together in order to understand policy failures experienced within agri-environmental policies. This implies that we cannot any longer take the scales of policy as given; on the contrary, they should be approached as our empirical matter of concern.

Finnish agri-environmental policy has not met the environmental goals it has set for itself.

The agri-environmental programme, which came to force in 1995 when Finland joined the European Union (EU), introduced a major shift in Finnish agri-environmental policy (MAF 1994, 1999; 2007, Jokinen 2000). It was a crucial step towards an active and explicit integration of environmental concerns into agricultural policy. It promised a new approach to agri-environmental governance suggesting that farmers should be paid for providing environmental goods and practicing environmentally sound farming. It introduced also a novel form of cross-sectoral and multi-level policy practice to agri-environmental governance. The environmental assessments

(Turtola–Lemola 2008) carried out suggest, however, that the changes that have taken place in cultivation practices have not led to such a decrease in the nutrient loads as was wished for.

Finland is not alone in not fulfilling the promise. Also in many other European countries the policy is lacking significant environmental impact (see for an overview e.g. Buller et al. 2000, EC 2005). The several reform measures of the Common Agricultural Policy (CAP) have been shown to have rather limited environmental content, even though they have been promoted as “environmental”. It is also argued that the environmental policy measures have not had the capacity to respond to the environmental pressure caused by the free trade principles and the intensification of agricultural production promoted by the CAP (e.g. Evans et al. 2002, Winter 2000, Potter–Tilzey 2005, Lehtonen et al. 2008).

Finland has adopted a dual policy model, which consists of two kinds of farm-level contracts: general (GPS) and *special protection schemes (SPS)*.<sup>1</sup> The GPS was specifically built to compensate the decline in farm income caused by the EU membership. Largely due to its importance to farm income (Koikkalainen–Lankoski 2004) more than 90% of the Finnish farms have been enrolled in the GPS from its very start (MAF 2004: 31–34). The GPS is thus nation-wide in its reach and scope. The SPS was more precisely built to address specific targeted environmental actions; money distributed via it has been less significant, as has been its success among farmers (ibid.). The SPS operates on a paddock scale. The regional agricultural and environmental officials, together with advisors, are in charge of the implementation of the schemes. The statutory division of work has brought this group of actors to work together more closely than before.

This translation of the policy principles has integrated the environmental considerations into productional matters in a very specific manner, producing an intense tension between the various operational scales and horizontal networks of the policy. In this paper I state that we need to open up these tensions, if we wish

to understand the policy failures experienced within agri-environmental policies.

Implementation is a critical phase in the policy process where policy goals are aligned with farming practices and ecological processes. This process has been a subject of numerous studies within Europe (e.g. Burgess et al. 2000, Curry–Winter 2000, Juntti–Potter 2002, Morris 2004, Wilson–Juntti 2005, see for Finnish studies Niemi–Iilahti et al. 1997, Soini–Tuuri 2000, Kaljonen 2002, 2008). These studies have highlighted the ways in which the various actors find their ways of working together; how expertise and knowledge gets distributed amongst the horizontal network is crucial for policy success. The vertical structuring and layering of the policy actions have also been identified as crucial for the realisation of environmentally friendly agriculture (e.g. Buller et al. 2000, Lowe et al. 2002, Winter 2006, Wilson 2009). The mutual interdependency of vertical scales and horizontal networks has, however, received less attention. Jessop et al. (2008) have stressed that if we are to understand how sociospatial relations take shape, we need to recognise their polymorphies in much more complex ways than what we have been used to. When coupling scale and networks, this would require flat ontology, with multiple ascalar entry points (ibid: 395–396, see also Bulkeley 2005).

The tactic of science and technology studies (STS) of turning matters of fact into empirical matters of concern can contribute much to the analysis of polymorphies of scale. The main argument of STS is that that we cannot separate objects from the material practices and relations in which they are created (e.g. Latour 2004, Law 2004, Mol 2002). Objects are gatherings, whose quality and durability depend on the *form* of the process in which they are created (esp. Latour 2004, see also Gomart–Hajer 2003). In practices objects also become *matters of concern*. They become something that are capable of concerning the practitioner and eventually also transforming him/her (see also Mol 2002).

Such a relational view suggests that we should approach the scales of policy as mosaic processes enacted in practice (see also Howitt 1998, Bren-

ner 2001, Haila 2002). Furthermore, the success or failing of agri-environmental policy should not be seen as something to be explained by some social structure or force; on the contrary, the form of the process may explain some features of what makes a policy successful or not. The relational view on policy practice sensitises us to the various processes of change and stagnation that arise from within the policy system. The interest in form calls for careful treatment of complexity.

John Law (e.g. 1994, 2004), together with Annemarie Mol (2002), have been the most prominent developers of complexity within STS (e.g. Law 1994, 2004, Law–Mol 2001). They have reminded us that things (like policies and natures) do not simply have a contested history, but also a complex present, ‘a present in which their identities are fragile and may differ between sites’ (Mol 2002: 43). In respect to the study of implementation practice, Law’s (1994) analysis of managerial practices in a laboratory is of special analogical importance (see, for the use of analogies, Haila–Dyke 2006). In the study Law showed how in managerial practice there existed side by side various *modes of ordering*, not just one idea of management. He further revealed how these orderings are performed, embodied and told in various materials. He did not however leave his analysis there, on the contrary, he showed how the orderings are interrelated and evolve together as they are recursively told and performed. In such a view, the quality of form is not just about network or process stability (as emphasised by Latour e.g. in 1988), but about how multiple matters of concern can co-exist in productive ways (see also Mol 2002).

This kind of an approach allows a complex view on the tension between vertical scales and horizontal networks in the implementation of agri-environmental policy. In this paper I visit the offices of civil servants who are in charge of the implementation of agri-environmental policy in Finland and elaborate how they enact their matters of concern at distinct operational scales. After discussing the various modes of ordering separately, I expand the analysis to the various mechanisms in which these have come

to depend upon one another and how they have evolved as they have interacted. By opening up the implementation practices, I reveal how the Finnish agri-environmental policy has taken a fixed scalar form contributing to the hardening of conventional categories and actor positions. This fixed scalar form has not had the capability to meet the challenge of fragile environmental relations. I close the article with a discussion on alternative routes of action.

### Empirical matters

The analysis presented in this paper builds upon extensive empirical material I have gathered on Finnish implementation practices during 2000–2006. I have followed the implementation practices in West and Southwest Finland. These two regions present critical cases of regional implementation practices (Flyvberg 2001: 77–81). Both regions have a vital agricultural production basis and strong farming culture. They both have struggled with conflicts caused by agricultural pollution and, in so doing, also taken an active stance towards agri-environmental policy. The high regional stakes render visible and clarify the various complexities involved with policy implementation, making them fruitful cases for elaborating the different modes of ordering and processes of scaling. In this study, I am interested in how these critical cases can help us to understand the ways in which vertical scales and horizontal networks hang together in policy implementation.

In these two regions I have visited the offices and interviewed the key persons in charge of the policy implementation at the regional and municipal level, including the agricultural and environmental administrations, the advisory organisation, the Farmers’ Union and the environmental NGOs (altogether 33). In order to assess the relationship between implementation practices and policy formation, I have also interviewed the key persons at the national level (all together 12). To get a grip on practice, I have observed watershed-level riparian zone planning (Kaljonen 2003) and regional biodiversity management planning (Kaljonen 2008) in action. I

have also studied policy documents, evaluation reports and background memos produced by administration and regulatory science.

I needed all this diversiform empirical material in order to trace the scalar form the implementation has taken. Due to the synthesising character of the article, I present the various practices and modes of ordering on a rather general level. I concentrate more on their mutual co-evolution. A more detailed examination of the implementation practices can be found in the research reports (Kaljonen 2002, Aakkula et al. 2006) and separate articles (Kaljonen 2003, 2008). Furthermore, my focus is on the practices of civil servants. However, in order to make the form of the policy transparent, I need to on occasion refer to the matters of concern of farmers. The more detailed analysis lying behind these arguments can be found in Kaljonen (2002, 2006).

### **Implementation practices: multiple modes of ordering**

#### **At the regional agricultural office: support for prosperous Finnish agriculture**

Regional agricultural officials are in charge of the enforcement, decision making and control of the agri-environmental schemes. They govern and control the GPS and decide upon the SPS contracts on the basis of the comments given by the regional environmental administration. Their offices are situated in the Regional Work and Employment Centres, which are also in charge of the regional distribution of agricultural support and rural development funds.

The main task of the regional agricultural officials is to ensure that the decisions are made in time and money is transferred to the farmers' accounts in a *just* and *fair* manner. This is what they recursively told me in the interviews. The main technologies for safeguarding the justness of the policy are detailed support blankets, control rounds and satellite maps. These technologies render the management actions visible, enabling control all the way from farm level up to European level.

The expertise of agricultural officials builds

upon practical knowledge of the support system and administration – in addition to that of agricultural production and entrepreneurship. In the practice of implementation they have left the responsibility of the environmental content to the environmental officials. The agricultural officials argue that agri-environmental support should be seen as part of the whole agricultural support package and used for ensuring a prosperous Finnish agriculture within European markets. The task of the agri-environmental policy is to ensure that Finnish farming stays as environmentally friendly as it is. The nationwide coverage of the GPS ensures the best results both in terms of social equity and environmental impacts – everybody, nature included, would benefit the most if as many actors as possible participated.

This mode of ordering enacted by the regional agricultural officials actively builds upon continuity. It reasserts the claims that Finnish farmers are stewards of nature and countryside; a claim that has weighed heavily in the Finnish agri-environmental policy all through its history (Jokinen 1997). The emphasis on the GPS also stresses the welfare state's idea of equality between different production sectors and regions; an emphasis which has been one of the guiding principles of Finnish agricultural policy from the 1950s onwards (Granberg 1999). It is the national scale that matters for agricultural officials.

A particular kind of cognitive dilemma, however, brings dissonance to the mode of ordering enacted by the regional agricultural officials. The dilemma arrives from associating together the ethos of entrepreneurship with the principles of the European Common Agricultural Policy. The acreage-based agricultural support simply does not go together with the ethos of entrepreneurship. This cognitive dilemma may even accentuate in the future and cause disturbance to motivation within the profession to work for a more prosperous Finnish agriculture.

#### **At the regional environmental office: towards environmentally effective policy**

For regional environmental officials, the agri-environmental schemes have offered a much

wider set of concrete means and a greater amount of monetary resources to pursue their goals than they have had before. Previously all they had was advice and co-operation (e.g. MoE 1992, Niemi-Lilahti-Vilkki 1995, Jokinen 1997). The most important task offered by the policy is to provide a comment on the environmental content of the SPS applications. In addition to commenting, environmental officials also take part in the control of the SPS and the farmer extension via courses, projects and planning.<sup>2</sup>

The interviewed environmental officials saw as their duty to bring environmental expertise to the regional implementation network. They are to ensure that the environmental goals of the schemes are met. They saw themselves as spokesmen of nature – and, I need to add, many of the civil servants that I interviewed were very committed as such. This commitment, obviously, gave them motivation and flame for their work in the field.

As compared to the regional agricultural officials, the environmental officials act and speak more forcefully for the increasing of the environmental effectiveness of the policy. The regional environmental officials tend to stress the absolute character of agri-environmental impacts (see also Jokinen 2000): the decreasing of environmental impacts should be the only justification for spending public resources. As it is, farmers have gained environmental support on too loose grounds. Their demands for a more effective policy have increased in number, as the results from the evaluation studies have shown that the policy is far from reaching its goals (Turtola-Lemola 2008, Kuussaari et al. 2008). They criticize the nationwide GPS and emphasize the technologies offered by the SPS. Agri-environmental support should be allocated to environmentally critical areas and to more effective measures. They also stress the need for normative environmental control.

The implementation of the SPS has not been an easy task for the regional environmental officials. Introducing the opportunities and requirements offered by the SPS to farmers has required a lot of work, both by the office-desk

and in the fields. After the first years of training with the decision-making procedures, the environmental officials have slowly moved to develop novel working methods in order to increase the effectiveness of the measures. General planning provides an illuminating example of novel practices. The aim of the planning has been to allocate the SPS to ecologically critical areas, increase the interest of farmers and develop collaborative ways of working. The first general riparian zone plans, which aimed at reducing the nutrient loads from cultivated fields, were made in the late 1990s in Southwest Finland. After the first positive results, the practice has spread throughout the whole country, and to new areas such as biodiversity management and wetlands. In practice the planning consists of field and map work as well as participatory meetings together with the farmers, rural officials and advisors.

According to empirical analysis (Kaljonen 2003, 2008), the general planning has provided a concrete tool for environmental officials to pursue their goals; while, at the same time, enacting a new operational scale to the practice of agri-environmental policy. General planning has brought consistency to the implementation and facilitated the complicated decision-making procedures with the schemes. It has succeeded in attracting farmers and the number of SPS contracts has risen. The plot scale enacted by the SPS has been accompanied by a watershed or regional scale enacted by the general planning. Rescaling is further supported by the watershed-level models, maps of critical areas and planning tools developed by the regulatory science of environmental administration.

#### At the local level: buffers between administration and farming

The implementation of agri-environmental schemes has rendered visible the importance of local-level actors in translating policy goals to farm-level practice. Here the role of advisors and municipal rural officials is of particular importance.

In Finland the rural advisory centres have traditionally taken care of the farm-level advice, also when it comes to environmental issues. The advisors had, for example, at the beginning of the 1990s a large advisory campaign entitled *Our Common Environment*, during which they made environmental management plans for farms and gave general advice. The campaign was based on voluntariness. The agri-environmental programme has given them a chance to continue this work. During the first agri-environmental programme period advisors carried out the farm-level environmental management plans required by the GPS; they also helped farmers in taking soil samples and preparing cultivation plans. The largest resources were invested in compulsory farmer courses. In addition, advisors have offered farmers consultancy in e.g. landscape and biodiversity management planning on a site and village scale.

Another group that is important in translating the scheme conditions to practice are the municipal rural officials. Coping with the EU, CAP and changing policies has placed new requirements on the farmers: one has to be in the right place at the right time in order to keep abreast of the support conditions. For this the advice of the municipal rural officials is highly appreciated. Similarly to the regional agricultural officials, the interviewed municipal rural officials saw smooth and fair administration of the support system as their main task. At the municipal level, there is, however, another, perhaps even more important task: to work as a *buffer* – to use a concept applied by my interviewees – between the policy and the farmers. The interviewed advisors also identified this task as important for them.

To act as a buffer means first of all capability to translate scheme conditions to farmers. This requires a lot of work: one needs to follow the development of the agricultural and environmental policy, to be aware of the latest interpretation of the scheme conditions, and most importantly, to have the ability to translate them to practice. The information should flow also the other way around. The experiences gained from practice

need to be translated back to administration: "... so, that they won't become too alienated from real life", as one advisor put it.

The local rural officials and advisors act as buffers between policy and practice, but also between different cultures and scales of action. The farmers' scale of action is most of all local; their matters of concern arrive from the realities of farm livelihood (Kaljonen 2006). They criticise agri-environmental schemes arguing that the knowledge of farming and local environmental conditions and care should be better incorporated to the governance of the agri-environmental problems. Local officials stress that they know the farming culture and understand the farmers' way of thinking. The local officials have developed a close relationship with the farmers, which needs both trust and dependency to exist. The farmers are dependent on the information the officials possess, but at the same time their relationship seems at its best to have evolved into being flexible enough to accommodate the farmers' own accounts of subjectivity and soften the ambivalence which taking part in environmental conservation might have provoked. They have been capable of addressing the social problems felt in the Finnish countryside and of supporting the farmers' cultural identity.

Municipal officials and advisors are, first and foremost, spokesmen for *living countryside*. They stress that agri-environmental schemes should be used for diversifying livelihood in rural areas and safeguarding the conditions for practising vital agriculture. For the advisors the landscape management is, further, a route to express their love and caring towards the countryside. At best, this vision and commitment for a living countryside can act as a motivation for their work. The most appropriate scale of action for realising these visions is from farm to locality.

However, many local rural officials have felt the administration of the subsidy system as so devastating that they have practically not had resources for anything else. They have found themselves in a double alliance (see also Rose-Miller 1992). On the one hand, they have allied themselves with the administration, focussing



on their problems and translating concerns about environmental or economic performance. On the other hand, they seek to form alliances with farmers, translating their daily worries, decisions on investment, economic burdens and practical agricultural work. This double alliance makes their position within implementation ambiguous. The role of municipal rural officials and advisors in the implementation of agri-environmental policy is characterised with many institutional uncertainties and variety between the different localities. In my interpretation this mode of ordering has also the loosest end and least fixed boundaries.

### Movement within modes of ordering

As we can see, the different parties involved, which traditionally have looked at agri-environmental questions from rather different angles, have been able to translate the agri-environmental schemes as their own matter of concern. In the practice of implementation these multiple matters of con-

cern exist side by side (Figure 1). They all draw on particular governmental technologies operating at distinct vertical scales. The analysis of the modes of ordering has rendered visible how the vertical scales are tight as to the division of work and expertise within the horizontal network.

Distinguishing multiple modes of ordering in this manner, however, gives still far too stable a picture on what is happening in practice. These modes of ordering have loose ends, and their own inner disturbances and dissonances. Furthermore, the modes of ordering are not closed off from each other – they evolve all the time as they interact with one another and the rest of the world. There is a lot happening in between the various modes of ordering.

### From collaboration to stagnation

As I directed my attention to the dissection between the various modes of ordering, I recognised another distinct mode of ordering, which emphasises explicitly the *collaborative practice*

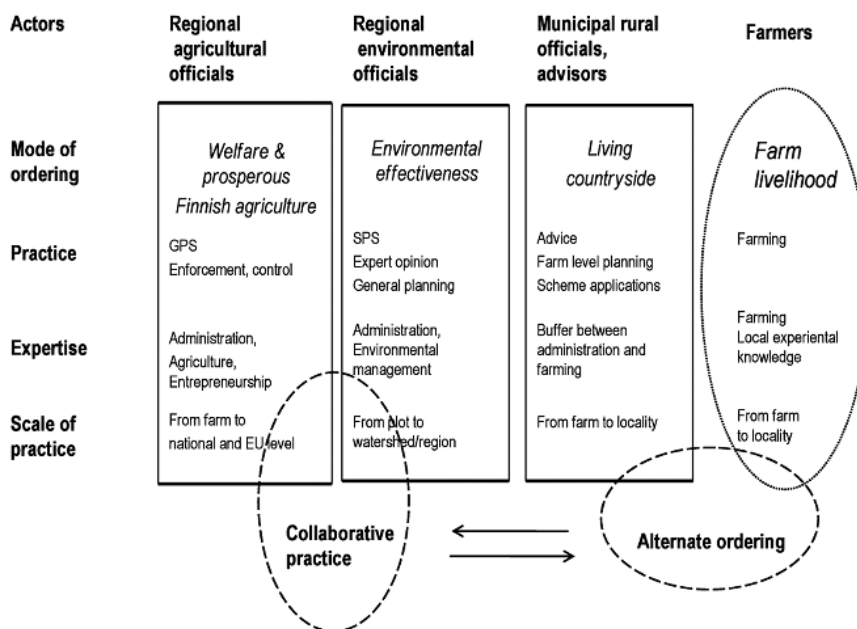


Figure 1. Implementation practices: multiple modes of ordering

between the various actors (Figure 1). Despite the differences in their modes of ordering, the regional agricultural and environmental officials have actively developed collaborative working methods and harmonised decision-making procedures. The statutory division of work has established a co-operational routine between them in the implementation of the policy (see also Soini–Tuuri 2000, Juntti–Potter 2002). Niemi–Iilahti–Vilkki (1995), who studied the regional networks of agri–environmental policy at the beginning of 1990s, state that although co-operation was promoted on a political level, the policy of that time did not really offer concrete means for co-operation. Viewed against the situation back then, the implementation of agri–environmental schemes has changed the situation significantly.

Both sectors appreciate the increased co-operation highly. Working together and getting to know each other's competencies and personalities has created a trustworthy relationship between the two sectors. Practice has also taught that agri–environmental management requires actions, competencies and knowledge of both sectors. For example, one of the interviewed environmental officials said that they have explicitly decided to go forward with those issues where consensus between the different parties already exists. They do not want to risk the trustworthy relationship that has been developed between the agricultural and the environmental sector.

Kröger (2005), who has studied agri–environmental policy making at the national level, has also witnessed a birth of a new advocacy coalition, which resonates with the regional-level collaborative practice. This advocacy coalition does not acknowledge the intrinsic value of environmental protection, but regards it necessary for maintaining the legitimacy of agricultural production in Finland. At the national level the active committee work during the preparation of policy and the shared worry over the continuation of Finnish agriculture in the European markets has rendered various actors ready for compromises.

This kind of mode of ordering, which has

evolved out of collaborative practice between the agricultural and the environmental sector, seems to have gained a hegemonic position within the practice of agri–environmental governance in Finland. Hajer (1995) has spoken of the importance of identifying hegemonic discourses within environmental policy analysis in order to understand the inner dynamics of policy development. On the basis of my empirical findings, I very much share his plea. I, however, want to suggest that considering discourses as modes of ordering enacted in practice brings more dynamics to the understanding of policy evolution.

In the previous chapters I have showed how the modes of ordering of the agricultural sector, which aims at prosperous Finnish agriculture, and of the environmental sector, which stresses the need to move towards a more environmentally effective policy, are enacted by various technologies, most notably the GPS and the SPS. If I had analysed only discourses, I would not have been able to grasp the way in which these technologies actively enact the scales of agri–environmental management. When we stretch the analytical focus to the interplay of policy preparation and implementation, the relationship between the operational scale of agri–environmental governance and the hegemonic collaborative practice becomes even more obvious.

In my empirical analysis I have showed how the environmental sector has tried to use the SPS measures and general planning for rescaling the policy. At the regional level these attempts have received acceptance and the environmental sector has gained more appreciation and power. However, on a national scale the rescaling attempts have proven to be more difficult. At the national level, the political aim of safeguarding prosperous Finnish agriculture and the idea of environmental stewardship have been so strong that decisions on environmentally based allocation of the schemes could not really be taken. The agricultural policy community, as Jokinen (2000) has argued, is still a powerful player in defining the content of agri–environmental policy. The way in which the GPS was built to compensate the decline in farm income caused



by Finland's EU membership in 1995, and how this rationale has maintained its hold until today, is a durable indication of the policy community's impact. There are also many examples of failed attempts when the environmental sector has tried to strengthen the environmental requirements set by the GPS.

This kind of analytical look on how these two modes of ordering have evolved together to co-exist has revealed how the close collaboration between the two sectors, at first, contributed significantly to policy learning, but has since stagnated into repetitive cycles of practice which contribute to the hardening of conventional categories and fixed scales of agri-environmental management. The agricultural sector has taken the ownership of the GPS, which operates at the national scale; while the more localised SPS measures are left for the environmental sector to play with.

Vicky Singleton (2005) has reminded us that it takes a lot of extra effort to push the conventional categories and question the boundaries in the practice of policy implementation (see also Ellis–Waterton 2005). In her study about the novel British Public Health Policy she has shown how it was the implementation phase of the policy that was not able to enact the promises given by the policy. On the contrary, it was the very conservative element in the practice of practitioners that hardened the conventional categories and caused the failing of policy. In the case of agri-environmental policy it seems that the most rigid elements within the system arrive from the political realities enacted at the national level, which are then further re-enacted by the administrative routines and technologies used by the various sectoral organisations. The case of agri-environmental policy also shows how something that at first has contributed to policy learning, as a consequence of repetitive cycles of practice, has become a congealing force.

### Mutually constituted others

There exists an alternate ordering, which heavily questions the hegemonic view on agri-envi-

mental governance (Figure 1). Farmers in particular have contested the normalised accounts of environmental management proposed by the schemes (Kaljonen 2006). The municipal rural officials have together with the advisors joined the farmers in this criticism, as I have described earlier. They question the very premises of the policy, arguing that the knowledge of farming and local environmental conditions and care should be better incorporated to the governance of agri-environmental problems. As farmers, together with the local officials, appeal to local farming knowledge they, at the same time, enact their agency as environmental stewards within the network of agri-environmental governance. This alternate ordering, coupled with the repetitive cycles of collaborative practice, tends to enact the boundary between localising and universalising knowledge in such a dualistic fashion that these have become *others* to one another within the current network of agri-environmental governance in Finland (see also Callon–Law 2005).

I would even argue that the hegemonic view has been compelled to silence the matter of living countryside in order to sustain its coherence. The active materiality of implementation practices and the use of various technologies have made these efforts concrete. For example, the pivotal role of the GPS in the practice of agricultural officials withholds their motivation to associate entrepreneurship and environmental management. The policy does not offer any concrete tools for supporting the linkage. Also, despite the several attempts to lessen the bureaucracy of the schemes, the outcome has been the opposite. The system seems to regenerate its technologies in ways that produce more scrutinised control. The farther off the decision-making happens, the more important these technologies become. Also, the more multiple policy levels there are, the more emphasis the restraining of failing of government seems to get (Vaughan 2004). The boundary between localised and universal accounts of agri-environmental management is enacted and re-enacted again and again.

Again we can identify a dynamic relation within the implementation which tends to harden the

conventional categories. It seems extremely difficult for the actors to move across the scales. It is however possible to detect some novel openings where the modes of ordering have been brought together in unusual and fruitful ways; where boundaries of knowledge have been stretched and the pre-given scales of practice questioned. General planning is one such example. It has enabled flexible movement between the scales and created conditions for learning between different modes of ordering. The farmers' engagement in their local environment as well as with the long networks of policy has allowed them to identify themselves as knowledgeable actors in areas where claims based on local understanding in many respects outweigh the more universal claims of other actors, such as the environmental authorities. Despite this potential for rescaling and empowerment, the room of manoeuvre allowed for farmers and nature is rather limited. The general planning still takes place in the strict institutional setting of agri-environmental schemes.

### The fixed scalar form

The implementation of the Finnish agri-environmental policy has taken a fixed scalar form. According to the results of this study, the collaborative practice that has developed out of co-operation between the agricultural and environmental sectors is critical for understanding the dynamic evolution of the agri-environmental policy in Finland. In the analysis I have shown how this collaborative practice first contributed to policy learning, but as a consequence of repetitive cycles of practice, has become a congealing force. Treatment of governmental technologies as active elements in the policy practices has made these repetitive cycles visible. Within implementation practice, the agricultural sector has taken ownership of the GPS, which emphasises the welfare effects of the policy on a national scale; while the more localised SPS measures are left for the environmental sector. The opening up of implementation practices has rendered visible how the vertical scales of the policy are enacted by the tools, tasks, expertise and knowledges as divided

within the horizontal network of governance. This tight association between the vertical scales and horizontal networks of the policy has led to a hardening of conventional categories and fixed actor positions. This association brings a strong rigid element to the policy practice. The rigid element is a direct effect of the past networks. It may also constrain the subsequent evolution of policy and imply a situation where change is only incremental.

This kind of rigid practice tends to demarcate the problems and solutions within the system, producing a rather technocratic understanding of agri-environmental management. Policy learning takes place on a scale of detailed scheme conditions – and the inner stability of the collaborative practice is strengthened. The alternatives are demarcated as 'others'. Shape and given constancy are held as a result of the discontinuities of conjoined alterity. According to the results, currently, the local scale, represented by farmers, their fields and varying environmental conditions, is actively constructed as 'other' within the network of agri-environmental governance. Nature is allowed to speak only quietly with a standardised voice. Also the farmers' voices, which claim for better incorporation of local experiential knowledge on farming and environmental conditions to the governance of agri-environmental problems, have been bound to stay local. In this form the *space of appearance* (Jokinen–Hiedanpää 2007) created for nature is tightly standardised and controlled. It does not allow for surprises.

The results show that there is an evident need for such policy practices which allow different social worlds to come together and cross the fixed scales of action. I rose general planning as one such example where the space of appearance for nature has been loosened a bit. This example highlights that the conventional political institutions and administrative solutions alone lack the powers to deliver required policy results, novel practices and meanings need to be invented. The national and paddock scales imposed by the GPS and the SPS are not solely capable of solving the problems of agri-environmental governance. Scales need to be crossed and mixed.

## Discussion

I want to emphasise that the scalar form revealed in this paper is only one of the many forms which are or may be taken by the policy (see esp. Law 2004). Furthermore, it is conditioned by my sociological imagination. I hope that the exposed form can help us to understand the policy failures experienced within the Finnish agri-environmental policy, and also elsewhere. I wish the Finnish case can also sensitise the environmental and rural policy analysis to the matter of scale. The Finnish case has highlighted the need to understand better the rigid elements brought by the tight association between the vertical scales and horizontal networks. It has further underlined that we should not only analyse materially heterogeneous networks, rather we should view enactment as a complex association of that which is present and that which is not. These two notions add important aspects to the analysis of how multiple modes of ordering hang together and evolve to co-exist.

In order not to get too fixed with the current forms of policy and research, it is important to search alternative routes of action where the complexities and presence of nature could be taken more seriously in the agri-environmental policies. The ideas of fluid and fire spaces proposed by Law and Mol (2001) can offer us some guidance on the way. Fluid spatiality suggests that varying configurations, rather than representing breakdown or failure, may also strengthen objects. In the practice of agri-environmental policy this would mean that the more flexible the policy becomes, the stronger it can evolve. The notion of fire space, consecutively, suggests that we need to be better equipped to recognise the processes of active construction of otherness as regards both humans and non-human elements. At the moment, the local scale, represented by farmers, their fields and the actors at the local offices, as well as nature, are actively constructed as others within the network of agri-environmental governance. If we wish to proceed with the environmental protection, these human and non-human actors need to be incorporated as active partners to the network of agri-environmental

governance, whilst keeping our eyes open to the new alterities. It is an attentiveness to difference that makes for useful and surprising relations.

## ACKNOWLEDGEMENTS

Pekka Jokinen, Laura Kröger and Jyrki Aakkula deserve my special thanks for developing together our understanding of the Finnish agri-environmental governance. I also wish to thank Yrjö Haila and Helena Valve for guiding me on my path towards articulating complexities. The financial grant from the Academy of Finland (209910) and the Ministry of Agriculture and Forestry (5358/502/2003) made it possible to synthesise the various empirical results. I also thank Susan Heiskanen, who has checked the English of the manuscripts.

## NOTES

- 1 The GPS sets out the basic level for environmentally friendly farming practices; the SPS offers more targeted contracts for environmental protection. When enrolling in the GPS a farmer commits to following the rather detailed terms of agreement on e.g. how to fertilize, how much, and when; how wide a headland is to be left along the ditches and watercourses; how much pesticides can be used and with what kind of machines they can be spread; or how to take care of the landscape and biodiversity. After the first programming period 1995–1999, the GPS was divided into a *general* and an *additional scheme*, in order to increase the variety of measures for farmers to choose from. In the SPS a farmer can get support for e.g. constructing a riparian zone (a 15-meter buffer left uncultivated between the field and a water course) or a wetland; biodiversity or landscape management; building up a controlled drainage system; or effective use of manure.
- 2 The municipal environmental officials do not have a direct role in the governing of agri-

environmental schemes, but may occasionally participate in the planning or marketing of the schemes. Their duties within agri-environmental governance relate more to the administration of the Nitrate Directive and the environmental permit system.

## REFERENCES

- Aakkula, Jyrki–Jokinen, Pekka–Kaljonen, Minna–Kröger, Laura 2006: Maatalouden ympäristöpolitiikan skaalat ja oppiminen. MTT:n selvityksiä 127. Maa- ja elintarviketalouden tutkimuskeskus, Jokioinen.
- Bulkeley, Harriet 2005: Reconfiguring environmental governance: Towards a politics of scales and networks. *Political Geography* 24, 875–902.
- Buller, Henry–Wilson, Geoff A.–Höll, Andreas (eds.) 2000: *Agri-environmental policy in the European Union Countries*. Ashgate Publishing Ltd., Aldershot.
- Brenner, Neil 2001: The Limits to scale? Methodological reflections on scalar structuration. *Progress in Human Geography* 25, 591–614.
- Burgess, Jacquelin–Clark, Judy–Harrison Carolyn M. 2000: Knowledges in action: an actor network analysis of a wetland agri-environment scheme. *Ecological Economics* 35, 119–132.
- Callon, Michael–Law, John 2005: On qualculation, agency and otherness. *Environment and Planning D* 23, 717–733.
- Curry, N.–Winter, Michael 2000: The Transition to Environmental Agriculture in Europe: Learning Processes and Knowledge Networks. *European Planning Studies* 8, 107–121.
- EC, European Commission 2005: *Agri-Environmental Measures: overview on general principles, types of measures, and application*. DG Agriculture and Rural Development Unit G-4, Brussels.
- Ellis, Rebecca–Waterton, Claire 2005: Caught between the cartographic and the ethnographic imagination: the whereabouts of amateurs, professionals and nature in knowing biodiversity. *Environment and Planning D* 23, 673–693.
- Evans, Nick–Morris, Carol–Winter, Michael 2002: Conceptualising agriculture: a critique of post-productivism as the new orthodoxy. *Progress in Human Geography* 26, 313–332.
- Flyvberg, Bengt 2001: *Making Social Science Matter. Why social inquire fails and how it can succeed again*. Cambridge University Press, Cambridge.
- Granberg, Leo 1999: The emergence of welfare state rationality in Finnish agricultural policy. *Sociologia Ruralis* 39, 311–327.
- Gomart, Emily–Hajer, Maarten 2003: Is That Politics? For an Inquire Into Forms In Contemporary Politics. In Joerges, Bernward–Nowotny, Helga (eds.). *Social Studies of Science and Technology: Looking Back Ahead*. Kluwer Academic Publishers, Netherlands. 33–61.
- Haila, Yrjö 2002: Scaling environmental issues: problems and paradoxes. *Landscape and Urban Planning* 61, 56–69.
- Haila, Yrjö–Dyke, Chuck 2006: What to Say About Nature’s “Speech”. In Haila, Y.–Dyke, Chuck (eds.). *How Nature Speaks. The dynamics of the Human Ecological Condition*. Duke University Press, Durham and London. 1–48.
- Hajer, Maarten 1995: *The Politics of Environmental Discourse*. Oxford University Press, Oxford.
- Howitt, Richard 1998: Scale as relation: musical metaphors of geographical scale. *Area* 30, 49–58.
- Jessop, Bob–Brenner, Neil–Jones, Martin 2008: Theorizing sociospatial relations. *Environment and Planning D* 26, 389–401.
- Jokinen, Pekka 1997: *Agricultural Policy Community and the Challenge of Greening. The Case of Finnish Agri-Environmental Policy*. *Environmental Politics* 1, 138–167.
- Jokinen Pekka 2000: Europeanisation and Ecological Modernisation: Agri-Environmental Policy and Practices in Finland. *Environmental Politics* 9, 138–167.
- Jokinen, Ari–Hiedanpää, Juha 2007: Näyttäytymistila luonnonsuojelun toimeenpanon perustana. *Alue & Ympäristö* 1, 14–26.
- Juntti, Meri–Potter, Clive 2002: Interpreting and re-interpreting agri-environmental policy: Communication, trust and knowledge in the implementation process. *Sociologia Ruralis* 42, 215–232.
- Kaljonen, Minna 2002: Ympäristötuen paikallisia sovellutuksia. *Tapaustutkimus Lappajärven*

- valuma-alueelta. *Regional Environment Publications* 285. Länsi-Suomen ympäristökeskus/Suomen ympäristökeskus, Vaasa/Helsinki.
- Kaljonen, Minna 2003: Ympäristöpolitiikkaa pellon laidalla. Tapaustutkimus suojavyöhykesuunnittelun käytännöistä. *Alue & Ympäristö* 2, 33–44.
- Kaljonen, Minna 2006: Co-construction of agency and environmental management. The case of agri-environmental policy implementation at Finnish farms. *Journal of Rural Studies* 22, 205–216.
- Kaljonen, Minna 2008: Bringing back the lost biotopes. The practice of regional biodiversity management planning in Finland. *Journal of Environmental Policy and Planning* 10, 113–132.
- Koikkalainen, Kauko–Lankoski, Jussi 2004: Maatalouden ympäristötuen taloudellinen merkitys tukialueittain ja tuotantosuunnittain vuosina 2000 ja 2001. In Turtola, Eila–Lemola, Riitta (eds.). *Maatalouden ympäristötuen seuranta MYTVAS2. Maa- ja elintarviketalous* 59. Maa- ja elintarviketalouden tutkimuskeskus, Jokioinen. 140–157.
- Kröger, Laura 2005: Development of the Finnish Agri-environmental Policy as a Learning Process. *European Environment* 15, 13–26.
- Kuussaari, Mikko–Heliölä, Janne–Tiainen, Juha–Helenius, Juha (eds.) 2008: *Maatalouden ympäristötuen merkitys luonnon monimuotoisuudelle ja maisemalle: MYTVAS-loppuraportti 2000–2006. Suomen ympäristö* 4. Suomen ympäristökeskus, Helsinki.
- Latour, Bruno 1988: *The Pasteurisation of France*. Harvard University Press, Cambridge, MA.
- Latour, Bruno 2004: *Politics of Nature. How to Bring the Sciences into Democracy*. Harvard University Press, Cambridge, MA.
- Law, John 1994: *Organising Modernity*. Blackwell Publishers, Oxford.
- Law, John 2004: *After Method. Mess in social science research*. Routledge, London & New York, Routledge.
- Law, John–Mol, Annemarie 2001: Situating technoscience: an inquiry into spatialities. *Environment and Planning D* 19, 609–621.
- Lehtonen, Heikki–Koikkalainen, Kauko–Lankoski, Jussi 2008: Ympäristötuen taloudelliset vaikutukset ja ympäristöohjauskeinojen tehokkuus. In Turtola, Eila–Lemola, Riitta (eds.). *Maatalouden ympäristötuen vaikutukset vesistökuormitukseen, satoon ja viljelyn talouteen vuosina 2000–2006. Maa- ja elintarviketalous* 120. Maa- ja elintarviketalouden tutkimuskeskus, Jokioinen. 77–87.
- Lowe, Philip–Buller, Henry–Ward, Neil 2002: Setting the Next Agenda? British and French Approaches to the second pillar of the Common Agricultural Policy. *Journal of Rural Studies* 18, 1–17.
- MAF, Ministry of Agriculture and Forestry 1994: *Ehdotus Suomen maatalouden ympäristötuki-ohjelmaksi 1995–1999. Työryhmämuistio* 4. Maa- ja metsätalousministeriö, Helsinki.
- MAF, 1999: *Horizontaalinen maaseudun kehittämissuunnitelma. Maa- ja metsätalousministeriö*, Helsinki.
- MAF, 2004: *Horizontaalisen maaseudun kehittämissuunnitelman väliarviointi. Maa- ja metsätalousministeriö*, Helsinki.
- MAF, 2007: *Manner-Suomen maaseudun kehittämissuunnitelma 2007–2013. Maa- ja metsätalousministeriö*, Helsinki.
- MoE, Ministry of Environment 1992: *Ehdotus maaseudun ympäristöohjelmaksi. Maaseudun ympäristöohjelmatyöryhmän muistio* 68. Ympäristöministeriö, Helsinki.
- Mol, Annemarie 2002: *The Body Multiple: Ontology in Medical Practice*. Duke UP, Durham.
- Morris, Carol 2004: *Networks of agri-environmental implementation: a case study of England's Countryside Stewardship Scheme. Land Use Policy* 21, 177–191.
- Niemi-Iilahti, Anita–Myllymäki, Outi–Mäkinen, Anu 1997: *EU ohjausstrategioiden uudistajana. Taloudelliset ohjauskeinot suomalaisen maatalouden ympäristöpolitiikassa. Vaasan yliopiston julkaisuja, tutkimuksia* 218. Vaasan yliopistopaino, Vaasa.
- Niemi-Iilahti, Anita–Vilkkki, Brita 1995: *Organisaatioiden vuorovaikutus ympäristöpolitiikan toimeenpanossa: maa- ja metsätalouden vesien- suojeletavoitteiden toimeenpano Vaasan läänissä. Vaasan yliopiston julkaisuja, tutkimuksia* 195. Vaasan yliopistopaino, Vaasa.
- Potter, Clive.–Tilzey Mark 2005: *Agricultural policy*

- discourses in the European post-Fordist Transition: neoliberalism, neomercantilism and multifunctionality. *Progress in Human Geography* 29, 581–600.
- Rose, Nicolas–Miller, Peter 1992: Political Power beyond the State: problematics of government. *British Journal of Sociology* 43, 173–205.
- Singleton, Vicky 2005: The promise of public health: vulnerable policy and lazy citizens. *Environment and Planning D* 23, 771–786.
- Soini, Katriina–Tuuri, Hannu 2000: Maatalouden ympäristötukijärjestelmän (1995–1999) toimeenpano. Maatalouden tutkimuskeskuksen julkaisu A 89. Maatalouden tutkimuskeskus, Jokioinen.
- Turtola, Eila–Lemola, Riitta 2008: Maatalouden ympäristötuen vaikutukset vesistökuormitukseen, satoon ja viljelyn talouteen vuosina 2000–2006. Maa- ja elintarviketalous nro. 120. Maa- ja elintarviketalouden tutkimuskeskus, Jokioinen.
- Vaughan, Sarah. 2004: Government as a Failing Operation: Regulating Administrative Conduct 'at a Distance' in Australia. *Sociology* 38, 457–476.
- Wilson, Geoff. A. 2009: The spatiality of multifunctional agriculture: A human geography perspective. *Geoforum* 40, 269–280.
- Wilson, Geoff. A.–Juntti, M. (eds.) 2005: *Unravelling Desertification: Policies and Actor Networks in Southern Europe*. Wageningen Academic Publishers, Wageningen.
- Winter, Michael 2000: Strong policy or weak policy? The environmental impact of the 1992 reforms to the CAP arable regime in Great Britain. *Journal of Rural Studies* 16, 47–59.
- Winter, Michael 2006: Rescaling Rurality: Multilevel governance of the agro-food sector. *Political Geography* 25, 735–751.