Endogenous development capital and landscape preservation in Galicia, Spain

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Abstract

This paper explores endogenous development capital that holds the potential to both contribute to landscape conservation and the economic viability of dairy and cattle farming in remote rural areas. We distinguish patterns of coherence on how farmers valorise the natural environment and/or are locked-in in certain development pathways. We classified: (A) farmers who build their farm strategy upon the locally available resource base; (B) farmers who improve the productivity of their land through the input of artificial fertilizers; (C) farmers who use productive cow breeds but have limited access to land; (D) farmers who valorise living in the countryside and look for making a living from farming. This differentiation provides starting points for sustainable development, which includes the viability and continuity of farming in combination with environmental protection and the provision of public goods.

Keywords: Farming styles, landscape preservation, sustainability
Introduction

Although globalisation of food provisioning chains brought benefits for consumers so as year-round availability of food at relatively low prices (Brouwer and Lowe 1998; Murdoch 2000) this came at costs; among its negative effects are climate change, public health and the scarcity and depletion of resources (Lang 2010). The negative effects of the globalisation of food-provisioning chains call for the co-production of a wide range of environmentally sound as well as social inclusive and economic durable approaches to land-use. In a transitional process from solely production oriented land-use patterns to provision of multiple services and functions successful adaptations to environmental and resource vulnerabilities need to be inherently territorially rooted (Wiskerke, 2009). Endogenous development capital evolves when the active engagement in place-related interests and formal levels of organisation is balanced (Mahon et al. 2012) and farmers unfold their practices in such a way that this benefits to the sustainable exploitation of nature. This paper explores endogenous development capital that holds the potential to both contribute to landscape preservation and the economic viability of farming in remote rural areas. With the aim to exhibit how seeds for a sustainability transition anchor in endogenous development capital it explores farmers’ perceptions on how to exploit nature among Galician dairy farmers and beef cattle breeders.

Methods

In order to identify the perceptions and attitudes among dairy farmers and beef cattle breeders in Galicia we applied methodology in the tradition of farming style research. Farming styles entail mutually interdependent levels: the level of notions or ideas about how to farm, the farming practices itself, and the network (the market, technology, and administrative and policy frameworks) in which the farm is embedded (Van der Ploeg 2003, p. 111). This implies that a farm practice is an expression of the strategic actions of an actor, and influenced by his or her cultural believes, the farm develops in a certain direction (Dominguez 2007; Swagemakers et al. 2012). From this point of view we explore how dairy farmers and beef cattle breeders perceive and exploit nature, which we have limited to farmers already involved in some form of farm diversification. Our objective was to distinguish farm development strategies / trajectories in which farmers differently valorise the natural environment and/or are locked-in in certain development pathways.
A first stage of the field research consisted of interviews with key-informants, the participation in a regional event on the future of the rural areas in Galicia, and additional desk study. This provided us as researchers with knowledge for developing statements that we tested, and in a second stage of the field research have used in the application of Q-methodology (Brodt et al. 2006; Onofa Torres 2016). In this second stage participated 24 farmers of which 21 full-time farmers. Among the diversification activities at the farms were horticulture production (onions, tomatoes), and beef or cheese production in combination with short food chains. In some cases farmers sold their on-farm produce directly to consumers, in other cases they sold specialty products through a cooperative.

Results

The application of Q-methodology (i.e. the classification of farmers accordingly to the differentiation in the scores they provided to the statements) resulted in the distinction of four patterns of coherence on how dairy farmers and beef cattle breeders valorise the natural environment, and perceive and exploit the natural resource base in different ways.

Farmers belonging to group A express most clearly interrelations with the natural environment, and build their farm strategy upon the locally available resource base. They combine productive farm activities (milk and beef production) with values provided by the natural environment both in terms of marketing food products and agrotourism activities. Farmers belonging to group B represent relatively intensive farmers who express a limitation in terms of the productivity of the land, and the need for the input of artificial fertilizers to improve the productivity of their grassland. Farmers belonging to group C represent producers that use productive cow breeds but face a limited access to land, and do not focus on cost reduction (fertilizers, fodder input, medication) and rent land either at distance or from neighbours. Farmers belonging to group D include farmers who valorise living in the countryside and look for making a living from farming. They often apply a cost reduction strategy in combination with a less intensive farm practice: make use of a less productive but more robust animal breeds. Whilst in other groups the farmers often ran individual households farmers belonging to group D mostly lived in a highly valorised family setting.
When it comes to landscape preservation farmers in all groups recognise the aesthetic and biodiversity values in the Galician landscape. All farmers in the sample recognise the elements in the traditional landscape but of the 24 farmers those that belong to group A provided the most detailed description of the values. Next to issues so as soil fertility and animal biodiversity farmers frequently mentioned the maintenance of traditional houses and buildings, stone wall structures, and hedgerow landscapes in relation to food production. Table 1 provides some illustrations to how farm practices in the sample relate to landscape preservation.

Table 1. Interrelations between farming styles and landscape preservation

Quote 1.1
'The Vianesa breed, an autochthonous cow breed PS] survives better in our conditions: they do not get sick and do not need much attention nor involve extra work.' (BC22)

Quote 1.2:
'Hedges and trees delimit the plots and restrict the access of the cattle to other areas. They function as natural fences while they create a microclimate, and protect the cattle from the wind.' (DC9)

Quote 1.3
'I used to take the cattle to Las Brañas [distanced located pastures at an altitude between 1,000 to 1,300 metres where cattle stays from May to September AOT] but I consider it too far and too much time consuming so I now rent land nearby my farm.

In the interviews farmers expressed the balance between land and animals to be a major factor in the viability of their farm business. Cattle breeders expressed to benefit from such a change in land-use whilst dairy farmers spoke about the reduction of the farm size in combination with the creation of value added to primary production through adapting a diversification strategy (cheese production, agro-tourism), in attempt to turn nature’s functions into societal value.

Conclusions

The differentiation in terms of farming styles provides starting points for sustainable development, which includes environmental protection and the provision of public goods.
The results of the research can be of use to representatives of public institutions and administrations on how to organise institutional support to farmers. The potential of endogenous development capital can be further untapped through European supportive policy frameworks and funding schemes, which increasingly emphasise and enhance the preservation of natural and cultural resources in marginalised rural areas.

Farmers can respond actively to the research through discussing the results, exchange knowledge on different ways of farm innovation, and adopt an approach to land-use in which they regenerate a cultural sense of community and place that is grounded in their active involvement in landscape preservation and nature conservation.

References


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