Sustainability | Individual communication

IC - (21113) - FARMERS' DRAGONS - PSYCHOLOGICAL BARRIERS TO CLIMATE CHANGE MITIGATION IN AGRICULTURE

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Background and objectives

Agriculture contributes to 20% of total greenhouse gas emissions in the EU if land use, land use change and forestry (LULUCF) sector emissions are included. While mitigation targets for reducing emissions have been set for many sectors long time ago, agricultural sector has been lagging behind. Now, binding emission reduction targets for agriculture have been set in many European countries. Reducing emissions in agriculture is possible, but still the emission levels have stagnated. To understand what hinders farmers to engage in climate smart behavior the concept of "dragons of inaction" could be insightful. The concept describes psychological barriers (e.g., lack of knowledge, conflicting goals) and has been applied in other domains, but not on specific groups (i.e., farmers) or qualitatively. So, which psychological barriers do farmers spontaneously mention when asked about climate change and agriculture?

Process and methods (for empirical research)

4401 Finnish farmers responded to "comments on the impact of climate change on agriculture" in an open-ended question. The answers were coded based on the dragons of inaction psychological barriers. The coded data was connected to the respondents' background variables and other structured climate change related responses. The connections within the psychological barriers and between other variables was studied.

Main results (or main arguments in the case of critical reviews)

Although farmers believe that climate change is happening and describe changes in agricultural practices, weather etc. farmers also brought forth psychological barriers. Transferring the responsibility of climate action to others and denying the possibilities to influence to climate change were the most stated barriers. Interestingly, some barriers are mentioned regardless of stated willingness to act. Some dragons of inaction seem to be less important in agriculture, but some additional barriers and connections to certain farmer groups could be identified.

Implications for research and practice/policy | Importance and originality of the contribution

The results can help governments to design specific interventions that address psychological barriers in agriculture and help to reach mitigation targets for agriculture.

Palavras-chave: climate change, agriculture, barriers, mitigation, psychology