Transdisciplinarity in Practice: Experiences in the 'FarmPath' project

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Overview



- The FarmPath Project
- Transdisciplinary Research
- Applying transdisciplinary research in FarmPath
 - Balance of power and obligations
 - Integrating lay, professional and academic knowledges
 - Documenting, assessing and publishing transdisciplinary research
- Future directions
- The emerging European Commission research context

The FarmPath project



"Farming Transitions": Pathways Towards Regional Sustainability of Agriculture in Europe

- The overall goal of FarmPath is to identify and assess future transition pathways towards regional sustainability of agriculture in Europe, and the social and technological innovation needs required to initiate and progress along these pathways.
- 3 year, €2 000 000 project, 75% funded through the European Commission
- 9 consortium members, led by the James Hutton Institute

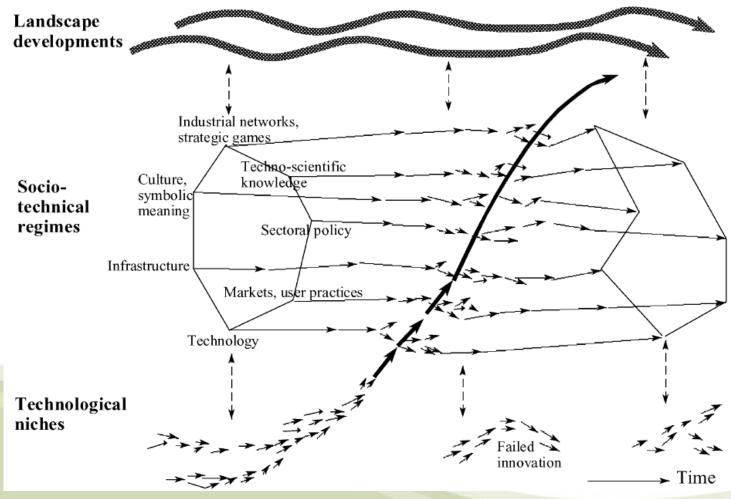
The FarmPath Concept



- In FarmPath, we propose that increasing **sustainability** of agriculture is best addressed by enabling flexible combinations of farming models, which vary to reflect the specific opportunity sets embedded in **regional** culture, agricultural capability, diversification potential, ecology and historic ownership and governance structures.
- Using transition management and transdisciplinary research

FarmPath: emphasis on regime change





(Source: Geels, 2002:1263)

Key FarmPath Outputs



- Conceptual framework integrating transition management theory with literature on agrarian change
- study of 18-20 regional sustainability initiatives
- Co-construction of 14 regional sustainability scenarios
- Subfocus on issues affecting young farmers and new entrants
- Production of 'regional sustainability of agriculture handbook' and academic book

Transdisciplinary Research



- Multiple definitions, four key features:
 - the integration of disciplinary paradigms
 - the use of participatory methods
 - co-production of knowledge with non-academics
 - the application to real-life problems (i.e. not curiositydriven research).

From Mode 1 to Mode 2 Science



■ Mode 1:

- Pure: not context-dependent
- Disciplinary: theory-driven, experimental
- Primacy of scientists: expert-led, hierarchical
- Sciences develops, results are transferred

■ Mode 2:

- Applied, problem-centered, context-dependent
- Socially-distributed knowledge, dialogic process
- Network-embedded
- Build a learning partnerships

Gibbons et al., 2001

Transdisciplinary Research in FarmPath



Researchers conducting research on transitions

Practitioners
engaged in complex
transition process

Transdisciplinary process

- Joint pre-selection of case studies
- Joint process of research
- Joint analysis
- Joint definition of vision (regional transition to sust. ag.)

Scientific output: Insights into patterns and processes of transition towards sustainability

Societal effect:

Change in knowledge and decision-making capacity, robust future development orientation



Transdisciplinary Research in FarmPath



- Key issues to date in FarmPath
 - ► Balance of power and obligations between academics and stakeholders in formally funded research projects
 - ► The practical realities of integrating lay, professional and academic knowledges and discourses
 - ► Documenting, assessing and publishing transdisciplinary research

The balance of power and obligations



- Between researchers and lay participants
 - Project design, reporting, funding
 - What we've done:
 - structural increase in 'participation' over the course of the project
 - → Flexible contributions
 - ★ Enabling research questions of specific interest to stakeholders to be addressed (win/win situation)

The balance of power and obligations



- For researchers
 - Transdisciplinary research 'skills'
 - Cultural research practices
 - What we've done:
 - ★ Formal training
 - → Option to hire/designate facilitators
 - ★ Embedding in consortium meetings
 - Flexible protocols for stakeholder interactions (draft agendas, questions to ask etc)

Integrating lay, professional and academic knowledges



- First meeting: co-construction or knowledge elicitation?
 - What we did:
 - → Participatory process facilitated by an independent facilitator
 - → Observation by designated researcher
 - → Independent feedback from all participants
 - What we found:
 - ★ Wealth of stakeholder knowledge of regional 'initiatives'
 - → Imbalance in participation

Documenting, Assessing and Publishing Transdisciplinary Research



- Studies not typically found in rural sociology journals
 - Journals: Futures, Ecological Economics, Landscape and Urban Planning
- What is 'quality' transdisciplinary research?
 - Multiple emerging frameworks
 - Conferences

Future Directions



- Learning to do by doing: ongoing data collection and monitoring of the transdisciplinary research process
 - With the consortium team
 - With the Scottish national stakeholder partnership group
- Future interactions: contested and valued knowledge

The Emerging EC Research Trajectory



- Focus on innovation and system change going beyond niche innovations towards regime change
 - Emphasis on how to support and encourage innovation, and to ensure these innovations spread
- Move towards transdisciplinary and 'applied' research approaches
 - Emphasis on more on-farm research, and co-construction of research to ensure applicability and dissemination of findings
 - Renewed interest in agricultural knowledge and innovation systems –
 widespread belief that these are inadequate in Europe at present
- Sustainability as environmental, economic and regional

References



 Geels, Frank. (2002). Technological transitions as evolutionary reconfiguration processes: A multi-level perspective and a case-study. Research Policy 31(8-9): 1257-1274.