Magda Smink PhD student at Innovation Studies June 2014 m.m.smink@uu.nl

Supervisors: Marko Hekkert, Simona Negro, Eva Niesten



Introduction

Niche-regime interaction remains understudied.

Regime actors are supposed to have opposite interests from niche actors and therefore engage in defensive behavior.

However, both types of actors not only have different interests, but also operate on the basis of different values, goals, and assumptions.

We argue that this mismatch of ways of operating and thinking is an important feature of transition processes, especially in the phase of scaling-up.

Case: Biomethane injection into

the natural gas grid

Before, all Dutch gas flowed from the Groningen-field to the customer. This monopoly is now broken by downstream injection of biomethane by new actors.

Biomethane is biogas upgraded to natural gas specifications and is produced by actors from the waste, food processing, and agricultural sector. They need to meet the network operator's requirements for gas quality.

A government subsidy scheme granted producers 1 bln euro for biomethane injection in 2011, creating 'structural overlap' between biomethane producers and network operators.

Theory

Institutional logics are 'the socially constructed, historical patterns of material practices, assumptions, values, beliefs, and rules by which individuals produce and reproduce their material subsistence, organize time and space, and provide meaning to their social reality' (Thornton & Ocasio, 1999). In short: practices and underlying belief system.

Theory identifies six ideal-type institutional logics which are the building blocks for sector-specific logics: namely family, religion, state, market, profession, and corporation (Thornton et al., 2012).

Hence, in this study we go beyond mere interests and go deeper into:

- the 'institutional logics' behind the behavior of the different actors

- how actors with mismatching institutional logics interact

However, a uniform and final institutional framework is lacking for gas quality, liability issues, and cost allocation.

The mismatch of institutional logics between the actors seriously complicates the implementation of the innovation.

RQ: What is the role of institutional logics in the development of biomethane injection?

Structural overlap occurs when previously unrelated actors 'are forced into association' (Thornton & Ocasio, 2008). Thus, contradictions in logics 'form the bases of political conflicts' (Thornton & Ocasio, 1999).

Boundary bridging activities can lessen the resulting deadlock by 'increasing [actors'] awareness of alternatives' (Greenwood & Suddaby, 2006). To this end, boundary bridgers consciously translate between the different logics.

How mismatching institutional logics frustrate regime change

The Dutch case of biomethane injection into the grid



Government subsidy scheme creates forced association between

biomethane producers and network

operators, while institutional

framework is incomplete.



- <u>Producers'</u> <u>'entrepreneur logic':</u>
- Goals:
- Efficiency & profit
- Regional development
- Means:
- Quick & pragmatic decisions



Diverging institutional logics cause friction and complicate decisionmaking.



Intermediary actors engage in 'boundary bridging': they translate between the different logics and thus create more mutual understanding and help to see previously unexplored opportunities.

Boundary bridging happens both

• <u>Network operators'</u> <u>'hierarchy logic':</u>

• Goal:

• Safety & reliability

• Means:

- Codes & norms
- Hierarchical
- Large-scale
- Order & control





between and within organizations.

Method

Database of over 250 news articles related to biomethane injection during the period 2003-2012.

Literature search of policy documents, annual reports and research reports. 14 Semi-structured expert interviews, coded in NVivo.



Conclusion

The institutional logics of producers and network operators are very different and largely incompatible. Constructive cooperation is very difficult when both ends and means differ.

Therefore, boundary bridging activities are important. Intermediary actors translate between the different logics, enabling communication, and encouraging actors to consider alternative options. However, contradictory logics might never be completely solved.

Institutional logics mismatch and boundary bridging are expected to be increasingly relevant as the up-scaling of innovation often connects previously unrelated actors.

