New Institutional Economics inputs for Institutional Resource Regime: propositions on extent and coherence interactions

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Reference


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Propositions on extent and coherence interactions

Policy laboratory on the commons workshop, February 10th, 2015,
Crêt-Bérard
INTRODUCTION

- Starting point
  - Observation of the paradox of the UWSEs modernization (Bolognesi 2013, 2014)
  - More norms but more unexpected effects

- Assumptions
  - Extent and coherence are linked
  - Extension reduces coherence

- Proposition
  - NIE concepts could shed light on and explain these interactions (transaction costs, feasibility, etc.)
**Outline**

1. Taking stock on IRR and NIE

2. Exploratory overview: a negative correlation between extension and coherence

3. Refinements: when, how, why?

4. Discussion
PART I

TAKING STOCK ON IRR AND NIE

Extent, coherence & feasibility, transaction costs
IRR CONCEPTS: COHERENCE & EXTENT (1/2)

The case (Urban water cycle)
- Multiple users (households, industries, administration, etc.)
- Multiple uses (WSS)

Evolution (Bolognesi 2014)
- 3 generations
- Complexity
- Disputes

Regulation through (IRR):
- policy design (WFD, public procurement, etc.)
- property rights (Direct management, PPP, etc.)

Coherence = quality of institutions

Extent = Σ of formal institutions
IRR CONCEPTS: COHERENCE & EXTENT (2/2)

H1: integration ➔ sustainability
• H1a: extent
• H1b: coherence
(Gerber et al. 2009: 807)
NIE CONCEPTS

- **Transaction costs** (Williamson 1985) \(\approx\) frictions \(\rightarrow\) adaptation of price cap in UK

- **Incompleteness & imperfection** (Barzel 1982) \(\rightarrow\) PPP and incentives in utilities renewal

- **Feasibility** (Williamson 2000): fitting between micro & macro institutions \(\rightarrow\) common law and contracts (La Porta et al. 1998)

- **Bundle of rights** (De Alessi 1990): property sharing (identity and allocation) \(\rightarrow\) \(\Sigma\) of contracts & deintegration; corporatization
PART II

EXPLORATORY OVERVIEW

A negative correlation between extension and coherence
**LINKING EXPANSION AND COHERENCE**

- **Feasibility & governance costs**
  - Interaction between institutions: local water prices and WFD
  - Inflation of norms on drinking water and production costs
  - Enforcement: in France 36 000 WSS, strong informational asymmetries → toward regionalization?

- **Transaction costs**
  - Renegotiations in PPP
  - Contract terms, long term goals and opportunism: UK vs. Germany
Figure 7. Les structures tarifaires de l’eau pour les 429 communes enquêtées

WATER TARIFFS IN FRANCE, 2007
(MONTGINOUL 2007:45)
PART III

REFINEMENTS

When, how, why?
INSTITUTIONS ARE NOT EQUIVALENT

4 modes of governance (ex = UK)
- M1: incentive \((\text{price-cap})\)
- M2: ex post readjustment by public policies \((\text{limitation of profits})\)
- M3: redefinition of formal property institution \((\text{water as a common good})\)
- M4: redefinition of the structure of property-rights distribution \((\text{privatization})\)

2 dynamics of extent
- Regulatory measures (law and public policies)
- Auto-organization (bilateral contracts)
# The Dynamics of Extent

<table>
<thead>
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NON-LINEAR RELATION BETWEEN EXTENT AND COHERENCE

If institutions are different, so are TC and GC:

- H1: Impact of extent on coherence might change

- H2: A specific sequence of IRRs design, which minimizes TC through time, exists.
**The Logics**

- If, each IRR got a specific TC structure
- If, TC interact over the time
- Knowing that: Complex system $\Rightarrow$ thresholds

Then 2 cases:

- **Case 1:** $TC_0 \times TC_1 < TC_0 + TC_1$
  - Complementarities; $\Rightarrow$ coherence
- **Case 2:** $TC_0 \times TC_1 > TC_0 + TC_1$
  - Misfit; $\Leftarrow$ coherence
A need for a new appraisal of TC

- Transversal TC vs Sequential TC
  - Occurrence: ex ante, ex post
  - Perspective: dynamic, static
  - Nature: institutional, technological, organizational
  - Scope: generic, specific

- Crossing transversal TC with
  - IRR’s modes of governance (M1,2,3,4)
  - Source of extension (regulatory, auto-organization)
**PROPOSITIONS**

1. **Expansion** \( \Rightarrow \text{sustainability potential} \)
   
   If coordination costs \( t+1 < \text{conflict costs } t_0 \).

2. **Because of different intentionality**, gains of extension could be unperceived in case of a strong preference for the present \( \Rightarrow \Rightarrow \) coherence

3. **For regime coherence to increase its sustainability potential**, actors must accept the development mode underpinned by the norms.
**CONDITIONS OF VALIDITY**

1. Enlarging the number of stakeholders with a voice

2. Sustainable development minimizes transaction costs (Bullock & Collier 2011)

3. A leader and/or compelling ideas should emerge (Ostrom & Janssen 2004; Bréthaut 2013 → Crans-Montana)

4. Adjustments should be reasonably swift so that regulation of the uses always responds to manifest problems with collective action (Krimmer 2010 → Munich)
PART IV

DISCUSSION
DISCUSSION

- In-depth investigation of coherence
  - Factors and stressors
  - Appraisal and metrics

- Redefinition of transaction costs: relevance and coherence

- Assessing power: political transaction costs
NEW INSTITUTIONAL ECONOMICS INPUTS FOR INSTITUTIONAL RESOURCE REGIME

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- Control over the economic activity of SESs | Conditions established for coordination other than by fiat |
| **Intentionality** | Increase SES sustainability potential | Secure proper performance of a transaction in isolation |
| **Actors** | - Public centres of decision  
- Regulatory agency | - Private actors  
- Stakeholders in resource-related transactions |
| **Operating mechanisms** | - Framing technical standards  
- Framing procedural standards  
- Top-down governance | - Drafting rights of property  
- Contractual coordination  
- Bottom-up governance |
| **Relevant regulatory modes** | - Public policy  
- Legislation  
- Public law | - Modification of the structure of property rights  
- Economic and social incentives |
| **Source of institutional polycentrism** | - Institutional environment  
- Legal institutional structure | - Organizational institutional structure  
- Markets |
| **Impact on extent** | Absolute extent: more norms | Relative extent: use implies existence of specific norms |
| **Examples** | - Regulations on urban waste water treatment (Directive 91/271/EEC)  
- Procurement procedures (Directive 2004/17/EC) | - Share-out of liability and ownership in a contract on the supply of UWS  
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## Transaction Costs: Governance Tools and Expansion

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The Urban Water System