Governance for Urban Sustainability

What it takes to bring nature back to the city?

Lessons from Rotterdam

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What it takes to bring nature back to the city of Rotterdam?
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1. Knowledge co-production to elucidate the dynamics at play
   - *Streamlining policy implementation is not the ‘norm’*

2. Shifting of actor roles & relations to deal with new needs
   - *Synergies and tensions to navigate rather than ‘(re)solve’*

3. Experimentation that integrates different policy goals
   - *Innovations and transformations also happen outside plans*
Transition Governance

- **Processes to enable progressive transformations:**
  incremental change builds progressively to fundamental shifts

- **Interventions that establish a positive path-dependency:**
  short-term and long-term actions are connected and contribute to the roll-out of deliberate strategic action for sustainability

- **Set-up and learn from experimentation:**
  governance, social and technological experimentation as situated learning experiences catalysing transition agendas & pathways

Frantzeskaki et al 2012; Loorbach and Frantzeskaki 2015
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1. Knowledge co-production to elucidate the dynamics at play
Policy-Science Knowledge Co-Production

In-person Interviews (2011-2012) (n=37), Transition Arenas (2013) (n=4)(p=20), Focus Groups (2013-2014) (n=3) (p=15), Validation interviews (2014) (n=5)

- Sustainability officers
- Urban Planning officers
- Ecology officers
- Urban Agriculture Initiatives
- Urban innovation NGOs
- Architecture consultants
- Planning researchers
- Environmental science and policy researchers

Planners (implementation)
Policy advisors
Policy makers

People who make green infrastructure in the city (do-ers)

Ideas’ pollinators
Science-policy brokers
Policy-community knowledge co-production

NGOs greening roofs and work on public awareness
Urban agriculture initiatives
Neighbourhoods taking up greening

Motives and Drivers of Action: Creation of sense of place and political empowerment
Profiles of park users based on their nature-perception, rather than demographic data, visiting frequency, or distance of their home to the park (proximity profile), can inform urban planning projects on priorities for conservation, restoration and development of urban green areas.

Citizens’ preferences of urban green
(Buchel & Frantzeskaki, 2015)

Q methodology
Quantitative narrative assessment on perceptions of urban nature by users of urban parks
N=39 Research period: January-February 2013
In-situ, in-person

‘love of nature’
‘recreation & connection’
‘social setting & relaxation’
Knowledge co-production elucidates dynamics at play

Policy-science: elucidates tensions and new meanings of tensions
Policy-science-community: motives, urgency for action and blind-spots of policy

- current strategy of **densification (may) limit opportunities for greening** in the inner city; space for experimenting may be freed up in the periphery of the city
- **need for planning guidelines** about designation areas for greening
- **need for new ways to engage with citizens** and ensure participation in planning
- **no strategy on how to scale-up** greening pilots in other locations

Why to co-produce knowledge? policy adaptive cycles have their own dynamics & windows for change not always in tune with science and community dynamics
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5 strategies

1. Re-inventing delta technology
2. Volume & Value
3. Crossing borders
4. Floating gentrification
5. Sustainable mobility

Long term: perspective 2040
Mid term: course 2025
Short term: action 2015

Stadshavens Rotterdam: 1600 ha
- Neo-corporatist processes to regenerate the City Ports area failed
- Sustainability and urban stewardship ‘expressed’ as entangled

Public-private partnership with a facilitative role on realising a sustainability vision and enables the existence of transition initiatives
Transformative Agency transforming roles, expectations and urban governance

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<th>FORMS OF TRANSFORMATIVE AGENCY</th>
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| Action-oriented                | Transition Initiatives  
Dakakkers  
Uit je eigen stad | Partnerships  
Floating Pavilion  
Clean Tech Delta |
| Process-oriented               | Intermediate Organisations  
Stadhavens Rottedam | Transition arena  
Urban metabolism working group |
SYNERGIES

Creating Social Capital for Transformation

Establishing Governance Synergies
  Stretching the role of governing actors

Channeling Innovation

Activating Resource Synergies

TRANSFORMATIVE AGENCY

SYNERGIES

TENSIONS

Exclusivity
Openness
Temporality
Mission-blindness
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3. Experimentation that integrates different policy goals
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     - *Green Roofs (emergent)*
     - *Greening of River Banks (driven and mediated)*
     - *Urban Agriculture (emergent)*
Greenroof of the Milieu Center, Rotterdam
First greenroof of the city
‘Learn from us, volunteer your time to garden with us’
Learn more: @Dakakkers
Urban Cooling
(climate change agenda goal)

Greenification
(urban sustainability agenda goal)
Greening of the river banks

Boompjeskade pilot location
Water retention  
(water strategy – living with water)  

Greenification  
(urban sustainability agenda goal)
Urban agriculture initiative taking up vacant lots in Marconistrip in Rotterdam
Food & the City

Stimulating urban agriculture in and around Rotterdam

February 2012
R'damse Oogst Festival

17 & 18 September 2010

Heemraadsplein Rotterdam

Urban agriculture: green+initiative+food
Contribution of urban agriculture to the Rotterdam municipality’s policy objectives (1)

The figure shows the Rotterdam policy objectives that are connected with urban agriculture, based on the sequence people-planet-profit. They are indicated within three circles, representing the aspects social, economy, and ecology. The policy objectives of food strategies in other metropolitan areas are indicated (in red) outside the circles.

Source: Rotterdam Municipality, Food and the City, 2012.
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How much information is enough? Mapping transition initiatives

2 December 2014, 15.30 – 17.30, Aula Magna

Sustainable alternatives are out there, from community gardens through energy cooperatives to local currencies.

The question is how do we find them and how can we use this knowledge to accelerate urban sustainability transitions.

Come and share your experience with us!
Transition Talk #2

15.30 – 15.45 Welcome and introduction

Taking the pulse: mapping transition initiatives in the ARTS regions

Adrien Labaeye, TransforMap.co, Berlin, Germany
Davide Ciccarese, Nostrale, Milan, Italy
Marta Corumbolo, DESIS, Milan, Italy

16.45 – 17.15 Working groups

Participants will discuss what kind of information is needed to accelerate sustainability transition in their community and on the European level.
Rotterdam
the transition to urban resilience

https://www.youtube.com/watch?v=RYypZq1rW9A
Interested in finding out more?


Lets keep transitioning!
Contact me for questions, feedback and for collaborating for sustainability transitions:
frantzeskaki@drift.eur.nl
Interested in greening initiatives in cities and what they mean for urban environmental governance: theurbesproject.org

Our OPEN ACCESS special issue in AMBIO: http://link.springer.com/journal/13280/43/4?wt_mc=alerts.TOCjournals

Interested in transition initiatives in cities? Check our research project: www.acceleratingtransitions.eu

Interested in transition management? Check out our MUSIC project and the transition management manual: http://www.drift.eur.nl/?p=2796
Current systems of provision are complex, interconnected and difficult to steer away from unsustainability (Frantzeskaki and Loorbach 2010; Meadowcroft 2009)

Facing the social, environmental and economic crises, incremental solutions or quick-fixes are not enough to steer clear from them. (Kern and Smith, 2009; Brown et al 2013; Nevens Frantzeskaki et al 2013)

Fundamental change in the way a societal need is fulfilled; transformative change in structures, cultures and practices (Rotmans et al 2001; Frantzeskaki and De Haan 2010; Frantzeskaki et al 2012)
Lessons for governance interventions:

• **Strong vision:** The sustainability vision and sustainability agenda created a *symbolic leadership context* that is a success factor for partnerships to thrive. The vision acted as a flagship inspiring and committing the different actors to its implementation.

• **New role for local government:** Rotterdam municipality succeeded in *facilitating collaborative arrangements without losing its government role*. Its new dual role is an example of successful reflexive governance: steering and orienting when partnerships exhibit capacity for delivering and regulating and directing when strategic planning is required.

• **Quick-Response:** The *quick reflexes of different agencies to take up action* were another success factor. In the aftermath of the vision, different actors acted upon the vision and very quickly formed partnerships to realise the vision.