MECHANISMEN UND GENERATIVE Kausalität: Mechanismen in theoriebasierten Evaluierungen

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1. WAS IST EIN MECHANISMUS?

- Backgrounds of the study of mechanisms
- What ‘are’ mechanisms
- Examples of mechanisms
- Types of mechanisms
- CMO & lookalikes
SOME BACKGROUNDS

- 17th century realist philosophy
- Scorbutic
- Robert K Merton 30s’
- Jon Elster *Nuts & Bolts, aka Cogs & Wheels*
- Mario Bunge
- James Coleman
- Mayntz & others
- Pawson & Tilley .... (and friends)
- ANALYTICAL SOCIOLOGY...
EVALUATORS & MECHANISMS: NOT A LONELY WORLD ....

OTHERS

ROBERT K. MERTON
ON THE SHOULders OF GIANTS
A SHANDEAN POSTSCRIPT • THE POST-ITALIANATE EDITION
WITH A FOREWORD BY UMBERTO ECO
AN AFTERWORD BY DENIS DONOGHUE
AND A PREFACE AND POSTFACE BY THE AUTHOR
Mechanisms are drivers/engines, aka “cogs and wheels” that can be triggered by policy interventions and may help realize the policy goals.

Mechanisms are behind many societal and legal arrangements, like policies, contracts, treaties etc.

**Examples:**
satisficing; bounded will power, reinforcement, social norms and social capital; the shadow of the future, crowding out,
a bunch of cognitive and socio-neurosciences mechanisms like the fundamental attribution error;
fight or flight, the slippery slope;
blame avoidance; performance feedback; the ‘bandwagon effect’ etc
CMO / IMO

Diagram with ellipses and arrows:

- **C** "Context" of interventions
- **M** "Mechanisms"
- **O** Patterns of (un)intended "outcomes" consequences from activation of mechanisms
DISCUSSION STATEMENTS ON RELATIONSHIPS BETWEEN CONTEXTS & MECHANISMS

• position 1: Contexts are more important than M’s

• position 2: Some contexts are more important than (some) others

• position 3: demi-regularities & path dependencies tell us that contexts are not that important. Contexts, despite the claims of being different (all the time) usually are not.

• Position 4: the only thing that counts are bio-social-psycho generative mechanisms; “der Rest spielt kaum eine Rolle“.
TYPES OF MECHANISMS

THREE TYPES OF MECHANISMS:

MACRO $\rightarrow_{\text{micro}}$ mechanisms or: situational mechanisms

Micro $\rightarrow$ Micro Mechanisms or: action-formation mechanisms

Micro $\rightarrow$ MACRO mechanisms or transformational mechanisms
TYPES OF MECHANISMS

- Situational mechanisms
- Transformational mechanisms
- Action-formation mechanisms
EXAMPLES OF SITUATIONAL MECHANISMS:

The definition-of-the-situation (‘if men define situations as real they are real in their consequences’);

the opportunity structure[s] a situation is characterized by (such as a vacancy chain, the openness of communities for burglars or the Easterlin mechanism [regarding the size of birth cohorts])

The ‘given’ level of education in communities
EXAMPLES OF ACTION-FORMATION MECHANISMS:

• Cognitive dissonance
• Social capital
• Self-fulfilling prophecy;
• Relative deprivation
• Income preference drift
• Fight or flight
• Bounded will power (to know that acting X is ‘dangerous’ but nevertheless do it)
• Different types of learning behaviour (like vicarious learning)
• Crowding out
• Prisoner dilemma (tit for that)
EXAMPLES OF TRANSFORMATIONAL MECHANISMS:

• Markets (to ‘transfer’ individual options to larger entities)

• tipping points/ cascading/ slippery slope

• social network effects

• veto power
Applying Coleman’s boat model:
Naming & shaming policy of the policy to prevent reoffending crimes
Figure 1. A basic model of mechanisms underlying “naming and shaming” of sex offenders. A = Situational mechanism; B = Action-formation mechanism; C = Transformational mechanism. Source: Adapted from Coleman (1986); Hedström and Swedberg (1998).
The Effects of Microcredit on Women’s Control over Household Spending in Developing Countries: A Systematic Review and Meta-analysis

Jos Vaessen, Ana Rivas, Maren Duvendack, Richard Palmer Jones, Frans Leeuw, Ger van Gils, Ruslan Lukach, Nathalie Holvoet, Johan Bastiaensen, Jorge Garcia Hombrados, Hugh Waddington
What Figure 12 shows is that microcredit, in order to lead to women's empowerment through women's control over household spending, has to trigger behavior through a diversity of mechanisms. These are not only those that deal with situational factors like the demography and poverty levels of female clients and their households, but also sociological ones like social capital and peer pressure and psychological ones such as self-efficacy and self-esteem. Mechanisms of a more hybrid nature like the ritualization women go through when they obtain microcredit are also assumed to play a (positive) role. However, microcredit programmes not only focus on changing individual behavior but also on making a difference at a more macro level (communities, regions). These processes are guided by transformational mechanisms that resemble the tipping point mechanism, diffusion of innovation and (Olson's) 'selective incentives'. 
2. WIE WERDEN MECHANISMEN AKTUELL IN EVALUATIONEN VERSTANDEN UND METHODISCH UMGESETZT?
DATA SOURCES

- Content analysis 15 years of “Evaluation” with Jack Tomlin
- Review work for major evaluation journals
- Reviewing & commissioning hundreds of studies/evaluations for applied and NSF research proposals and publications;
- Membership of the EU Evaluation Review Group and EU Help Desk regarding theory-based evaluations
- Trainer with the IPDET World Bank academy and the Netherlands school of Public Administration on theories & mechanisms
- Doing evaluations and teaching & training
- My 35 years of experience” .. bla bla
- A recent 4 day stay with Ray Pawson [joking] in Leeds, talking about this topic (and a number of other things), listening to his inaugural address and reviewing Doing Realist Research, Sage, in preparation…
- And a bit more….
DIE (SEHR) „UNVOLLENDETEN“ ANSATZ

- evaluations that refer to M’s, use this concept/ or similar words, present some M’s
- even put them in a figure with sometimes boxes and arrows,
- but when doing so, one is
- forgetting important aspects/ dimensions of M’s;
- Or one deliberately does not discuss them
- or.......
Graph 1: Logic of Intervention: 1995 - 2010

Logic of intervention

Effects

- Impacts (long term effects)
- Results (immediate/direct effects)
- Outputs (goods and services produced)
- Operations

Programme Objectives

- Global objectives
- Specific objectives
- Operational objectives

Inputs (human and financial resources)
### LOGFRAME MATRIX OF THE PROJECT

The logframe matrix should evolve during the project lifetime: new lines can be added for listing new activities as well as new columns for intermediary targets (milestones) when it is relevant and values will be regularly updated in the column foreseen for reporting purpose (see “current value”).

<table>
<thead>
<tr>
<th>Results chain</th>
<th>Indicators</th>
<th>Baseline</th>
<th>Current value</th>
<th>Targets</th>
<th>Sources and means of verification</th>
<th>Assumptions</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Overall objective:</strong> Impact</td>
<td>The broader, long-term change which will stem from the project and a number of interventions by other partners.</td>
<td>Measure the long-term change to which the project contributes.</td>
<td>Ideally, to be drawn from the partner’s strategy</td>
<td>To be drawn from the partner’s strategy</td>
<td>Factors outside project management’s control that may impact on the outcome-impact linkage.</td>
<td></td>
</tr>
<tr>
<td><strong>Specific objective(s): Outcome(s)</strong></td>
<td>The direct effects of the project which will be obtained at medium term and which tend to focus on the changes in behaviour resulting from project</td>
<td>Measure the change in factors determining the indicators.</td>
<td>The starting point or current value of the indicators.</td>
<td>The intended value of the indicators.</td>
<td>Sources of information and methods used to collect and report (including who and when/how frequently).</td>
<td></td>
</tr>
<tr>
<td>Outcome = Oc (possibly) intermediary</td>
<td>Outcome = iOc</td>
<td>To be presented disaggregated by sex.</td>
<td>The value of the indicator at the indicated date</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>Outputs</strong></td>
<td>The direct/tangible outputs (infrastructure, goods and services) delivered by the project.</td>
<td>Measure the degree of delivery of the outputs.</td>
<td>Idem as above for the corresponding indicators.</td>
<td>Idem as above for the corresponding indicators.</td>
<td>Idem as above for the corresponding indicator.</td>
<td>Factors outside project management’s control that may impact on the output-outcome linkage.</td>
</tr>
<tr>
<td>Output = Op Op 1.1. (related to Oc 1) Op 1.2. (related to Oc 1)</td>
<td>To be presented disaggregated by sex.</td>
<td></td>
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</tbody>
</table>

15 January 2016
3d_logframe_en
BL is a type of small business support activities that many (European) governments have implemented. It can be seen as a type of brokerage.

BL activities are believed to increase economic productivity and job growth.

The small business service aims to build the capability for small business growth and the advice and support provided by Business Links are intended to improve the management skills and thereby improve business performance and entrepreneurship.
Figure 1.1: Programme Theory for Business Links

More consultants dealing with SMEs

- Business Link accreditation
  - Small firms more certain of quality business advice
  - Small firms develop internal capabilities to analyse their problems and derive solutions

- Increased use of business advice by SMEs
  - SMEs know where to get business support services

- Increased Management skills

Business Link

High visibility
INTERESTING...BUT: WHAT HAS BEEN FORGOTTEN?

- improve business performance and entrepreneurship

Economic growth
Ex-post evaluation of the Europe for Citizens Programme 2007-2013

Final report
Figure 1: Main objectives of the Programme for Active European Citizenship

Source: Council decision 2004/100/EC

- Promoting and disseminating the values and objectives of the EU
- Bringing citizens closer to the EU institutions and encouraging more engagement with those
- Involving citizens in reflection and discussion on the construction of the EU
- Identifying links and exchanges between citizens from participation countries (particularly town twinning)
- Stimulating initiatives by bodies engaged in the promotion of active and participatory citizenship

The Community Action Programme had a budget of EUR 72 million over the three years of its existence. It supported a wide range of activities in the field of active citizenship through two types of grants:

- Operating grants to co-finance permanent work with an aim of general European interest in the field of active citizenship
- Grants to co-finance specific actions.

In total, the Community Action Programme 2004-2006 funded over 30 organisations, as well as more than 250 projects by NGOs, associations and federations, and trade unions. Over 2,800 town twinning projects received funding from the programme.
Figure 2: ECFP intervention logic

Global aim

- Increase active European citizenship

General objectives

- Give citizens a role in constructing an ever closer Europe
- Develop a sense of European identity
- Foster a sense of citizens’ ownership of the EU
- Enhance tolerance and mutual understanding between European citizens

Specific objectives (results)

- Bring together people from local communities to share and exchange experiences, opinions and values, learn from history and to build for the future
- Foster cooperation among CSOs related to action, debate and reflection on European citizenship and democracy, shared values, common history and culture
- Preserve the memory of Europe’s past while promoting core values and achievements (thereby bringing Europe closer to its citizens)

Intended (immediate) outputs

- Active citizens for Europe: Meetings, exchanges and debates among European citizens from different countries
- Active civil society in Europe: Cooperation projects of CSOs from different countries
- Together for Europe: Commemoration of historical events, celebration of European achievements, artistic and awareness-raising events, conferences and prizes
- Active European Remembrance: Preservation of sites and archives associated with deportations

Inputs (funding)

EUR 215m over seven years (2007-2013)
DIE “FAKE HANDBAGS”- ANSATZ

• In texts it is suggested that interventions, programs, policies, measures etc “are” mechanisms (e.g. by calling them ‘activities’ for example);

• The tautology tric is used: by starting with boxes labeled as ‘interventions’, and by adding lines and arrows to other boxes in another colour or format, make the impression / label these other boxes that are located further in the assumed (?) causal chain, as “mechanisms”. For a lazy reader, a busy policy maker, a not focused on informative content and validity politician, the figure looks like that it serious business to talk about (behavioral/ institutional) M’s

• This ‘approach’ is also followed, because often or sometimes, users of TBE are not very well versed into what M’s are, or they don’t give a …., but there is one condition: the diagram has to look good, complicated and all that and in line with UF-evaluations...

▶ A recent Experience: “Frans, could you please polish up the program theory and the M’s, because that is what my boss in XX wants?”
Put a little different:

Fake Handbags often arise because it is difficult to ‘see’ the intervention when focusing on context, mechanism and outcome configurations. ...

Above all, remember that boxes and arrows are not causal explanations.

Look beneath the visible machinery of program operations.

What is it about an intervention that makes it work? By what means are changes in participant’s internal cognitive and affective states triggered?

Mechanisms are real but elusive, and are usually not directly observable.

Remember that ‘it is not the lofty sails but the unseen wind that moves the ship’ (Bierstedt, 1960, p.9).

The Ready by 21 Theory of Change

LEADERS
ACCOUNTABILITY
Change the way we do business

FAMILY, COMMUNITY & SCHOOL
SUPPORTS
Change the landscape of communities

CHILDREN & YOUTH
OUTCOMES
Change the odds for children and youth

© 2011, Forum for Youth Investment
IDEX’S ROLE

IDEX exists to effect systemic change, shift unequal power dynamics, influence giving to adopt egalitarian practices, balance learning between the global south and north, and facilitate connections.

STRATEGIES

- Investing in authentic partnerships
- Maximizing Organizational Potential
- Bridging Networks
- Amplifying learnings from the Global South
- Brokering resources
- Advocating
- Impact consulting

COMMUNITIES ARE ORGANIZED TO ACCESS RESOURCES, EMBRACE THEIR ECONOMIC, ECOLOGICAL, CULTURAL AND POLITICAL RIGHTS, AND ARE EMPOWERED TO LIVE FREE FROM POVERTY AND ALL FORMS OF DISCRIMINATION.

Robust civil society organizations in the global south are building new alternative systems & ensuring that governments are working for the excluded and marginalized.

COMMUNITY BASED ORGANIZATIONS ARE WORKING IN ALLIANCE AND RESPONSIBLY FOR RIGHTS-BASED NATIONAL POLICY CHANGES AND COMMUNITY led initiatives, language, skills & knowledge to mobilize resources in favor of social justice giving.

SOCIAL CHANGE IN ACTION

- Community Self-Determination
- Organizational Resilience
- Global Solidarity

- Social Justice Giving

THERE ARE MANY PROBLEMS.

- Existing economic and political systems,
- 1) exclude and marginalize populations; and 2) disrespect the rights of Mother Earth.
- Community based organizations (CBOs) in the Global South have historically faced challenges in mobilizing resources.

BUT, THERE ARE JUST AS MANY SOLUTIONS!

- People in the Global South have the autonomy and strength to develop holistic, sustainable solutions to end poverty and injustice.
- Community based organizations (CBOs) have the power to build local skills, leadership, capacities and mobilize resources.
DIE REALIST (EVALUATION) ANSATZ

• M are M’s when the black box of policies, activities, programs etc has been opened and also unspoken mechanisms have been articulated

• Articulate C M O’s in a serious way, that is by following methodological rules/ approaches like:
  • The policy scientific approach
  • Elicitation
  • General Elimination approach
  • Strategic assumption surfacing and challenging and others

• Notice is taken of the informative content of assumptions / theories about M’s

• Notice is taken of possibility of the layering of mechanisms

• Notice is taken of the difference between evidence based medicine and evidence based policy (Pawson, in progress, 2020)
CRUCIAL IS UNPACKING THE POLICY BLACK BOXES BY SEARCHING FOR *MECHANISMS*
2. Unspoken mechanisms articulated

Figure 6.3 A Conceptual Platform for Behavioural Change Interventions
Numerous examples ranging from naming and shaming policies, incentives, social cohesion programs, mentoring, health interventions, anticorruption policies and many more have been reported in the (academic) literature.
Box 3.1

A complexity checklist

1. Volitions. Map the choice architecture of the programme. What choices do subjects have to make to achieve the ambitions of the programme? These choices will vary significantly across the totality of subjects, so the map should cover the full range and balance of volitions. Minds tend to be changed slowly so the volition map should also sketch the pathways of persuasion, the sequence of choices a subject has to make in moving from outsider to insider status.

2. Implementation. Map the implementation chains of the programme. Programmes come to life over many months and years, and a great diversity of ‘traffic’ flows through them. Implementation maps might begin to chart flows of resources; chains of responsibilities (individuals and institutions); reception and transmission points for subjects; as well as the different theories of change that lie behind each stage, strategy and tactic.

3. Contexts. Map the pre-existing contexts in which the programme is embedded. Consider for whom and in what circumstances the programme might work. Contexts vary from the micro to the macro, so the map might include profiles of: stakeholders and their characteristics; the interpersonal exchanges through which the programme is delivered; the organisational settings in which it takes place; and the wider societal location of the programme.

4. Time. Map the history of the family of programmes of which the intervention under study is a member. What has happened previously will shape what happens next. Temporal mapping might include: previous experiences of programme subjects and communities on similar interventions; previous experiences of stakeholders in delivering similar interventions; the successes and failures of previous attempts, of whatever kind, to address the given policy objective.

5. Outcomes. Map the monitoring systems that are likely to be applied and have been applied to programmes like the one under study. Consider which measures are likely to be contested, how stakeholders might differ in their interpretations, and whether behaviour might change as a result of being monitored rather than as a result of the intended action of the programme.

6. Rivalry. Map the pre-existing policy landscape in which the programme is embedded. Other, contiguous programmes and policies may share or oppose the ambitions of the intervention under study and can override the actions of stakeholders and subjects under study. Consider how generic implementation strategies such as ‘continuous improvement’ will continue to modify the delivery of the programme.

7. Emergence. Map the potential emergent effects, long-term adaptations, societal changes and unintended consequences associated with the programme. Consider whether the spread and duplication of the programme might blunt its effectiveness. How will the programme be able to maintain a balance between recruitment, retention and exit?

(Continued)
Layering mechanisms & theory ladders:

the case of early intervention programs where evaluations have found that these programs work (a little bit) for families at medium levels of disadvantage but not for the most disadvantaged families, including even generating negative impacts on children cognitive and social-emotional development.

How to tackle this problem and what about mechanisms?
Figure 1. Theory map.
The theory map places attachment theory as the bottom rung of a ‘theory ladder’. It posits that attachment style influences the nature of social judgements that an individual makes, which in turn influences the nature of relationships that they form, which in turn influences the extent and nature of social capital available to them, which in turn influences their life outcomes at the societal level (employment status, housing status and so on). That is, it posits attachment style as a mechanism generating differences in social judgements, which in turn act as a mechanism generating differences in social capital, which in turn act as a mechanism generating social inclusion and exclusion. It should be noted here that there is no claim that these are the sole mechanisms – or even, necessarily, the primary mechanisms – generating the outcomes at the next level. The claim is simply that these are mechanisms and that they therefore, in at least some contexts, contribute to those outcomes.

However, it should also be noted that the generative process operates downwards as well. That is, social and economic status and the social norms at play within particular groups influence the social capital available to members of those groups, which influences their experiences of seeking assistance through others, which influences both the nature of their relationship experiences and the nature of future social judgements they make, and their relationship experiences in turn have the potential to influence the modification of attachment style over the life course. This bi-directional influence is consistent with concepts of emergent order and downward causation in realist systems theory:

The idea of downward causation is anti-reductionist and posits . . . that influences can be expected to occur in both directions – upward from subsystems and downward from the whole; every level constrains others. (Mark et al., 2000: 156)
DER MECHANISM EXPERIMENT (APPROACH)

- Consider a causal chain running from a *policy* P through a *mechanism* (or mediator) M to a *desired outcome* Y.

- A standard policy experiment would test whether P changes Y.

- The mechanism experiment instead focuses on whether M changes Y.
BROKEN WINDOWS M – EXPERIMENT

Standard Policy Experiment would be an experiment in which police pays more attention to enforcing minor crimes like vandalism, since these minor crimes otherwise can signal no one cares and leads to more serious criminal behavior.

Such an evaluation might randomly select high-crime areas in a number of cities to receive this form of policing, and then measure impacts on serious criminal behavior.

• M exp: to do an experiment in which you buy a fleet of used cars, break the windows in half of them, and then place them in a randomly selected subset of neighborhoods and then measure directly whether more serious crimes increase in response to broken windows.

The theory states that maintaining and monitoring urban environments to prevent small crimes such as vandalism, public drinking, and toll-jumping helps to create an atmosphere of order and lawfulness, thereby preventing more serious crimes from happening.

J.Ludwig et al (2011, Jnl of Ec Perspectives), MECHANISM EXPERIMENTS AND POLICY EVALUATIONS.
III. WELCHE FUNKTIONEN HABEN KAUSALE MECHANISMEN IN EVALUIERUNGEN?

- To develop a good sense of the issues
- To formulate questions
- When using Repositories, serious evidence to test a program theory is available
- Preventing lock-ism, box-ism and trading log(ical) frameworks;
- To understand / explain the data
- To distinguish ideology from behavioral assumptions
- To create the opportunity to find out if the basic ingredients of a policy work without testing the complete policy (i.e. in stead do M-experiments)
- To make recommendations
- The program theory can be improved by linking to explanatory theories from the sciences, incl social neurosciences, behavioral economics etc.

- For better reporting
- TBE is a partner when doing CONTRIBUTION ANALYSIS!
- TBE is a partner to help understand what makes a policy work
- Or to help understand if it did not work (‘wrong implementation theory’ for example)
- TBE is, in a simpler format, an engine driving democratic decision making, because assumptions of policy makers & politicians can be ‘known’ and discussed...
- To link existing research evidence on generative M’s (within repositories, e-libraries a la ‘compound libraries’) with issues/questions of the more specific situation/nature at hand, including doing ex ante evaluations
EX ANTE TESTING THE POSSIBLE IMPACT OF A NEW “POLICY” TO PREVENT COCAINE SWALLOWING AND TRAFFICKING USING A COMPOUND
CHALLENGES FOR TDE

- PREVENT DOING SLOPPY TBE’S: TILLEY’S CASE OF PRODUCING ERROR COSTS
- ‘POLISHING UP’ A POLICY THEORY THAT DOES NOT EXIST
- PREVENT DESIGNED BLINDNESS
- IS IT ALWAYS A SLOPPY EVALUATION WHEN NO PROGRAM THEORY /TOC HAS BEEN FOUND/ TESTED?

- THE Complex Adaptative System – PROBLEM or: how important is Methodological Individualism...
Digitization, dataification, Quantified Self, Quantified Communities, Hololens, the Homo Digitalis and the Digital State
THANKS

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