

Energy research Centre of the Netherlands

Development of a Model for Assessing Innovation Policy

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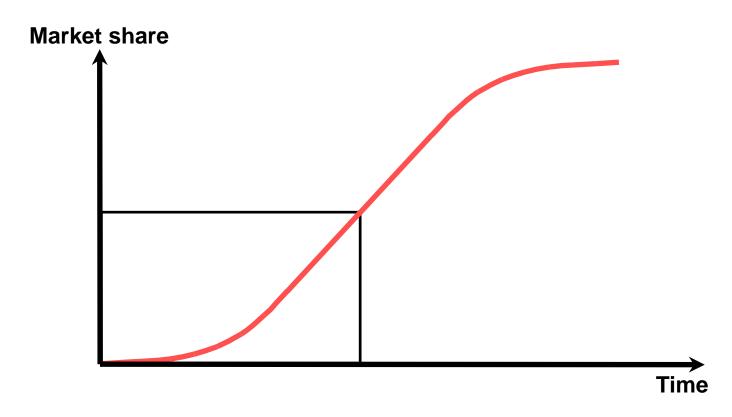
Innovation policy: Invest now; result unclear

Test for effectiveness and added value of policies required



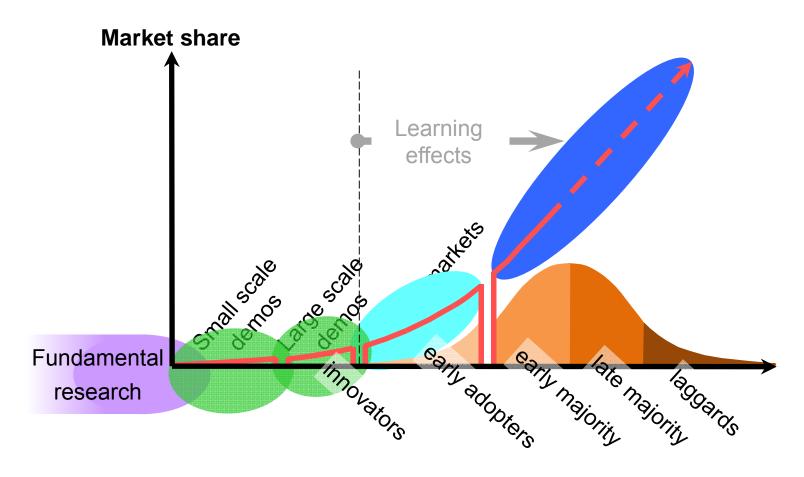


Technology development phases



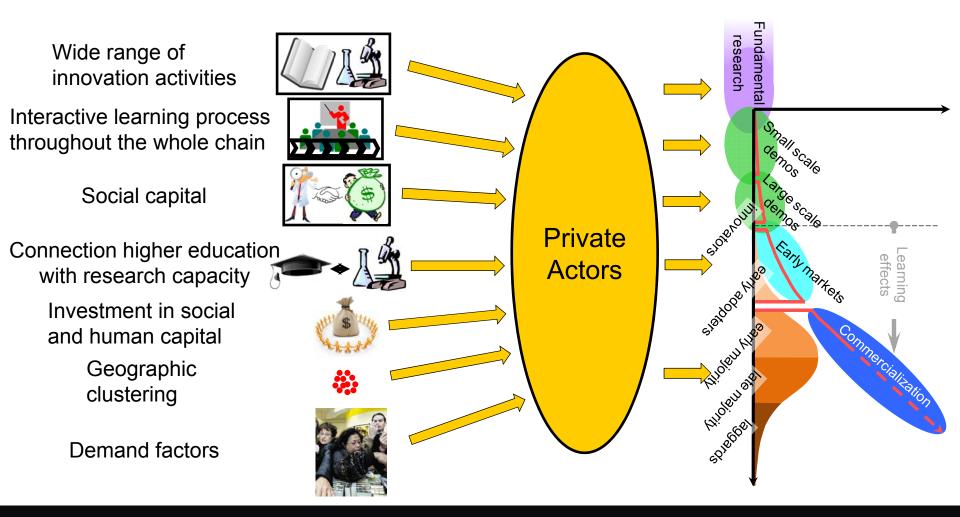


Technology development phases



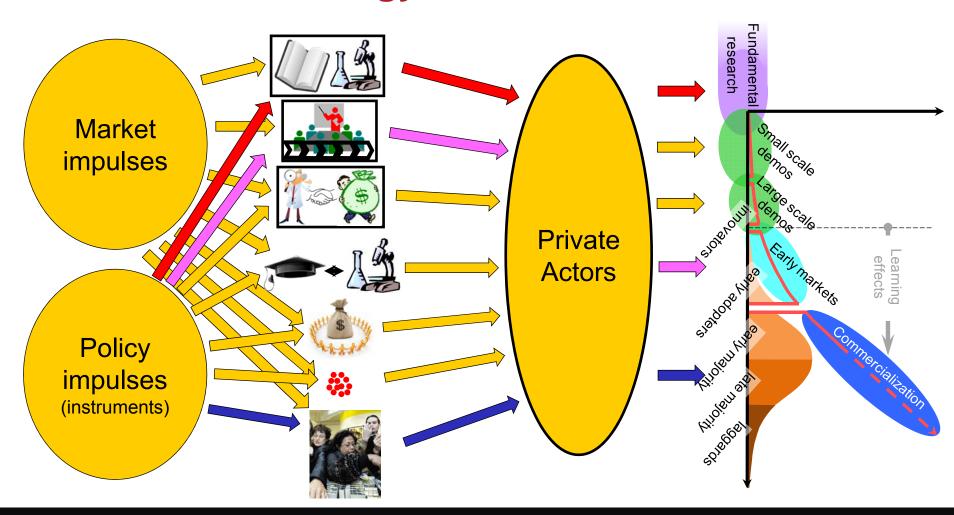


Technology innovation model



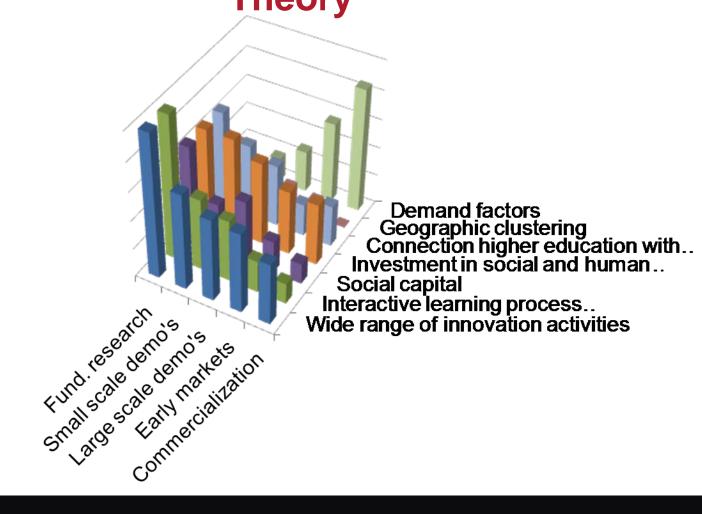


Technology innovation model



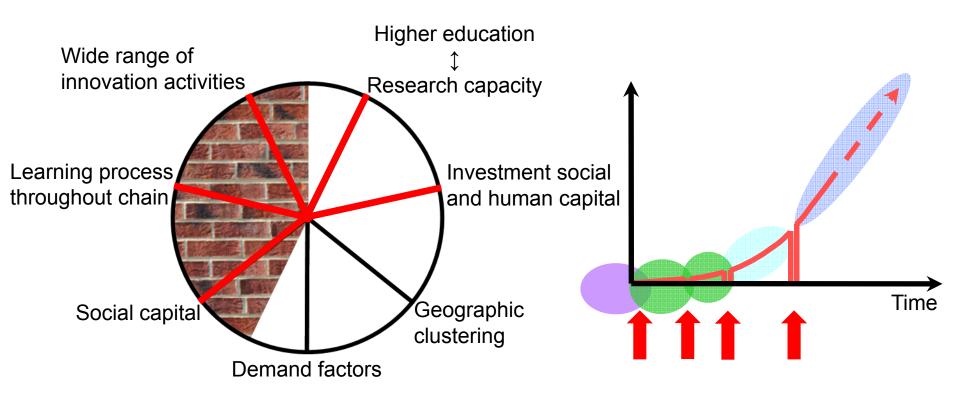


Assessment structure innovation policy Theory





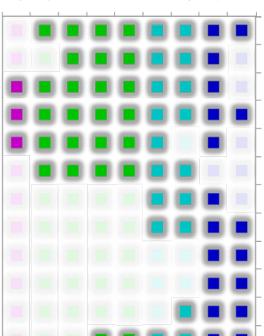
Innovation factors 'Research support'





Structure innovation policy

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Required type of policy instrument

Vision
Removing bottlenecks (in regulation)

Organization development

Knowledge infrastructure development

Research support

Investment subsidy

Purchase policies

Advantage for end users

Covenants

Obligations

Export potential development

Societal support

Policy mechanism

Vision

Bottlenecks regulation

-Organization development

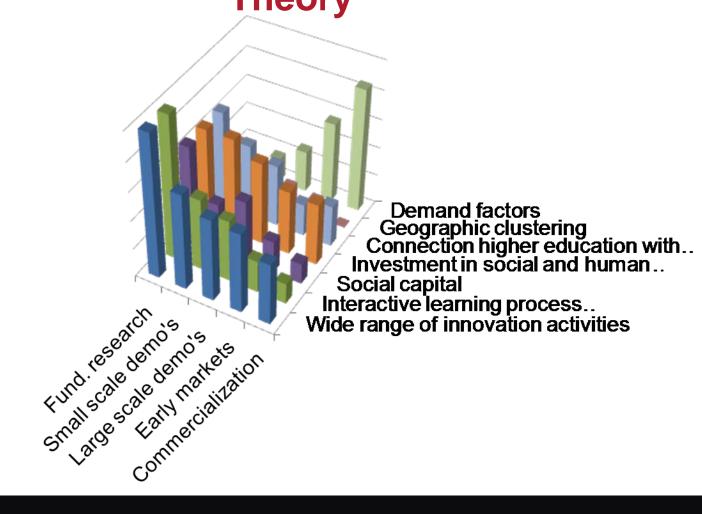
Research support

Market development

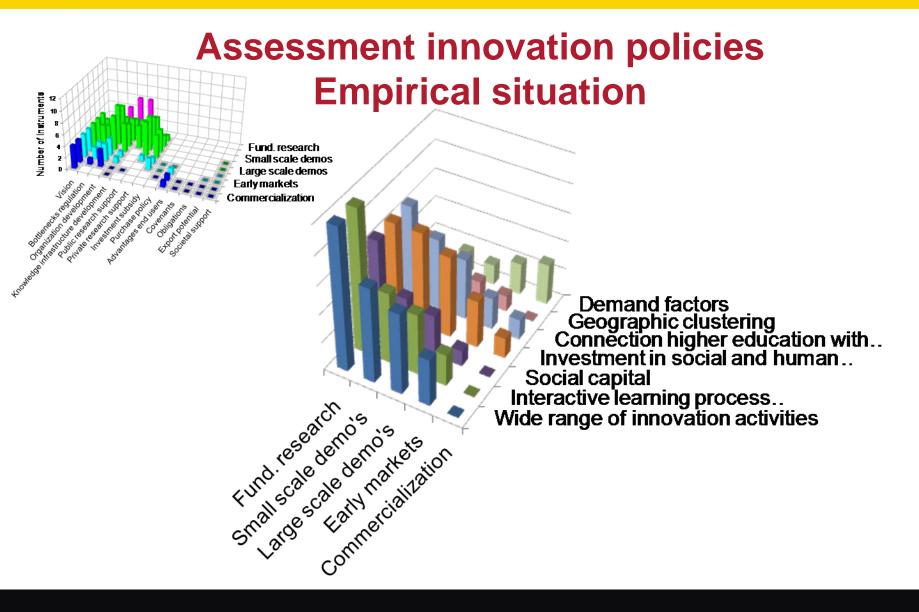
Societal support



Assessment structure innovation policy Theory



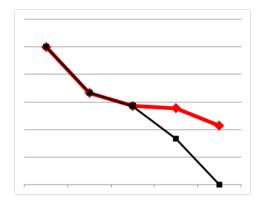




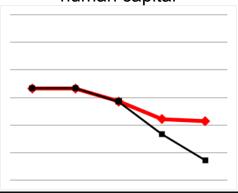


Assessment innovation policies Theory vs. Empirical

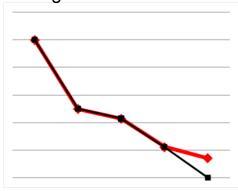
Wide range of innovation activities



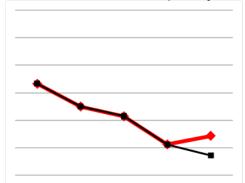
Investment in social and human capital



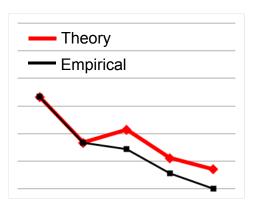
Interactive learning process throughout the whole chain



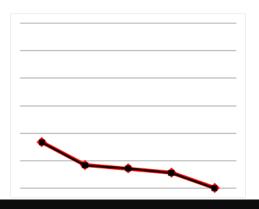
Connection higher education with research capacity



Social capital

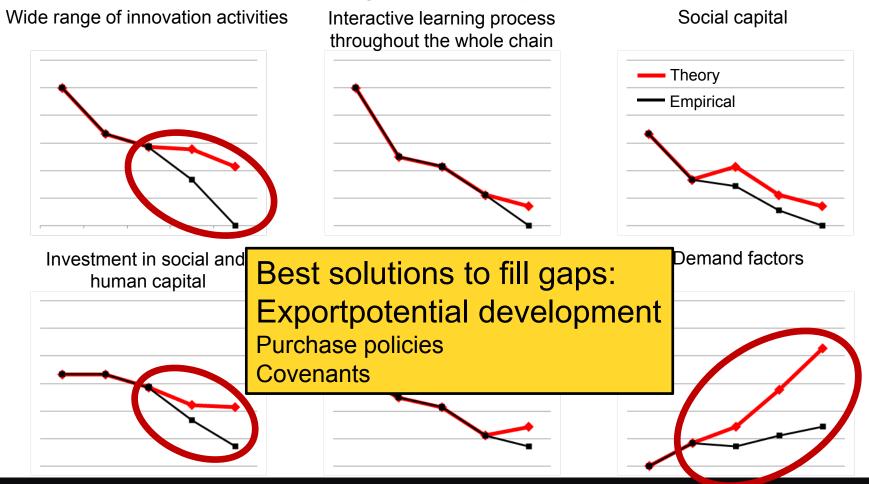


Geographic clustering





Assessment innovation policies Theory vs. Empirical



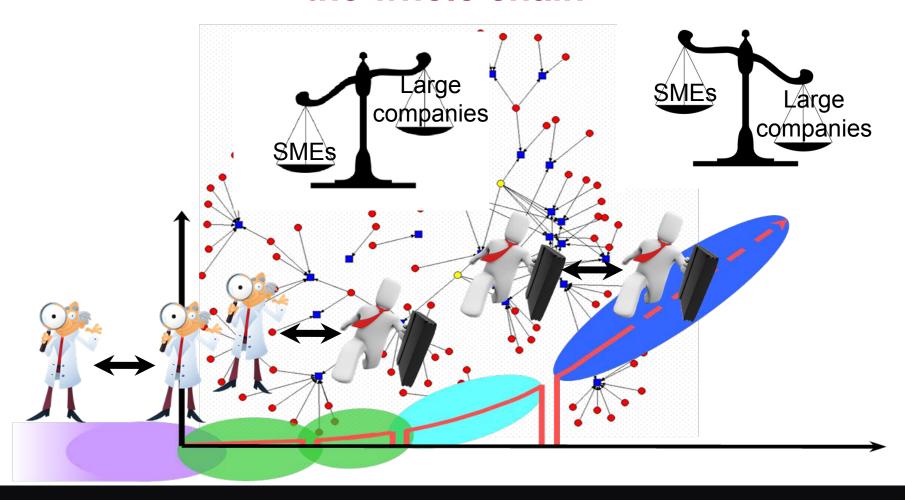


What can we do with this information?

- Test policy intentions beforehand. Are policies effective, what is its added value?
 - Ideal situation vs. intended situation.
 - Where market does not provide required support...
 - Gaps require additional policies.
- How to repair gaps?
 - Identify factors not sufficiently covered.
 - Design instrument that fulfil these factors only.
- Next step, measure the real performance of polices
 - What are proper indicators?



Interactive learning process throughout the whole chain

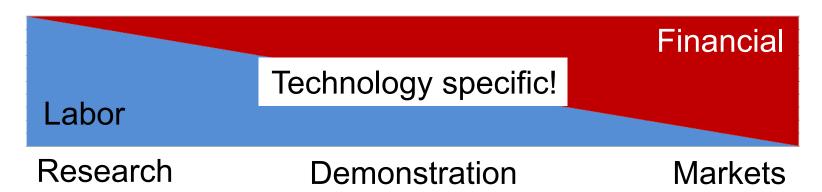




Investment in social and human capital

On a project level collect data on:

- Amount of funding involved (only on aggregated level)
- Type of funds (e.g. financial, business accomodation, private assets)
- Labor costs
- Physical assets
- Contribution in knowledge (e.g. patents, licences)





Conclusion

- Assessing innovation policy effect on innovation factors
 - Assesses policy intentions beforehand
 - Provides insight in the role of specific policy instruments
 - Shows how to effectively fill gaps
- Ex-post policy assessment
 - By determining indicators on innovation factors, the real effect of policy instruments can be determined