

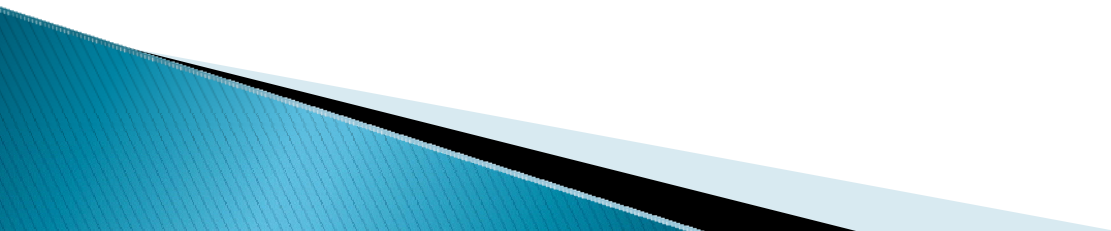
Clusters, science parks and regional development: *Strategies and Policies in Hungary*

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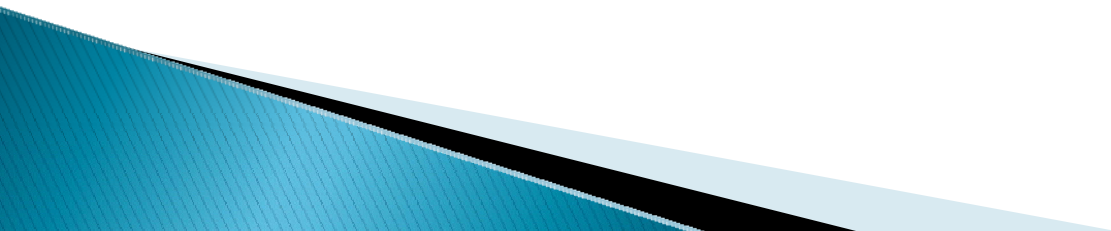
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Topics of this talk

- ▶ What are the policies to promote innovation clusters in Hungary
 - ▶ Cluster scorecard
 - ▶ Budapest and success factors
 - ▶ Introduce the flagship project
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The topic

- ▶ Government objective: increase R&D activities at firms and boost innovation
 - ▶ Two goals
 - Increase competitiveness of companies
 - Pursue cohesion, help regional development
 - BUT: sometimes conflicting targets
 - ▶ Support of innovative clusters/science park
 - A possible way to reconcile targets
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Policy relevance

Policy targets conflict.

- ▶ 7 regional centers are envisioned. If cluster policies work, and agglomeration forces prevail, there may be too many sites targeted.

Can government create innovation clusters?

- ▶ Key question everywhere
- ▶ Hungary: yes is assumed
 - Skepticism is warranted.

Science parks and clusters

- ▶ Direct and indirect measures are targeted to create knowledge/innovation clusters
 - In Budapest + 6 cities
 - In biotech/healthcare, IT, nanotech, mechatronics, etc.
- ▶ Implicit expectation: about 8–12 such clusters by 2010

Direct measures in promoting the networking capabilities of firms in Hungary

- University–industry joint projects, about €80m in 3 ys
- Technological innovation in supplier networks:
 - to enhance the innovation capabilities of SMEs €7m in 2006
- Innovation Programme for Cutting edge Industries:
 - to accelerate the evolution of the cutting–edge industries in health, biotech and agriculture by promoting technology platforms and innovation clusters. €26.0m 2005–2009
- ▶ Incubator houses
 - Build and extend incubation facilities for start–ups and small firms. 50m euro/2007–2008

Competitiveness poles project

- ▶ Flagship project
- ▶ Miming the French poles de compétitivité
 - 7 regions, 7 cities incl. Budapest
 - 2–3 areas per region
- ▶ Idea: Create and assist clusters of universities, research centers, multinationals and small firms in seven cities in a few areas such as biotech, IT
- ▶ Overall budget is €300–400m in 2007–2013
 - 1: infrastructure: €30m in 2008
 - 2: clusters: start in 2008/2009

Competitiveness poles project

▶ Successes

- Selection 7 centers for innovation cluster /center of excellence – rather than dispersing funds
- Made regions, cities and universities start thinking about prospects, create strategy documents
- May have helped some firms locate offices, R&D centers, outside Budapest

Competitiveness poles project

▶ Failures

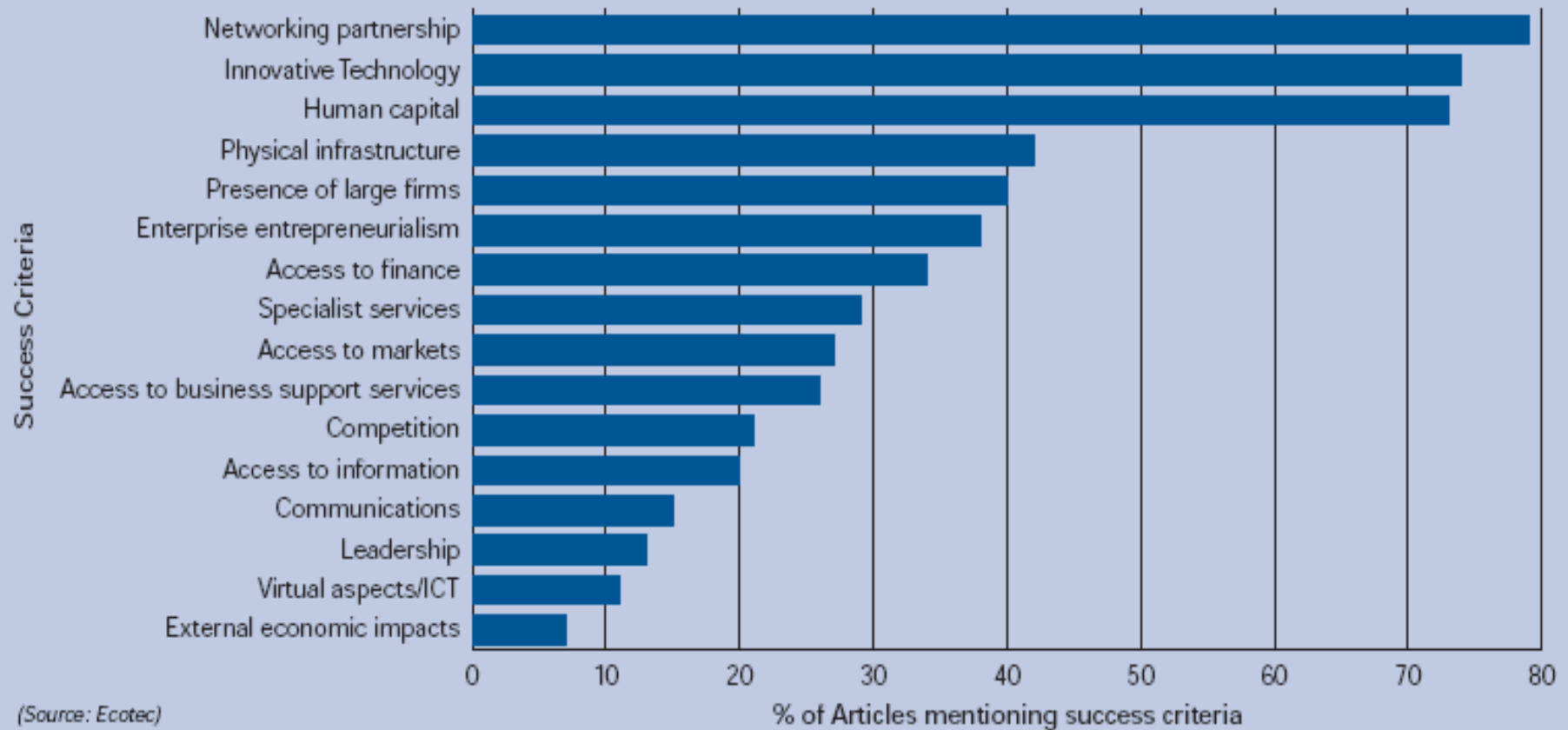
- No clear strategy on state involvement
 - delays in decision-making
 - Frequent alteration of strategy
- EU grant call details blurry
 - Planning and network building hard
 - Changes are alienating early partners (e.g. some universities)
- Corporate involvement is weak due to uncertainties

Innovation clusters scorecard

Key areas	Present	Expectation by 2013
Geographic concentration	Some in IT, Budapest overwhelming	Will increase, some regional centers to rise
Specialization	Budapest: IT, life sc., Szeged:bio	Will increase as new specialized centers emerge
Multiple actors	Real co-operation is rare	Questionable
Co-opetition	Co-operation among SMEs rare	Likely to improve
Critical mass	No, so far no real science park	May not be reached except for Budapest where 2-3 likely succeed. Maybe 1-2 outside
Long-termism	No	Maybe, not likely
Innovative activities	Little	Will rise, slowly, macro conditions problematic

What determines cluster success?

Critical success factor identified within global literature search



Factors of successful clusters – Budapest

	ICT Budapest	Life sciences Budapest	Potential Government action
Networking partnership	Yes	No	Cluster projects
Innovative technology	Some	Yes	Education, tax
Human capital	Yes	Yes	Education, EU grants
Physical infrastructure	Adequate	Poor	EU grants
Presence of large firms	Yes	Moderate	FDI policy, macro- economic policy
Entrepreneurship	Adequate	Some, rising	Education, red tape
Access to finance	Modest	Poor	Seed capital, tax

Innovation cluster building: PPP

- ▶ PPP: Firms + public institutions (academia) + state (EU funds)
- ▶ Will it work?
 - State: does not know what it wants
 - Academia: short of cash, looks to use R&D/innovation support to cover for falling normative support
 - Firms: heterogeneity
 - true market participants
 - firms dependent on soft money
 - Rent-seeking firms (using funds to do what they plan anyway)

Innovation cluster building

Reasons for skepticism

- ▶ Regional development needs not met
 - Are there co-operating agencies and institutions?
No.
 - Is social capital (values, trust, institutions) strong?
No.
 - Is critical mass accumulating that is will set „cumulative causation” / ”vicious circle” forces in motion? Only in capital city.
- ▶ EU Integration poses extra competition
 - Arad/Temesvar vs Szeged

Innovation cluster building

Reasons for optimism

- ▶ Changing approach by some universities
 - 2004: law on spin-offs
 - Technology transfer offices / firms appear
 - Increasing co-operation with leading participants of clusters
- ▶ EU funds make firms co-operate
 - Firm might like what they're forced to do
- ▶ Market forces lead clustering
 - Knowledge spillovers from multinationals

▶ Thanks for the attention

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