

**Broad Set of STI Policy Measures
– Poor Innovation Performance
Lessons from a Central European country**

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**PRIME GLOBELICS
Mexico City, September 24-26, 2008**

The broad picture

All the major elements of a potentially successful NIS are in place ↔

Poor economic and innovation performance

Possible reasons:

- **several ‘nodes’ of the NIS don’t work satisfactorily, or still fledgling**
- **the intensity and quality of linkages and co-operation among them is insufficient**

**The puzzle:
a more 'modest' research question**

**A broad set of apparently appropriate STI
policy measures ↔**

Poor economic and innovation performance

Hypothetical explanations:

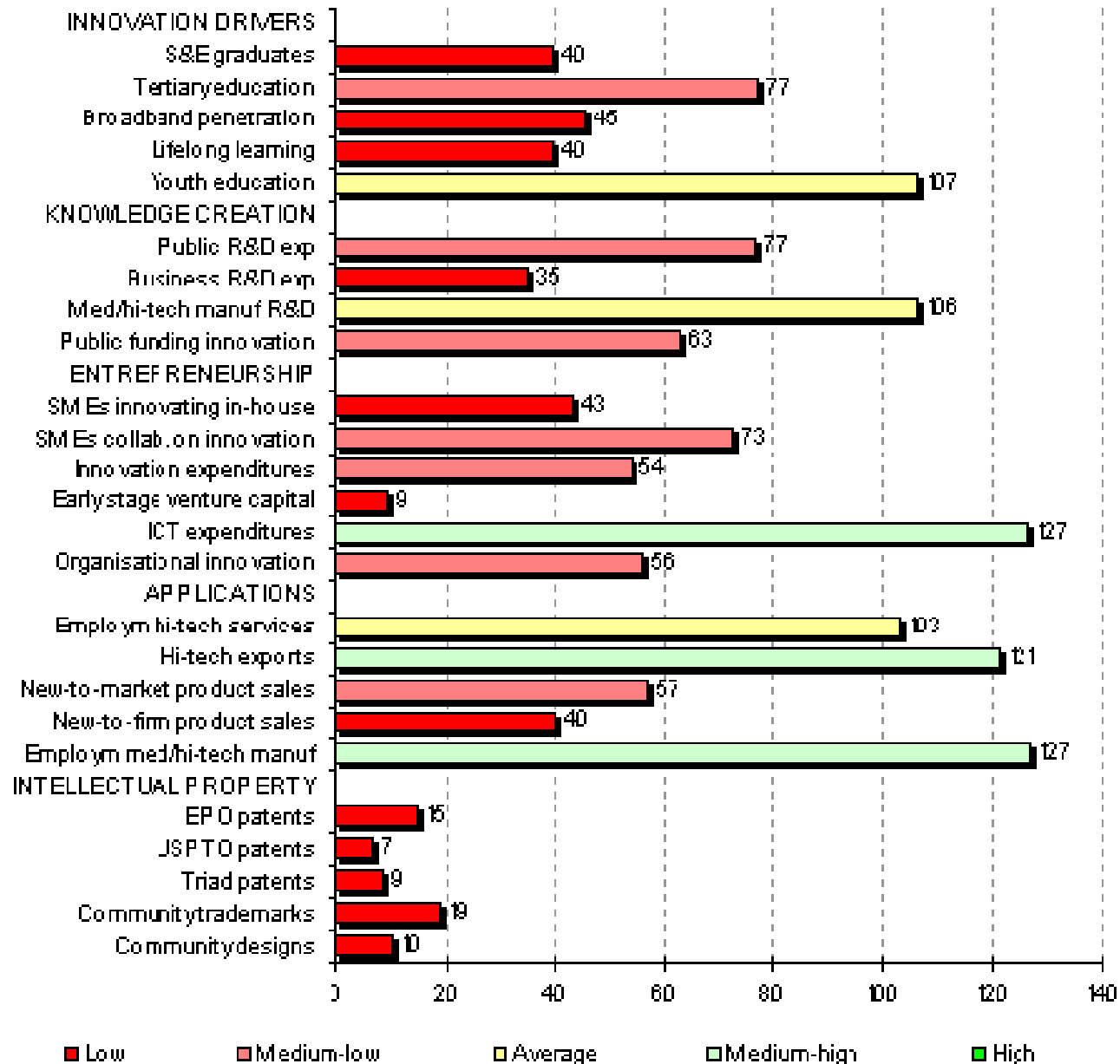
- a) lack of co-ordination of STI policies**
- b) inappropriate policy goals**
- c) inadequate funding**
- d) inefficient allocation of available funds**
- e) lack of monitoring and evaluation**
- f) the framework conditions for innovation**

Economic performance

	Hungary		EU27 average	
	2002	2007	2002	2007
GDP per capita in PPS	61.7	64.1	100*	100*
Real GDP growth rate	4.4	1.3	1.2	2.9
Labour productivity	71.7	74.5	100*	100*
Total employment growth	0	0.7 [^]	0.3	1.5 [^]
Inflation rate (average annual)	5.2	7.9	2.5	2.3 ^{^^}
Unit labour costs (growth rate)	0.7	-2.1	-0.5	-0.8 (f)
Public balance	-8.9	-9.2 [^]	-2.5	-1.6 [^]
General government debt	55.6	65.6 [^]	60.3	61.4 [^]
Unemployment rate	5.8	7.2	8.9	7.1
FDI intensity	2.5	4.5 ^{^^}	0.9 [”]	1.8 [^]
Business investment (% of GDP)	18.1	17.3 [^]	17.3	18.2 [^]

Source: Eurostat - Structural Indicators and Long-term Indicators

EIS 2#07 Innovation performance (relative to EU25)



Co-ordination of STI policies

STI policies & broader socio-economic policies:

no broad socio-economic strategy in Hungary \Rightarrow

- no co-ordination with STI policies
- cannot be established if STI policies contribute to achieving these broad development goals

Various types of STI policies:

apparently appropriate high-level bodies for efficient policy co-ordination \leftrightarrow actual operation

Policy goals

Major challenges are identified, and STI policies are in place to tackle these issues

Too many STI policy schemes \Rightarrow overlaps

The policy mix is insufficiently transparent and potentially inefficient (State Audit Office)

***Ad hoc* nature of policy-making:
the policy mix is a collection of otherwise stand-alone, isolated initiatives and actions, rather than a result of conscious and co-ordinated (re-)targeting of policy strategies**

Funding: Public R&D expenditures (% of GDP, 2005)

Finland, Sweden	> 0.9
France, Denmark, Germany, The Netherlands, Austria, Switzerland	0.7-0.8
<i>UK, Italy, Spain, Czech Republic, Greece</i>	0.5-0.6
Hungary	0.5
<i>Ireland, Portugal, Poland, Slovenia</i>	0.35- 0.43

Increased funding since 2004 (new national and EU funds)

Σ public funding doesn't have a major explanatory power

Allocation of available funds

A significant room for improvement

- **unrealistically short application deadlines**
- **unacceptably long appraisal periods**
- **access to appraisal reports on project proposals**
- **unduly lengthy admin procedures**
contracts signed, disbursements of awarded funds
- **low share of funds awarded to firms**

Dates of publication of recent calls for proposals and deadline for submission

Measure	Call published	Deadline for submission
Péter Pázmány Programme, HU_87	23 May 2005	15 June 2005
Ányos Jedlik Programme, HU_24	20 Apr 2005	20 May 2005
Large international R&D projects, HU_94	26 Jan 2005	22 March 2005
Information infrastructure for R&D, HU_90	10 Jan 2005	7 March 2005
Miksa DÉRI Programme, HU_88	17 Dec 2004	31 Dec 2005
Innovative Education Support Systems, HU_89	25 Nov 2004	15 Feb 2005
Mobile Communications R&D and Innovation Centre, HU_92	25 Nov 2004	3 Dec 2004
Co-operative Research Centres (KKK II), HU_91	23 Nov 2004	31 Jan 2005
Regional Knowledge Centres, HU_87	11 Oct 2004	4 Nov 2004
Regional Innovation Agencies, HU_93	5 Oct 2004	2 Nov 2004
Regional info and consultancy services on EU FP6, HU_6	16 Sept 2004	15 Oct 2004
INNOCSEKK, HU_96	23 June 2005	continuous (until 28 Sept 2007)

Monitoring and evaluation

A new monitoring system has not been implemented according to the original plans (State Audit Office)

Policy evaluation of nationally funded schemes is mandatory ↔ 2 evaluation completed, 2 in progress

EU co-funded schemes: evaluation is a must

Several bn € have been allocated without clearly defined goals, rationales for state intervention, and efficient coordination of sectoral strategies. The impact of state intervention cannot be established due to the lack of clearly defined targets (and indicators), as well as systematic evaluation. (State Audit Office)

Framework conditions for innovation

Economic structure: *dual economy*

Macroeconomic situation and dynamics:
unfavourable

Access to capital: *mismatch*

Entrepreneurial culture: *weak*

Conditions for doing business: *unfavourable (recent improvements)*

Standards and regulation: *mixed*

Publicly financed R&D organisations: *weak*
academia-industry co-operation
mismatch in the incentive structures, insufficient
understanding of the industry's needs

FDI in Hungary: An extreme case

	1995	2000	2001	2002
Share in				
Turnover	56.6	64.7	72.5	71.6
Employment	37.4	48.1	49.2	..
R&D expend of firms	1996 44.4			2006 69.7

Sources: OECD STI Scoreboard 2005, MSTI 2003/1, 2005/1, Hungarian CSO

Conclusions

Innovation is not a major policy issue

- short-term macroeconomic tensions
- social costs of the transition process
- other ‘burning’ political issues
- RTDI is perceived as burden on the budget, rather than part of the solution (contributing to socio-economic development)

No excuse for overlooking the efficacy and efficiency of the current practices in STI policy-making

Policy recommendations (1)

No ‘panacea’ or a ‘quick fix’ to improve RTDI performance by introducing 2-3 new STI policy measures

Substantial efforts are needed, based on a comprehensive approach

Conscious co-ordination of major economic and STI policies, guided by an overarching socio-economic development strategy

Foresight to underpin these strategies, orchestrate the main objectives

Effective use of the existing, but currently unexploited channels and organisations for harmonising policies

Policy recommendations (2)

Policy design and implementation: use up-to-date decision-preparatory methods

- **thorough analyses of innovation performance, combining census, R&D and innovation data**
- **evaluation of individual policy measures, and the policy mix as a whole**
- **technology assessment**

Thanks!

Questions, comments?

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