

Economic crisis, regional development and resilience

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Outline

- The economic crisis, characteristics, problems and regional repercussions – similarities and differences with former crises
- Concepts of resilience and regional resilience
- Path dependencies, lock-ins and renewals
- Measures for regional resilience
- Policy implications for various types of regions

The current economic crisis

- Financial bubbles, private and national debts, budget deficits and the bank system...
- Economic crisis, mismatch of supply and demand on many markets – falling prices and unemployment...
- The 1930's... financial bubbles – economic crisis, deflation
- The 1970's... Oil crisis – structural economic crisis, but inflation

Regional effects

- All are hit by the crisis but some countries and regions are hit more than others – why?
- Two explanations: state financial situation and economic structure
- Most metropolitan regions still do fairly well – centers of the knowledge economy, higher productivity, but the poor suburbs...

Regional effects II

- Urban regions: Knowledge centers – manufacturing centers, different development
- Rural regions: Metro- and city-close rural regions dependent on their development. Raw material regions OK as long as demand is there. Tourism regions hit by decreasing demand. Agricultural regions slowly shrinking...
- Can regions be resilient against the crisis?

The resilience concept

- Dictionary: to be elastic, resistant, have the capacity to recover
- In Sweden: solely about ecology and humans' impact on ecology (e.g. the focus of Stockholm Resilience Center)
- Internationally: a much broader use of the term, including *Regional Resilience*

Regional resilience

- Literature: Regions' ability to react and respond to (internal and external) shocks as e.g. an economic crisis
- But regional actors continuously react and respond to changes in markets and rules, i.e. not only to shocks
- Thus, regional resilience is an always ongoing process and not something that occurs just during crises (Boschma, forthcoming)

Regional resilience II

- Two approaches:
 1. An equilibrium-oriented where resilience is a response to external shocks → back to equilibrium
 2. An evolutionary approach in which resilience is an ever ongoing process and not a return to a preexisting state
- Response to external shocks is just one component of resilience

Structural change and path dependency

- Regional resilience – how to handle and promote structural change (creative destruction)
- Path dependency → lock-ins that prevents resilience or structures that lay the foundation for renewal?
- Adaptation – resilience with movement along the predestined path
- Adaptability – resilience that opens up new pathways
- Is there a trade-off between the two?

Specialization or diversity?

- NEG, Krugman: Specialization is a key to growth, many examples in economic history
- But can specialized regions handle structural change?
- Diversified regions are less vulnerable to sector-specific shocks – more resilient than specialized ones. Variety spreads risks.

The trade-off: related variety?

- Knowledge spillovers: a source for resilience
- Spillovers among similar firms: still risk for lock-ins due to insufficient variety
- Spillovers between firms in *different but related* activities: better chance to find new paths
- Links between firms in different but related activities do not always exist: opportunity for policy

Agglomeration, size and ability for resilience, some hypotheses

- Variety is normally positively related to size of regions (not always in aggregated relative terms, but in terms of number of specialized functions)
- Small regions have less opportunities to change path – but also need less resources to do so
- The knowledge economy means increased problems for small regions due to lower accessibility to knowledge.

What policy?

- Two mantras of today: policy for innovation and entrepreneurship
- Are current policies successful?
- Is government enough innovative and entrepreneurial? Two examples:
 1. Innovativeness & entrepreneurship of Swedish municipalities
 2. Local business climate/local entrepreneurial social capital

Innovativeness & entrepreneurship of Swedish municipalities

- Survey to all 290 municipal directors in Sweden (83% response rate!) Questions about:
- Cooperation with local industry
- Measures for strengthening local business climate
- Co-financing of development projects with local industry
- Cooperation with other municipalities
- Development projects (co-financed by EU and national agencies)
- Benchmarking, learning and competence development activities
- Marketing

Municipality types



Municipal population growth 1999-2009 and determinants

	ALL	Metro	Reg. centers	Rural	Sparse rur.
Economic Ent.	0.117***	0.08567**	0.142***	0.111***	0.065**
Academic Ent.	0.0730***	0.078*	0.002	0.037	0.316
Civil Ent.	0.001	-0.012	0.030*	0.006	-0.009
Patents	-0.005	0.040	0.163	0.007	-0.010
Social Ent.	-0.232**	-1.022*	-1.00***	-0.189	0.068
Municip I&E	0.032	-0.455***	-0.090	0.0815*	0.234*
Population 1998	0.000	0.000	0.000	0.0002***	0.000
Access. earnings	2.875***	-4.976**	0.991	2.119***	0.695
Constant	-82.85***	151.4**	-51.91*	-73.41***	-34.77
Observations	239	35	40	139	25
R-squared	0.705	0.490	0.634	0.559	0.620

*** p<0.01, ** p<0.05, * p<0.1

Employment growth 1999-2009 and determinants

	ALL	Metro	Reg. center	Rural	Sparse rur.
Economic Ent.	0.840***	0.689	1.083***	0.901***	0.870**
Academic Ent.	0.499**	0.343	0.137	0.438	-0.006
Civil Ent.	0.004	0.229	0.162	-0.016	0.0861
Innovative Ent.	-0.284*	-0.905	-0.422	-0.118	-1.272
Social Ent.	-0.252	2.529	-6.244*	0.177	1.048
Municip. I&E	1.135***	-1.095	0.852	1.172**	0.437
Employment level	-1.841**	-6.190*	-2.872	-1.231	-6.183
Access. earnings	6.490*	-38.25	-0.245	7.523	26.78
Constant	-91.43	1.334*	68.32	-161.3	-252.5
Observations	238	35	40	138	25
R-squared	0.312	0.282	0.415	0.208	0.509

*** p<0.01, ** p<0.05,

* p<0.1

Preliminary conclusions

- In metro regions, municipality I&E policy does not seem to be of importance. Growth is market-led.
- In rural municipalities it seems to matter whether government acts innovative & entrepreneurial or not.
- Municipals' own innovativeness and entrepreneurship is a policy for resilience

Area 2: What is (Local) Entrepreneurial Social Capital (ESC)?

- Social networks and values/norms *having an impact on entrepreneurship*
- Examples:
 1. Local public opinion on e-ship
 2. Particular actors' opinions on e-ship
 3. Local entrepreneurial traditions
 4. Local business networks

Data for examples 1 and 2

- *Svenskt Näringslivs* surveys on local business climate. Q: “How is the public’s attitude to entrepreneurship?” and other questions on local actors’ attitudes

Example 3, Entrepreneurial traditions

- The share of firms having < 50 employees of the total number of firms
- A more *business related* measure of ESC

Dependent variable and control variables

- Dependent: Startups 2002-08 at municipality level

Control variables:

- Market's strength: Accessibility to purchasing power (Also a proxy for density in general and access to private & public service, infrastructure, public transportation) +
- Human capital +
- Employment share of labor force -

OLS-Model of variables' influence on startups, all municipalities and divided in urban and rural

VARIABLES			
	ALL	METRO/CITIES	RURAL
Civil society ESC	101.6***	101.9**	94.91***
	(5.089)	(2.149)	(4.598)
In access. Purchasing power	19.03***	44.70***	4.189
	(3.055)	(3.006)	(0.579)
Share Univ. Educated	1344***	1234***	938.0***
	(9.081)	(4.946)	(4.084)
Business related ESC	5358***	4845***	4669***
	(9.249)	(3.477)	(7.299)
Employment share	-389.0***	-89.83	-408.6**
	(-2.598)	(-0.275)	(-2.348)
Constant	-5511***	-5830***	-4436***
	(-9.577)	(-4.661)	(-6.666)
Observations	287	92	195
R-squared	0.617	0.593	0.350
t-statistics in parentheses			
*** p<0.01, ** p<0.05, * p<0.1			

Conclusions, Entrepreneurial social capital

- Both measured in the form of firms' perception of public opinion on entrepreneurship and in entrepreneurial traditions, social capital makes a difference
- At least the former type of social capital can be influenced by policy
- Policy measures for innovative and entrepreneurial social capital is policy for resilience

Consequenses for various region types

- Metro regions less dependent on policy initiatives – growth is market-led. Entrepreneurial social capital important
- Urban regions – unclear relation to I&E policy. Social capital important
- Many types of rural regions, but I&E policy seems to have an impact. Social capital as well

Summary

- Resilience is neither just about ecologic sustainability or recovery from external shocks
- Regional resilience is about regions' economic (and social and ecological) sustainability: both about response to shocks and adaptability change

Summary II

- Knowledge creation and spillovers, various outcomes in case of Specialization or Related variety:
- Lock-ins or ability to create new paths
- Innovation and Entrepreneurial policy probably important but in need of broader focus: policy itself need to be entrepreneurial and entrepreneurial social capital should be highlighted