Measuring smart specialisation: entrepreneurial discovery, new activities and inclusiveness

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Horizontal - vertical

- EFRD in the past : horizontal measures and neutral policy: improving framework conditions and capabilites
- S3 emphasizes a more 'vertical and non neutral' logic of resource allocation and prioritization
- Why is it important? The logic of 'specialisation' is intact
  - Significant returns to size in R&D and innovation activities. Indivisibilities, gains from specialisation, even the abitility to capture spillovers depnds on the existence of sufficiently large nearly R&D sector
  - Small is not (necessarily) beautiful (even in the information age)!
- **Horizontal: easy to identify; vertical : difficult to identify**
  - S3 is difficult because it implies guessing future development of technologies and markets. Mistakes and failures are possible
- S3 = Defining a method to help policy makers to identify desirable areas for interventions in such a 'vertical' logic (some technologies, fields, sub-systems)

- Entrepreneurial discovery
- New activities
- Inclusiveness

1 - Entrepreneurial discovery

- The best bet is entrepreneurial trial and error
  - Priorities will be identified where and when opportunities are discovered by entrepreneurs
- Entrepreneurial knowledge
- Prioritization is no longer the role of the omniscient planner but involves an interactive process, in which the private sector is discovering and producing information about new activities and the government assesses potential and then empowers those actors most capable of realizing the potential
- S3 : a policy that attempts to make two critical and somewhat conflicting requirements compatible:
  - Identifying priorities in a vertical logic and..
  - …keeping market forces working to reveal domains and areas where priorities should be selected

- *The RIS3 ex-ante conditionality requires EU MS and regions to identify the knowledge specialisations that best fit their innovation potential, based on their assets and capabilities.* ***They must do this through a process of 'entrepreneurial discovery'***

- Entrepreneurial
  - «*the best bet is entrepreneurial trial and error*»
- Discovery
  - More than a 'simple' innovation – rather a new activity exploring, experimenting and learning what this industry or sub-system should do in terms of R&D and innovation to improve its situation
- Spillovers

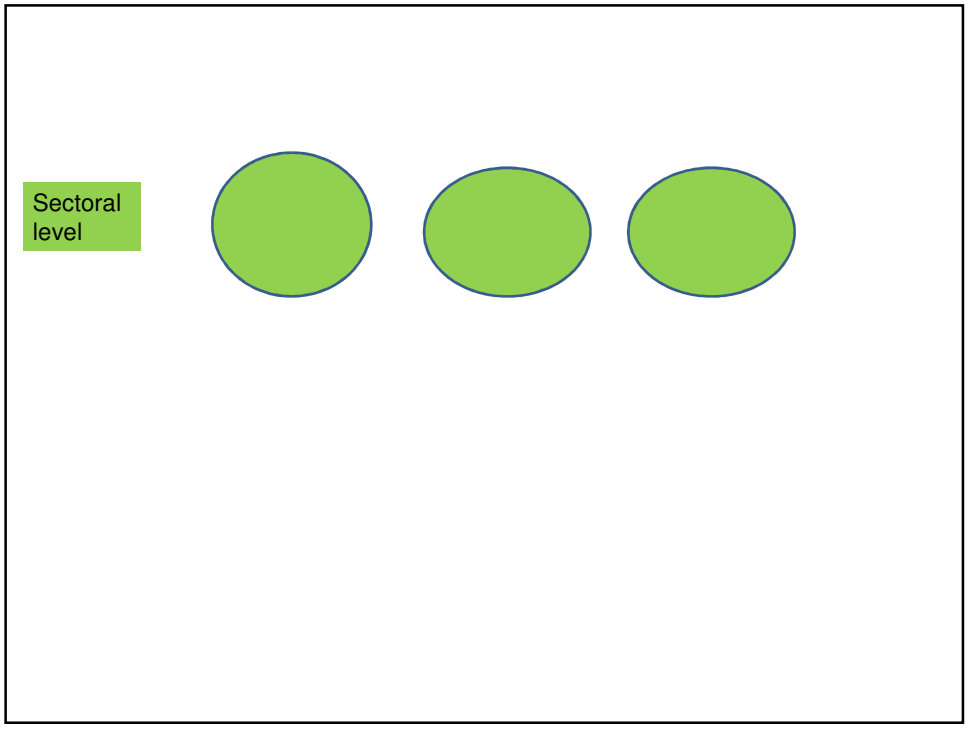
	Innovation	Entrepreneurial discovery
Definition	Idea transformed into new (improved) products or process for commercialisation	Discovery and exploration of a new space of opportunities, which is likely to generate many innovations and the development of a new activity
Level of observation (and of intervention)	Individual firms + R&D partners	Activity undertaken by a group of firms and partners (between the micro and the sectoral levels)
Type of policy	Horizontal subsidies to any project of a certain merit innovation culture, incubators, IPR	Vertical S3
Impact , outcome	Market share, productivity, firm growth	Structural changes (modernisation, diversification, transition)
Appropriation	Patent, secrecy, rent	Spillovers, entry, collective emulation
Measurement	Standard indicator framework, innovation survey	???

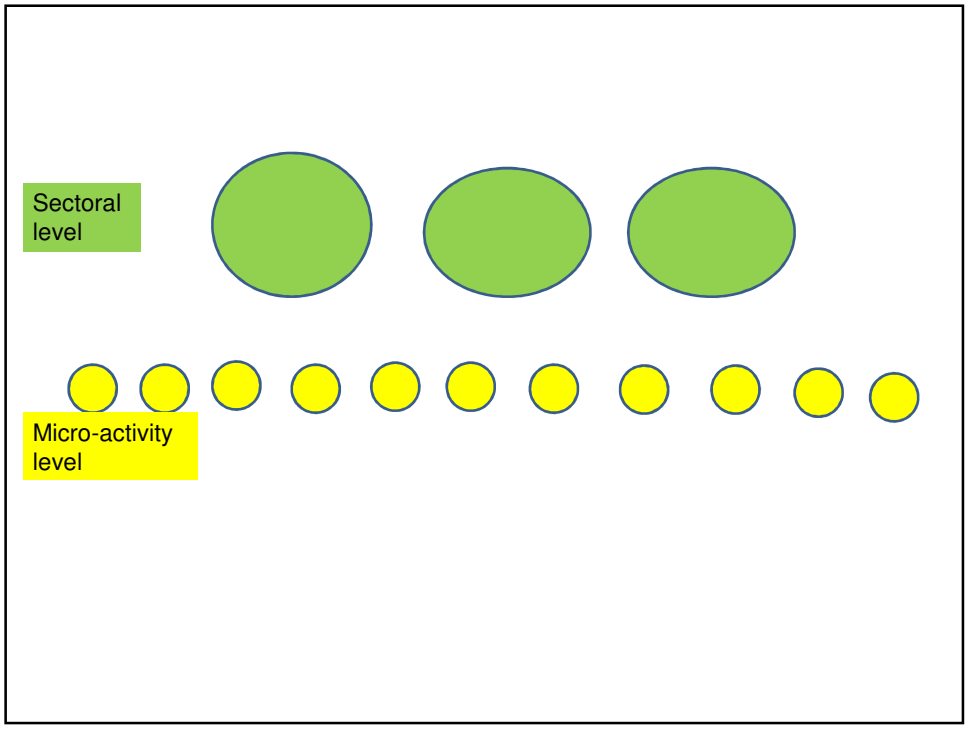
- The importance of entrepreneurial discovery..
- ..for modest and moderate innovative regions
  - To construct a new area for future competitive advantages
- ..as well as for leading regions
  - «*you are good in innovation; are you as good in entrepreneurial discovery?*»

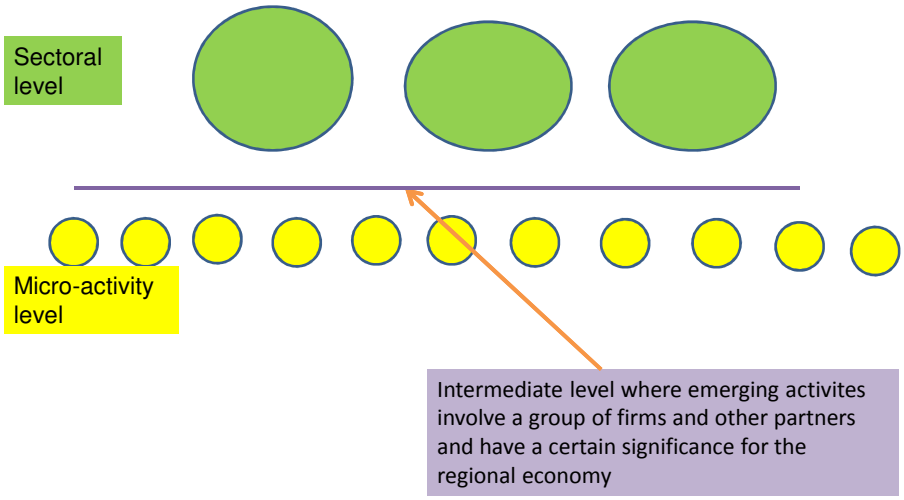
2 – New activities

- The response to the big question 'what are my priorities?' is not given at sector level nor at the individual level of companies but at the level of « new activities »
  - In the pulp and paper/nano case, what needs to be prioritized is not the sector as such but ***the activity of exploring the potential of nano*** to improve operational efficiency
  - In the plastic industry case, what is supported is not the plastic industry as such but ***the activity of exploring diversification path*** of the plastic firms from the car industry to biomedical sector
- These activities:
  - Are new, aim at experimenting and discovering opportunities, have the potential to generate learning spillovers;
  - Are likely to generate desireable structural changes; and
  - Need public funding to emerge and grow (have scale and agglomeration economies, can fail because of coordination failures)
- In doing so, the government achieves two things: i) improves the general performance of a sector; and ii) builds capabilities

- What level of agregation to observe, detect and set priorities?
- A too high level transforms smart specialisation into sectoral prioritization…
- ..but a too fine grained level transforms smart specialisation into an horizontal policy (through which all projects of some merits will be funded)

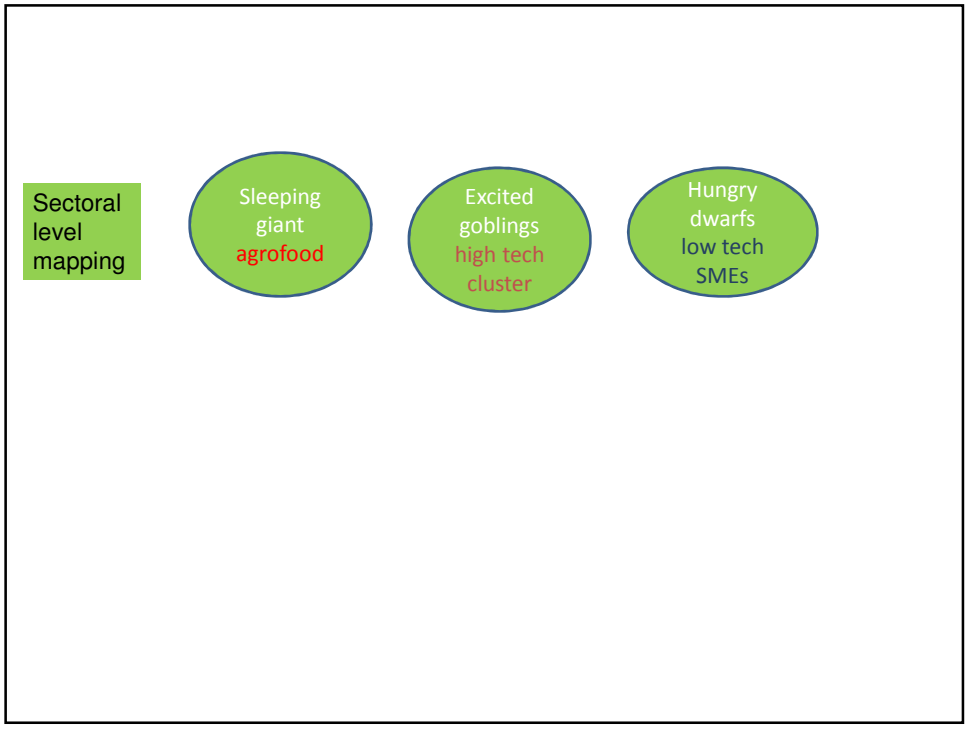

Sectoral level

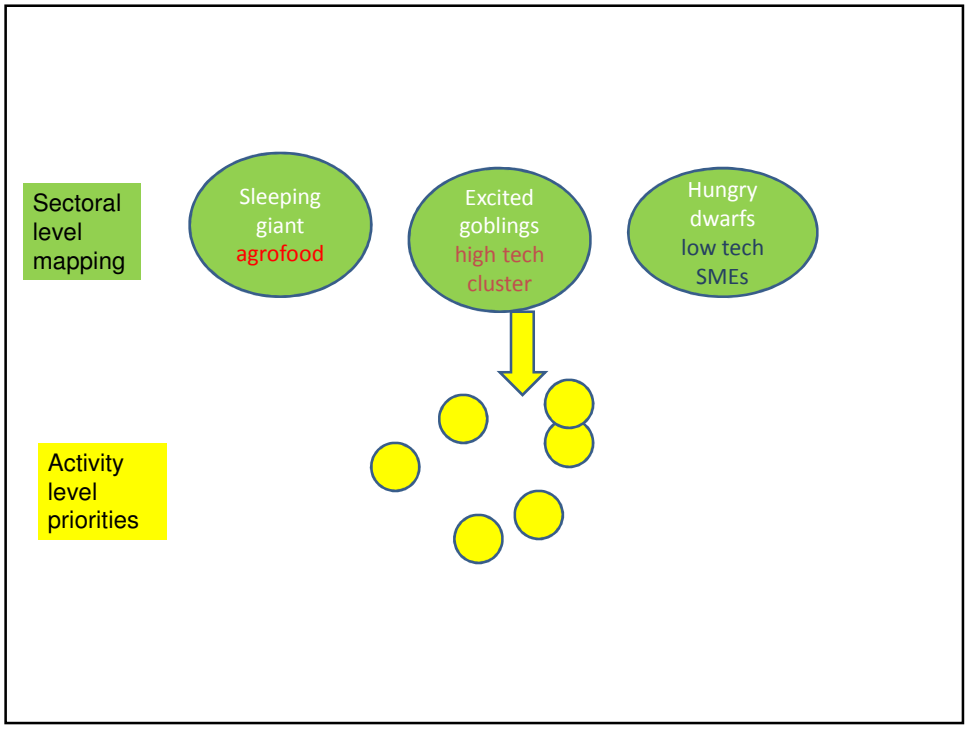

Sectoral level
Micro-activity level

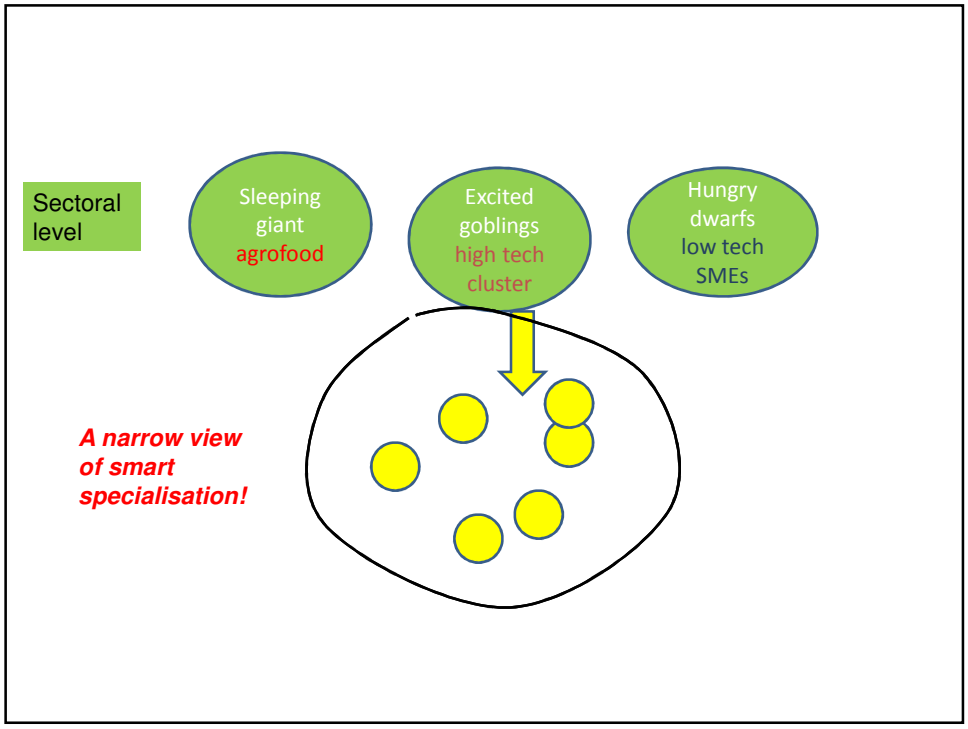


3 - Inclusiveness

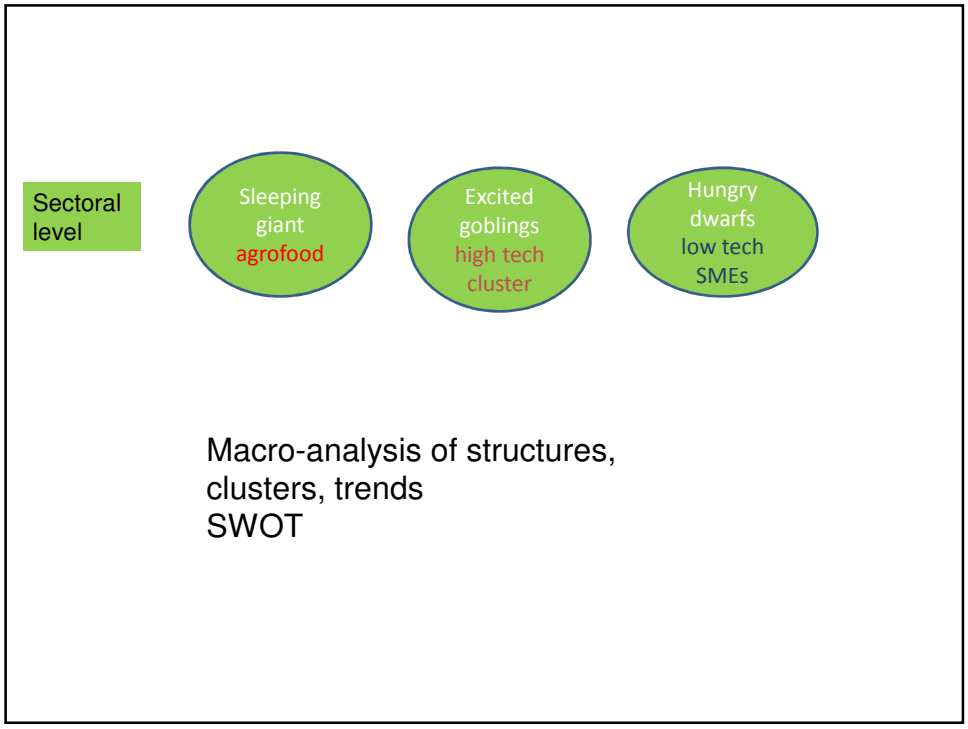
- Vertical choices : identification??
- Thought experiment
  - Huge agro-food sector : **sleeping giant**
  - High tech cluster**: excited goblins**
  - Low tech SMEs: **hungry dwarfs**
- With a *wait and see* policy, il is likely that the excited goblings will corner the whole funding (they have so many good projects) while the other sectors are sleeping. But need also to be part of the strategy (need for modernisation, diversification)

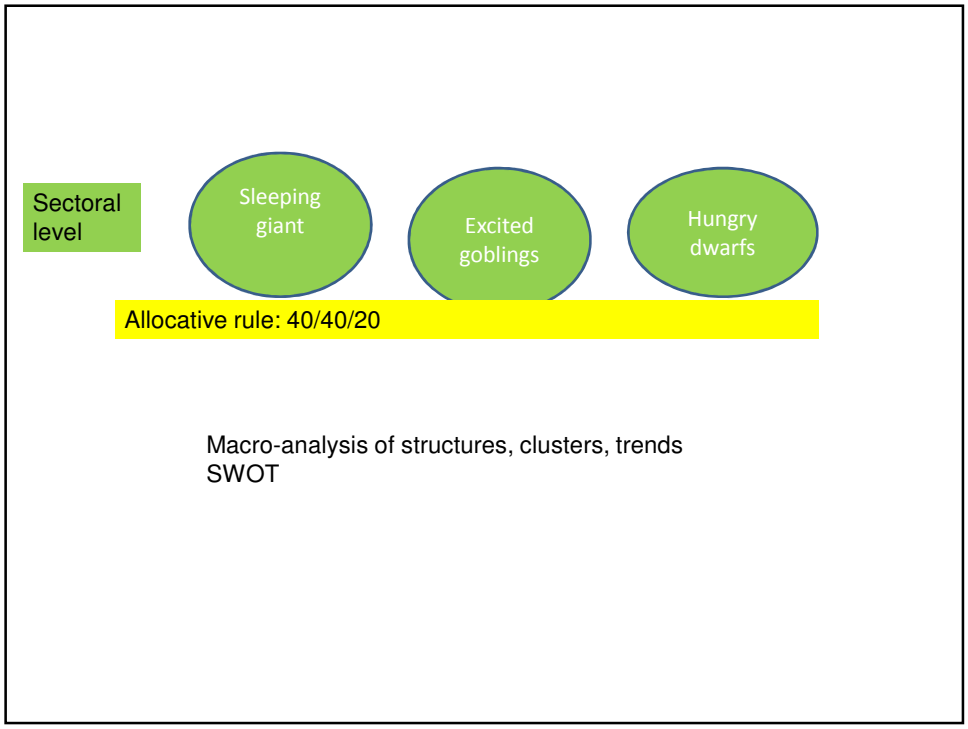

Sectoral level mapping
Sleeping giant agrofood
Excited goblings high tech cluster
Hungry dwarfs low tech SMEs


Sectoral level mapping
Sleeping giant agrofood
Excited goblings high tech cluster
Hungry dwarfs low tech SMEs
Activity level priorities

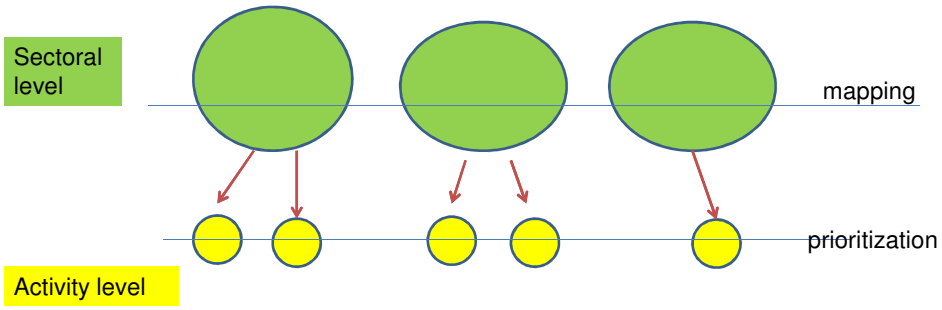


- Does not mean that you need to support a project in every sector…but to give every sector a chance to be present in S3 through a good project
- *«While dynamism is crucial, we want dynamism with economic justice – with what I call economic inclusion. It means drawing companies and people into the economic sector of a modern economy, where new ideas for new processes and products are conceived and experimented» (E.Phelps, 2012)*

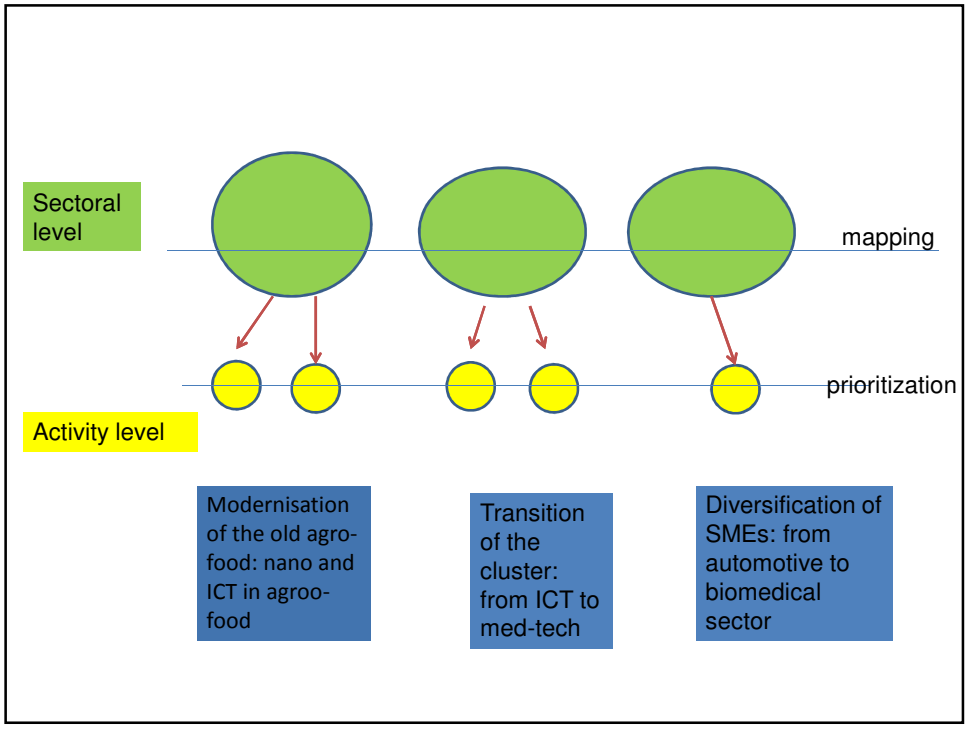

Sectoral level
Sleeping giant agrofood
Excited goblings high tech cluster
Hungry dwarfs low tech SMEs
Macro-analysis of structures, clusters, trends
SWOT

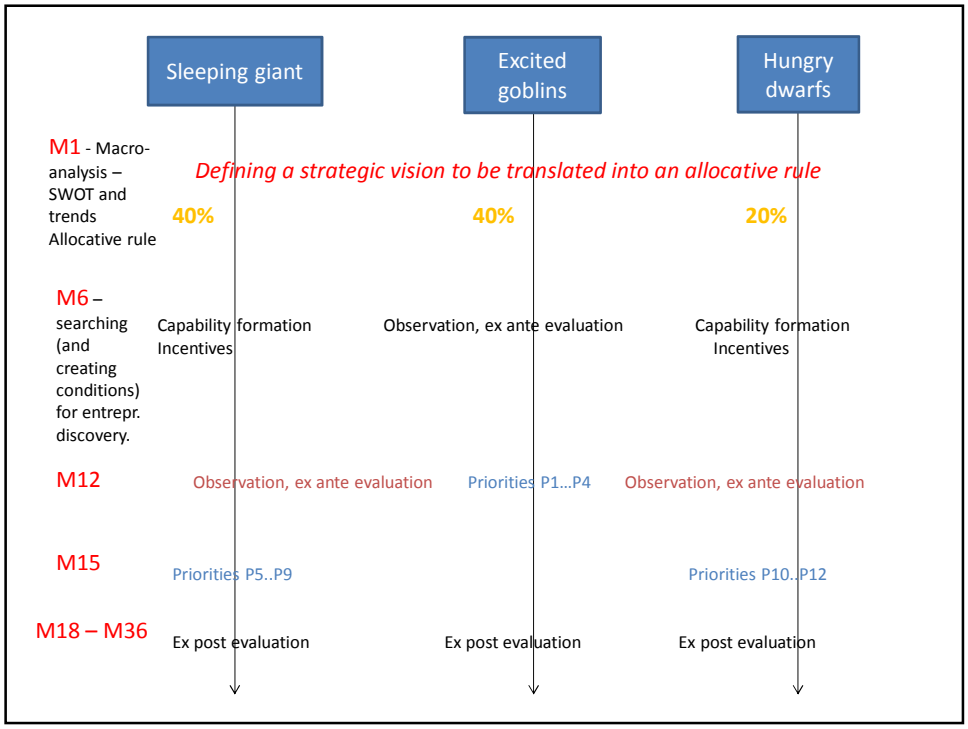

Sectoral level
Sleeping giant
Excited goblings
Hungry dwarfs
Allocative rule: 40/40/20
Macro-analysis of structures, clusters, trends
SWOT

- But the macro-approach **only** does not determine the vertical priorities
  - It determines the structural shape of the budget devoted to smart specialisation
- The priorities will emerge from the macro-analysis **AND** the best knowledge of the policy makers about entrepreneurial discoveries and emerging activities
  - The strategic vision needs to be validated by the quality of entrepreneurial discoveries



By combining the macro-level analysis with the observation of micro-dynamics (emerging activities), the strategy will highlight the 5 to 10 priorities distributed through the regional economy according to the allocative rule.


Sectoral level
mapping
prioritization
Activity level
Modernisation of the old agro-food: nano and ICT in agroo-food
Transition of the cluster: from ICT to med-tech
Diversification of SMEs: from automotive to biomedical sector


Sleeping giant
Excited goblins
Hungry dwarfs
M1 - Macro-analysis – SWOT and trends Allocative rule
Defining a strategic vision to be translated into an allocative rule
40%
40%
20%
M6 – searching (and creating conditions) for entrepr. discovery.
Capability formation Incentives
Observation, ex ante evaluation
Capability formation Incentives
M12
Observation, ex ante evaluation
Priorities P1…P4
Observation, ex ante evaluation
M15
Priorities P5..P9
Priorities P10..P12
M18 – M36
Ex post evaluation
Ex post evaluation
Ex post evaluation

Example : Limousin

- Activity related to the science & high tech cluster
- ICT development for a rural territory
  - A group of specialised firms, services, labs and communities addressing a set of innovation problems to develop ICT applications
  - Rapid feedback from the «market»