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## **Emerging industries workshop**

**What are the specific challenges of clusters in emerging industries?**

**What do cluster managers need to do differently in emerging industries?**

**How must policy makers specifically help clusters in emerging industries?**

**How can future emerging industries be identified?**

**Chair: Ms Zita ZOMBORI**

**Co-speakers: Ms Erica MONFARDINI, Ms Patricia KOTNIK,  
Ms Anikó CSERNY, Mr Ivan BOESSO, Ms Dorota Frączek  
Mr. Gerd MEIER ZU KÖCKER,**

# Question 1. Report

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## What are the specific challenges of clusters in emerging industries?

- Financing; Investment is risky as the outcomes are not clear
- Finding customers, communicating the added value
- Finding partners; difficulties in convincing them about the opportunities
- Timing; when to enter the market? Too early is expensive and risky (considering maturity vs ability to deliver what's promised), vs identify benefits before competitors
- Scaling up, maturity, reproducibility, reliability
- How to get relevant tech roadmaps and forecasting
- How to be aware of all drivers of change?
- Critical mass; need second suppliers & clever competition
- Need clever cluster management
- Need completely new support mechanisms; more tailored funding to cluster initiatives
- Economic crisis forces to take a new approach – an opportunity?
- Foresighting! To identify what's emerging in the region
- Finding & applying the best practices
- Need entrepreneurial alertness, interdisciplinary collaboration
- Go beyond the traditional definition of a cluster, beyond triple helix; include users and finance
- Identify infrastructures, competences and skills
- Intercluster collaborations; smart specialization

## Question 2. Report

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### What do cluster **managers need to do differently** in emerging industries?

- Organizing the community – unofficial meetings, networking, sharing information (coffee and good beer needed 😊)
- Need access to partners & investors
- Help in access to capital
- Help in finding the first customers, promote the products, brochures
- Know the markets around you,
- Encourage in selecting the market (geographically and sectorally)
- Identify and disseminate the trends
- New solutions to new markets, creativity, Interdisciplinarity
- Support in strategic business development
- Promoting open innovation – create platforms
- Support in getting public funding to growth
- Defining the skills and competences needed; providing education
- Improving the skills of cluster managers; incentives not to lose the clever ones?

## Question 3. Report

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### How must policy makers specifically help clusters in emerging industries?

- Learning capabilities; provide education,
- Create incentives to attract the best people
- Grant application process might be too rigid
- For an SME it is **very expensive to a product on market** (EFSA, need dossiers)
- Non-monetary aid like meetings; useful to create connections
- **Connect the emerging technologies with the region's existing industrial strongholds**
- **Utilize innovative public procurement to support emerging industries (to allow proof of concepts, demonstrations)**
- Not to interfere day to day work, trust but monitor
- **Be patient with the impacts! No results in 2 years**
- **Create links: emerging tech cluster should not be isolated from the other innovation program**
- Be open minded; be alert to recognize the new opportunities
- Plans that increase GDP more attractive to public authorities - force to think in new ways
- Companies working together; it is not necessarily called a cluster, however should identify clusters so that the competition authorities do not mis-interpret it as illegal activity

## Question 4. Report

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### How can future emerging industries be identified?

- Do not rely on existing clusters; they'd just try to figure out what could be their business opportunities in the new niche
- Look adaptive clusters with critical mass, infrastructure, success; identify who creates growth (turnover, exports)? ask, support, link with SSS
- Identify tech leaders in niches & the market needs (collaborate with market analysts)
- Intensive communication
- Not enough knowledge & statistics from the regions – could use Eurostat & national statistical offices
- Looking statistics is however looking back – look funding agencies' data?
- Why do we need to know emerging clusters? Lower number of crimes would encourage to basic businesses which would create more wealth
- Cluster managers to systematically identify, gather, document and disseminate signals

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## Finnish Nanocluster's innovation toolkit to commercialize academic know-how

- **Educate to commercialize**  
Widen the scientists' skill sets
- **Encourage to commercialize**  
Prizes, honour, publicity, prospects
- **Promote the sources of new know-how**  
Recognize, document, interpret, disseminate
- **Promote the new business**  
Look for and provide opportunities
- **Support growth**  
Know the success factors  
Educate in business skills  
Nourish continuous renewal



## The Finnish nanotech success factors

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**The number of Finnish nanotech companies tripled in 3 years**

**– but there has been years of simultaneous & parallel support of all public players**

- **Infrastructure investments: Ministry of education and science**
- **Basic research: FinNano program of Academy of Finland**
- **Applied research: FinNano & Functional materials of Tekes**
- **Long term funding for the best: Centres of excellence in research**
- **Commercialization: Tekes TULI funding, FinNano, Nanocluster**
- **Skilled labour: Graduate Schools, networked**
- **Industrial R&D: FinNano & Functional materials programs of Tekes**
- **Cohesion within the nano community: FinNano, Nanocluster**
- **Domestic promotions to potential user clusters: Nanocluster**
- **International promotions: Nanotech Finland: Nanocluster & Tekes**
- **Growth: Tekes Young innovative enterprises funding**
- **Industry point of view: private sector participates & advices**
- **Private sector's expertise: private service providers' utilized**

See [www.nanobusiness.fi](http://www.nanobusiness.fi)

## **Example on a brilliant start up; business opportunity in recycling**

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<http://www.youtube.com/watch?v=bPDH2uSaQeY>