Grand Challenges Responding Research Priorities

Remarks from Finland

Dr. Totti Könnölä, Impetu Solutions

The European Foresight Platform Final Event Forward Looking Activities Governing Grand Challenges September 27–28, 2012, Vienna



FinnSight 2015

Information and communications

Environi

Materials

Health and well-being

- biomedical research
- brain and neuro research
- the development of ICTs that promote public health
- physical exercise and nutrition research
- mental health and substance abuse research
- home care and telecare technologies
- pharmaceuticals research
- research supporting the social and health care system

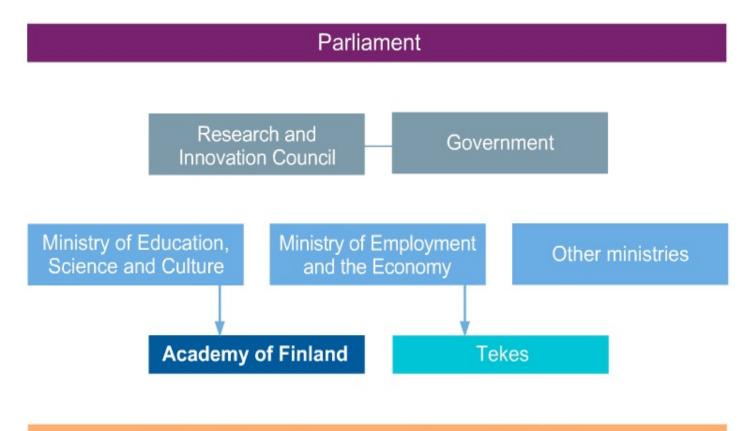


The Strategic Centres for Science, Technology and Innovation (SHOKs)

- Energy and the environment CLEEN Ltd
- Metal products and mechanical engineering FIMECC Ltd
- Forestcluster Ltd
- Information and communication industry and services TIVIT
- Built environment innovations RYM Ltd,
- Health and wellbeing SalWe Ltd



Public research funding in Finland



Universities and government research institutes



Government Foresight Report (on-going)

Finnish sustainable growth and well being of citizens in 2030

- Themes
 - Scarcity of opportunities
 - The new geography of the North
 - Business renewal
 - Governance as an enabler for future work
 - Citizens' well-being and inclusion
 - In addition, in all the themes reflections on
 - ICT opportunities,
 - flexibility and resilience,
 - know-how,
 - global dimensions.



:nirpa

About NIRPA

Concepts

People & Institutions

Links

Comments

Documents

NIRPA Final report

Stockholm Workshop Presentations

Stockholm Workshop Videos

Stockholm Workshop Documentation

News

Stockholm Workshop

Oslo Workshop

Helsinki Workshop

Copenhagen Workshop

September 2012							
Mon	Tue	Wed	Thu	Fri	Sat	Sun	
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No events.

Joint Seminar: Research policies for grand challenges – strategies and tools

Nordic Network for International

Research Policy Analysis

Welcome to the Joint Seminar of NIRPA , NordForsk and Academy of Finland

RESEARCH POLICIES FOR GRAND CHALLENGES - STRATEGIES AND TOOLS

Helsinki, 22-23 September 2011

Countries all over the world are facing grand challenges of a global scale and, in the future, science will play an emerging role in society's response to them. Accordingly, the agenda-setting, coordination and conduct of science, and the ways in which scientific knowledge is used, are key issues.

Future research policies increasingly have to take into account that grand challenges entail complex, interactive systems. Accordingly, different stakeholders have to be involved, representing society at large, different sectors of society in addition to the research and innovation system. A flexible and more strategic approach is needed based on interaction between all relevant actors, between national and EU efforts and between European and global efforts.

The Academy of Finland, the NordForsk and the Nordic Network for International Research Policy Analysis (NIRPA) will organize a joint seminar that will focus on the role of research in grand challenges:

1. How are research policies for the grand challenges be defined, prioritised, managed and evaluated in a sustainable way at national and regional levels?

2. How to identify the tools preded?



Home

Programs and projects

Apply for funding

Research policy and cooperation

About NordForsk

You are here: Home) Health, welfare and medicine



Health, welfare and medicine

Here you will find information about programs and projects within the health, welfare and medicine. Interdisciplinary projects can also be found under other topics.

Calls for proposal

 Call within the Education for tomorrow programme - Nordic Centre of Excellence

Programs

- · Education for Tomorrow
- Nordic eScience Globalisation Initiative (NeGI)
- The NCoE Programme on Food, Nutrition and Health
- Nordic-Baltic research and innovation programme on Living Labs (LILAN)
- Citizens' Services

Calls for Proposal

Preannouncement within the programme Education for Tomorrow – Nordic Centre of Excellence Application deadline: Nov 06, 2012

Preannouncement: A Nordic Grand Challenge Research Programme on eScience in Climate and Environmental research

Application deadline: Sep 19, 2012 Call within the Education for

tomorrow programme - Nordic Centre

of Excellence

Application deadline: Nov 06, 2012

Reporting procedures

Report forms for projects starting before spring 2009

For projects starting after spring 2009, go to the application portal to report

Newsletter	
Email	
Subscribe >	

Research and Innovation Council

Research and Innovation Policy Guidelines for 2011–2015

- International strategies
 - Grand societal challenges will steer the focus of national and international R&I policy.
 - Finland must make content choices that interlink with EU 2020 Strategy.



Academy of Finland

Academy Board

Research Council for Biosciences and Environment

Research Council for Culture and Society Research Council for Natural Sciences and Engineering

Research Council for Health

Administration Office



Source: Academy of Finland 2012

Grand societal challenges

Academy

- A Healthy Everyday for All
- The Ageing Population and Individuals
- The Northern Climate and Environment
- Sustainable Energy
- Knowledge and Know-how in the Media Society
- Dialogue of Cultures

EU Horizon 2020

- Health, demographic change and wellbeing;
- Climate action, resource efficiency and raw materials;
- Secure, clean and efficient energy;
- Inclusive, innovative and secure societies.
- Food security, sustainable agriculture, marine and maritime research and the
- bio-economy;
- Smart, green and integrated transport;



Implementing Grand Challenges

- Look at the past: Analysis of Academy funding to projects associated with the GCs
- Workshops with researchers on elaborating the content of GCs
- Decisions on Academy research programmes, targeted research grants and other tools
- In identifying the projects to be funded
 - the standard procedure will be used: bottom-up applications from researchers, decisions on the basis of the scientific quality recognised by international peer reviewers



Grand Challenges and the Research Programmes

Sustainable Energy



The
Northern
Climate
and
Environme



A Healthy Everyday Life for All



Ageing
Population
and
Individuals



Dialogue of Cultures



Knowledge and Know-how in the Media Society



- SusEn
- Ketju
- FICCA
- Fotoniikka
- Materiaalit
- LASTU
- ASU

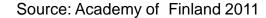
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- AKVA
- SusEn
- LASTU
- SALVE
- ASU

- SALVE
- SKIDI-KIDS
- Elvira
- Mieli
- WORK
- LACTI
- LASTU
- MotiveASU
- Materiaalit
- SusEn
- Fotoniikka
- Synbio

- ASU
- WORK
- Motive
- SALVE
- Fotoniikka
- Work
- Materiaalit
- Mieli
- Synbio

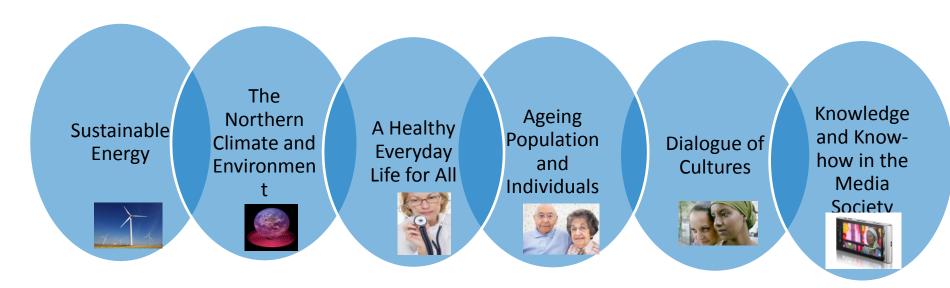
- WORK
- SKIDI-KIDS
- Mieli

Motive





Grand Challenges and the Centres of the Excellence



- Penttilä, VTT
- Aro, TY
- Hupa, ÅA
- Aro, TY
- Kulmala, HY
- Hanski, HY
- Hoikkala, JY
- Nikinmaa,TY HY
- Bamford, HY JY
- Palva T, HY TY

- Alitalo, HY
- Kaprio, HY
- Knuuti, TY
- Ylä-Herttuala, ISY
- Kallioniemi, HY
- Jacobs, TY
- Jalkanen, TY
- Saarma, HY
- Palva A, HY
- Hari, Aalto
- Toiviainen, JY

- Jacobs, TY
- •Ylä-Herttuala, ISY
- Alitalo, HY
- Kallioniemi, HY
- Kaprio, HY
- Saarma, HY
- Hari, Aalto

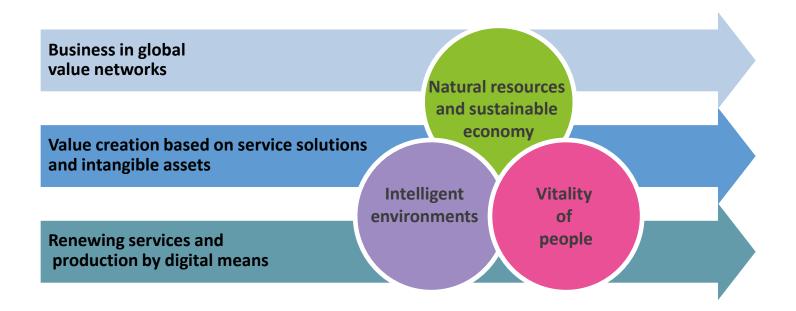
- Nevalainen, HY TY
- Klabbers, TY
- Palonen, JY
- Räisänen, Aalto
- Oja, Aalto
- Astola, TTY
- Ukkonen, HY Aalto



Source: Academy of Finland 2011

Tekes – the Finnish Funding Agency for Technology and Innovation

 In its strategy, Tekes specifies six focus areas in which Finnish companies and research have significant potential on the horizon.





Source: Tekes 2012



- Priorities on this area are:
 - Health promotion
 - Effective and high-quality social and health care service system
 - Work and learning that regenerate human skills and capabilities
 - Affective and meaningful free time experiences
- Tekes Programmes related to the focus area
 - Tourism and Leisure Services 2006–2012
 - Innovations in Social and Healthcare Services 2008–2015



Source: Tekes 2012







Home



Programme services



Current topics



Projects



Documents



Newsletter

Innovations in social and heathcare services 2008-2015

Based on its vision, the programme will renew health and social services and increase business opportunities through innovative activities.

The goals of the Innovations in social and healthcare services programme (2012-2015) are:

- * effective, customer-oriented health and social services
- * more extensive preventive actions
- * diversified partnership and cooperation.

Companies operating in Finland can apply for funding at any time. Research organisations may apply funding on specific application periods.

News

European healthcare evaluated using Finnish expertise 5.2.2010

Tekes to increase its investment in services to create global service companies 29.5.2009

> More news

Conclusions

- R&I policy
 - co-evolve with international developments
 - international GC orient national priorities
- Priority-setting in agencies
 - Tekes; industry
 - Academy of Finland; scientific community
- Health both in GC and funding programmes



Grand Challenges Responding Research Remarks from Finland

Thank you!

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