Session on Strategic Orientations for the Future of ERA – An introduction

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1- Where do we stand today

- An important on-going debate in academic circles
  - do not take for granted the integration of higher education, research & innovation in one policy
  - for policy purposes separate clearly Higher education and research from innovation
  - HE&R are taken as a critical framework condition for innovation in a knowledge-based society
- And a very different assessment of the dynamics of both
  - Well advanced Higher Education and Research area – with 5 issues still to advance
  - Still on the starting blocks after 30 years of discourse and multiple reports for the innovation area

Complete the HE&RA

1. Harmonised higher education landscape arrived at (the unexpected success of Bologna process).
   What we miss still: more systematic circulation of students (generalising the success of ERASMUS & equivalent actions)
2. Established policy for 'heterodox' or 'frontier' research and technology (ERC & FET)
   What we miss still: greater autonomy of agencies (which one for FET), and greater variety of instruments
3. A well functioning ESFRI
   What we miss still: procedural (not political) approaches for new types of infrastructures(les capital intensive, different ratio between initial investment & maintenance: e-based, banks)
4. Addressing logistical of EU free circulation
   Key point to implement: handling of social security and retirement aspects
5. ERA Nets enable to tackle diversity within EU
   What we miss still: a more encompassing and hands-off approach

Innovation area still in infancy

1. Framework conditions put forward at EEC times still not present
   - no effective European IP (compare with COV), no European level enforcement mechanisms, de facto limited voice in standards setting, weak principles for public procurement
   - the only effective tools come from other policies: REACH for chemicals, EMA for drugs
2. Still living with the 1980s compromise
   - EU level limited to precompetitive (but EC paranoia on procedures has killed most original procedures (e.g. OMI, energy experiments)
   - no 'industrial policy', no 'tax' policy
3. Limited unevaluated experiments in the 2000s: ETP, JTI (always the usual suspects) or EIT
4. Not a real measure of the role of 'collective goods' in innovation: starting point of EC intervention in the 1970s (health, renewable energy, environment), many proposals but mostly business as usual (R&D programmes). Is it up to climate change issues and energy transition?

2- Four Unintended aspects raised by VERA long-term scenarios

IFRIS

1. Though very different (see background document) all scenarios highlight the central role of 'framework conditions'
   - But they add to classical aspects (as mentioned before) the critical importance of infrastructures, both physical (transport) & intangible (internet)
2. None of the scenario considers the FP (and thus H2020) as a lasting form
   - But most also recognise the need to 'protect' the amount invested in anticipating the future
3. Only one scenario (the de facto 'trend scenario') puts excellence at a core dimension of policies, 'relevance' is more important in the 3 others
4. All scenarios propose a different understanding of 'public participation/debate', that is including Civil Society Organisations as key partners in policy making/shaping

First round of issues

1. What do we do to consolidate the ‘higher education and research area’? (see the 5 point on what we still miss)
2. How can we work seriously on the other framework conditions? Could we really advance IP, standards & procurement dimensions?
3. What does it mean for innovation policy to take ‘infrastructures’ as a major framework condition?
4. And for EU level priorities (societal challenges & others), what does it mean to distinguish between a ‘preserved fund’ and multiple ‘implementation structures’? How can allocations be made progressively? And which variety can we envisage in the ways to implement problem-based or sector-based priorities?

Implications on on-going discussions on coordination between national and EU levels

I see 2 main implications compared to today's practices

a) Policy making & Consultation processes: how to go beyond direct stakeholders (EUA, Science Europe, firms) & better integrate CSOs? How to take more seriously proximity dimensions (metropolitan areas & regions)?

b) Shaping the discussion on innovation policy around 4 aspects
   - framework conditions for firm innovation
   - higher education & research as a framework condition
   - targeted policies supporting certain types of firms (SME, start-up), certain technologies (e.g. nanotechnologies) or certain sectors (e.g. cultural goods)
   - innovation in collective/public goods (importance of 'downstream' actions, importance of 'bottom-up' experiments…)

Implications for the discussion of the sustainability of ERA

I seen 3 main implications compared to today's practices

- Distinguish between ERA the narrow way (HE&R area) & ERA the broad way (European innovation area)
- As mentioned challenges differ between the first (consolidate) and the second (make it happen at last)
- Change the focus of discussion on the second: less priorities & topics (the usual negotiation) than operationalising framework conditions (e.g. how to have one patent covering all member states) & creating 'mechanisms' & 'processes' that enable addressing priorities as they emerge.

A final comment on how academics view open innovation and/or science

IFRIS

- Open innovation is a lasting feature of innovation processes (key articles date back from the mid 1980s)
  - no firm, whatever its size can do everything on its own
  - emergence of 'innovation based value chain: suppliers become co-developers, 'lead users' co-frame product characteristics, and a greater call on knowledge producers (industry-university links, but more and more growing role of small high tech companies in a B to R mode)
  - classical policy answer: 'collaborative' programmes
- Open science & its 2 debates
  - open access to academic results: we need journals for certifying the robustness of results; we have delegated the cost to private operators. What policy to enlarge access: rather adopt a user perspective (helping them to access) rather than a producer one (see CAD-CAM policies of the 1980s)
  - including 'non professionals' in the production process (which seems feasible in a knowledge based society!). Do we need a policy for this? Or can present frames cope with it?

Returning to the 3 questions of the session

1. Before discussing new policies, would not it be more productive for the future of Europe
   a) to consolidate what we have done over the last 30 years (the higher education & research area)
   b) to really operationalize the repeated discourses on innovation framework conditions
   This would help address the first issues of the agenda: the roles & responsibilities of MS/CE.
2. Dealing with digital developments (third issue), the analysis drives to focus on 'infrastructures' both on the physical side and even more on regulatory aspects
3. This could also help focusing the third question about complementarities around the handling of societal challenges, about whom to involve in shaping policies (e.g. role of CSO), and about how to build new 'implementation structures'