Broadening the ‘evidence’

Results from comparing VERA and RIF

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Background

- ERA Policy rests on a number of fundamental lines of reasoning, but we can't be sure that they will hold in the longer term…
  - Scenarios as a means to question these rationales
  - RIF and VERA look into long-term, *transformative* futures
- Objectives
  - Identify 'key tenets' of current RTI policy in Europe
  - Extract alternative futures for these key tenets from RIF and VERA scenarios
  - Raise sensitivity that even some fundamentals may well be very different
- Approach
  - Meta-analysis of scenarios from RIF (focus on practices and organisations) and VERA (focus on EU institutional frames)
  - Complementarity allows broadening the 'evidence' base

Teasing out what alternatives the scenarios suggest to some of the arguments underpinning current ERA / STI policy

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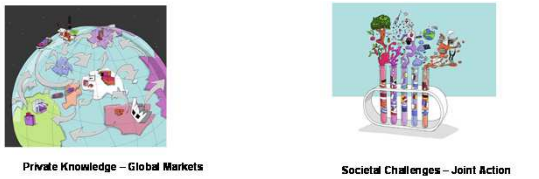

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RIF scenarios	VERA scenarios
Scenario 4: Knowledge Value Chains Research for innovation in a specialized and stratified R&I landscape, led by industrial players	**Scenario 1: Private Knowledge – Global Markets** R&I expenditure dominated by firms and philanthropic organizations; knowledge production takes place in globally interconnected knowledge hubs.
Scenario 3: Grand Challenges for Real Collective experimentation in socio-technical labs, aiming to tackle Grand Challenges in a transdisciplinary manner	**Scenario 2: Societal Challenges – Joint Action** Joint Actions at EU-level to tackle societal challenges emerge as large public programmes complemented by NGO investment and activities
Scenario 2: Knowledge Parliaments The free negotiation of diverse knowledge claims for relevance to real-world challenges puts into question the hegemony of science	**Scenario 3: Solutions apart – Local is beautiful** A paradigmatic shift towards new lifestyle and self-optimization entails a preference for local solutions to social problems and influences the attitudes towards R&I heavily.
	Scenario 4: Times of Crises–Experts at the Wheel A new sense of 'deep sustainability' on which all economic, political and societal activities are based requires targeted scientific adaptation solutions.
Scenario 1: Open Research Platforms The self-governance of R&I communities takes place in a decentralized manner on a global landscape	
Scenario 5: Researchers' Choice Autonomous researchers go for entrepreneurship, self-fulfillment and wellbeing	

Five key tenets of European STI policy

- Key tenet 1 Scientific Excellence
  - “Promoting scientific excellence is a central pillar of European RTI policy from which major long-term benefits will result.”
- Key tenet 2 Public Funding of Frontier Research
  - “Public funding of “frontier research” is justified due to market failure arguments.”
- Key tenet 3 The Role of Scientific Knowledge
  - “(Academic) scientific knowledge has primacy over other forms of knowledge production.”
- Key tenet 4 ERA Coordination
  - “The integration and/or coordination of resources at European level are a pre-condition for organizing research effectively and efficiently by avoiding duplication of efforts, concentrating on harmonized roadmaps, and ensuring critical mass.”
- Key tenet 5 The Role and Purpose of R&I
  - “The main purpose of R&I is to create jobs and growth.”

Key tenet 1
(Scientific) Excellence

"Scientific excellence is a central pillar of European RTI policy from which major long-term benefits will result."

?

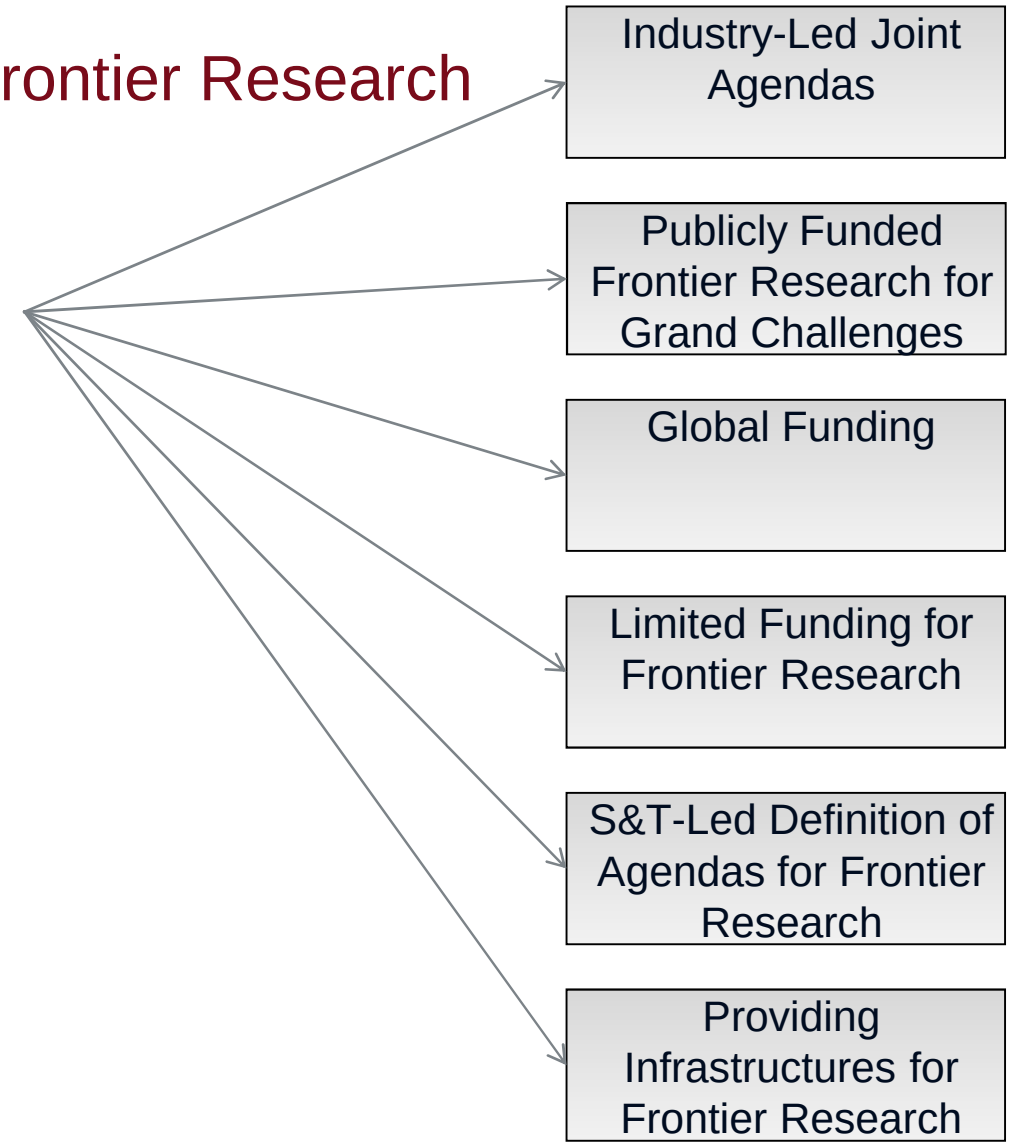
- Relevance?
- Definition?
- Inflationary claims?

Key tenet 2
Public Funding of Frontier Research

"Public funding of "frontier research" is justified due to market failure arguments"

?

- Philanthropy?
- Crowdfunding?
- Industrial frontier research?
- Thematic embedding?

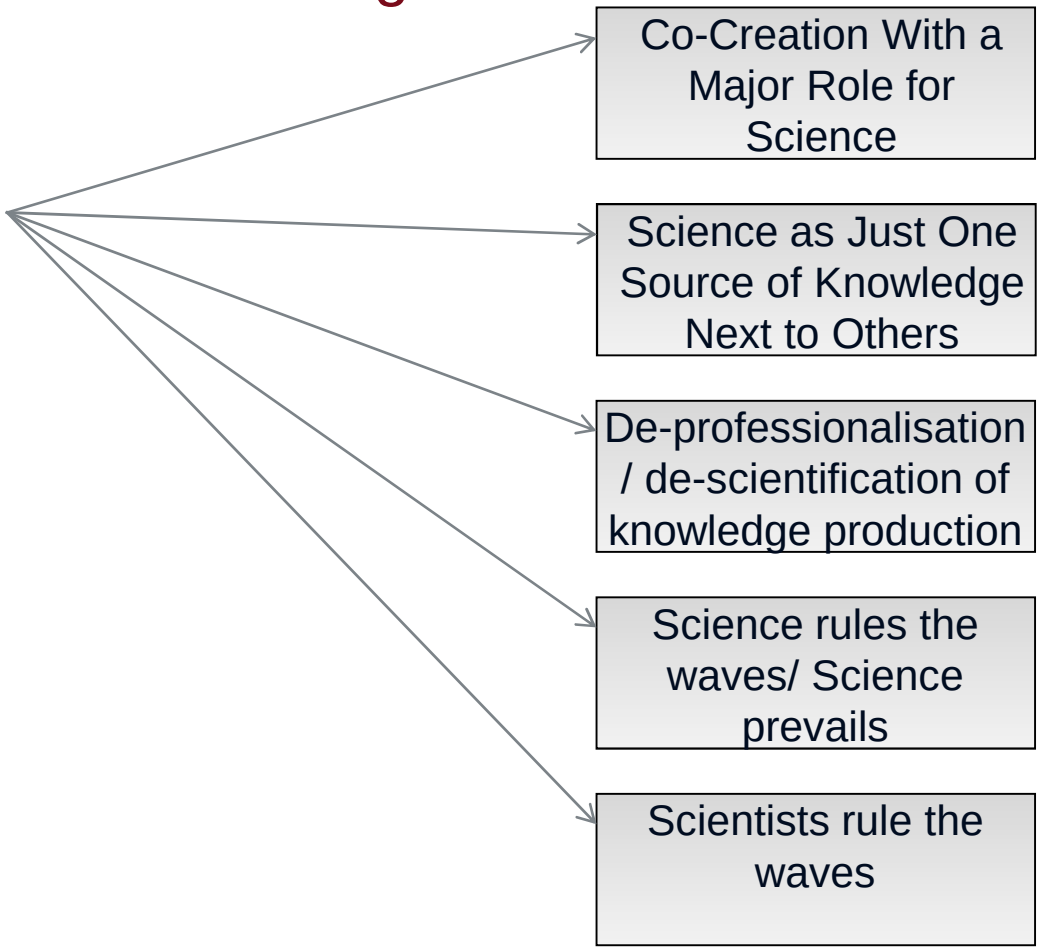


Key tenet 3
The Role of Scientific Knowledge

"(Academic) scientific knowledge has primacy over other forms of knowledge production."

?

- Intra-scientific controversies?
- Citizen science
- Individualisation?
- Big data?
- Usefulness?



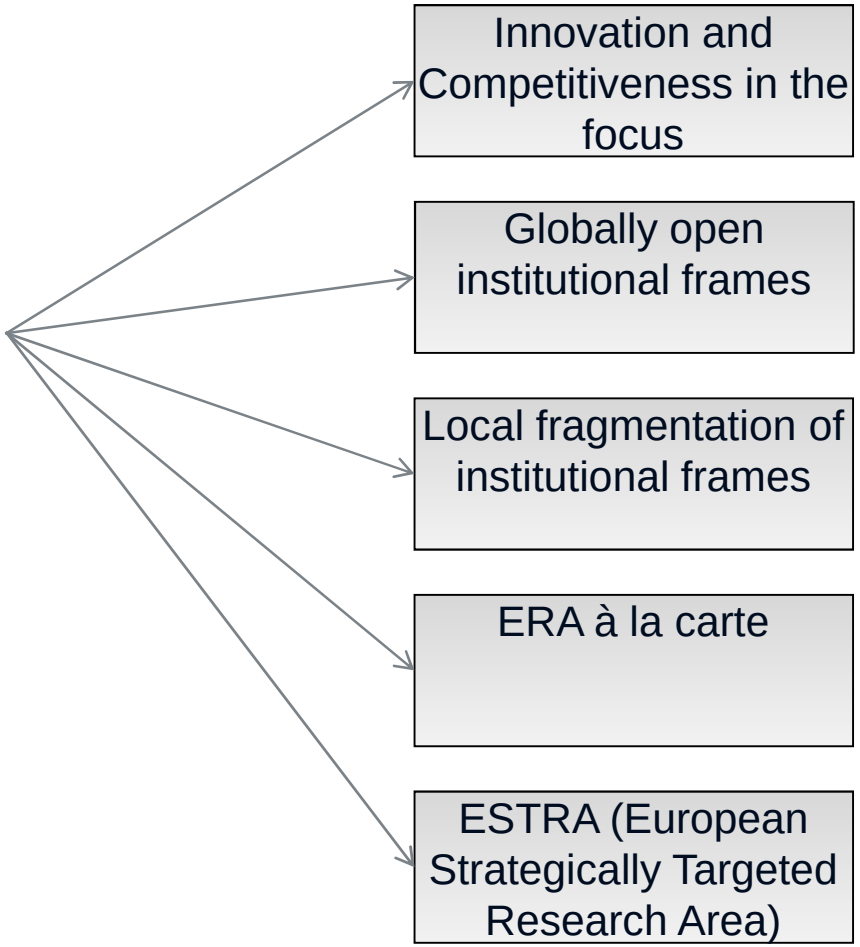
Key tenet 4
ERA Coordination

"The integration and/or coordination of resources at European level are a pre-condition for organizing research effectively and efficiently, by

- avoiding duplication of efforts,
- providing harmonized roadmaps,
- ensuring critical mass."

?

- Globalised knowledge production?
- Mistrust in European policy?
- Changing lifestyles?
- Rediscovery of the benefits of diversity?

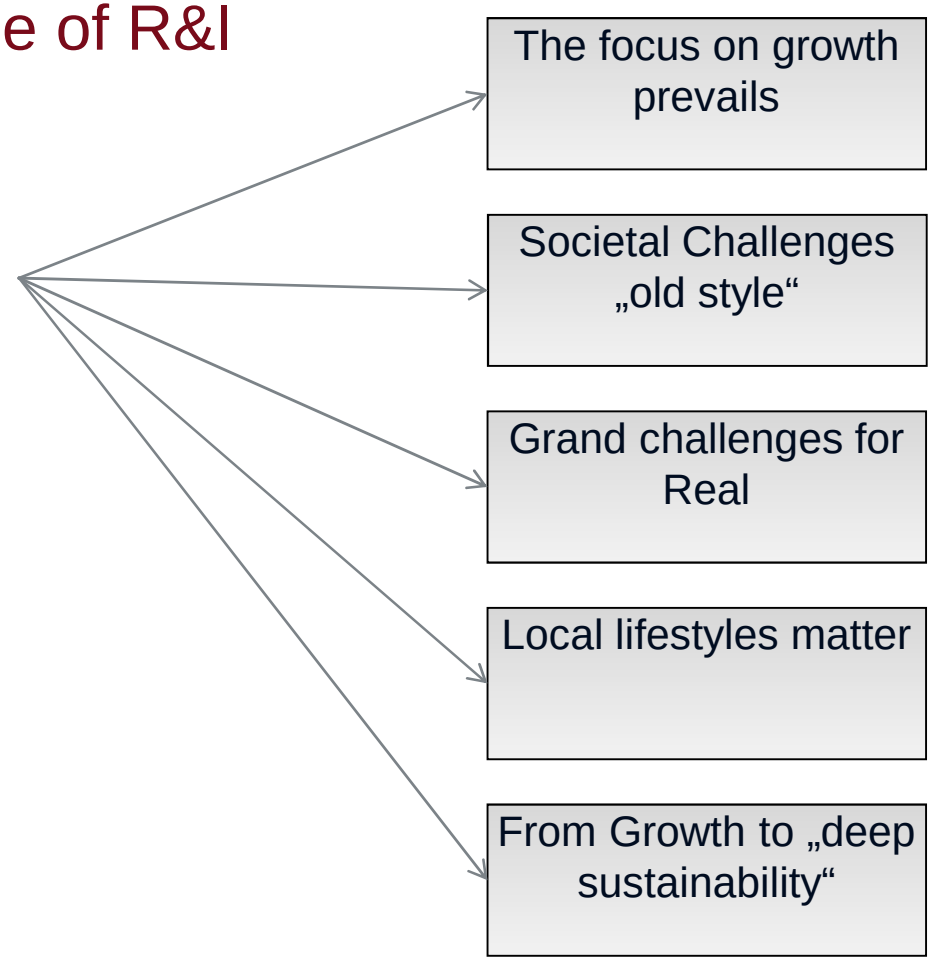


Key tenet 5
The Role and Purpose of R&I

"The main purpose of R&I is to create jobs and growth."

?

- Service economy?
- Alternative growth models?
- New values matter?



What scenarios suggest for the key tenets...

- Scientific excellence
  - Growing claims for “research with a purpose”, either for industrial or for Grand Challenge purposes, may question the emphasis put on scientific excellence.
- Public funding of “frontier research”
  - The significant space that is currently being given to frontier research may easily be questioned in the future, unless the economic or societal benefits can be forcefully demonstrated.
- The role of scientific knowledge
  - Science comes under pressure in several scenarios, because of competing developments in knowledge production, both internal and external to the science system.
- ERA coordination
  - ERA continues in many regards to be a meaningful frame in many scenarios, but global linkages and local concerns gain in importance and erode its relevance.
- The purpose of R&I
  - Growth and competitiveness orientation of R&I needs to be re-thought in view of scenarios in which the value of these concepts is increasingly questioned.

Final remarks

- We should not take current rationales for granted
  - The world of science and research is changing fast
  - Sharpen our perception of the present and sensitize to alternative futures
  - Different models may be suitable for different areas of research

- Broader ‚evidence-base' on alternative models to current cornerstones of European RTI policy
  - Just a first step; normative perspective needs to be added to move towards serious policy conclusions

- There is a need to prepare institutionally and politically for possible transformations ahead
  - Temporal mismatch between the pace of change in science and research, and our ability to adjust institutional settings

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