



Enhancing multi-stakeholders' capacity to engage in regional smart specialisation strategies

Module 1

About and around RIS3: What, Why, What for?



AUTHORIZATION



Objectives/Learning Outcomes

- Understand key concepts related to RIS3
- Identify different types of stakeholders involved in regional development strategies
- Get to know the respective regional innovation strategy
- Reflect on benefits of multi-stakeholder cooperation

Agenda

1. Check-in and expectations
2. Presentation of the course
3. The RE-ACT project
4. RIS3 and its importance
5. RIS3 in ... (each region/country)

CHAPTER 1

Check-in and expectations

Check-in and expectations



Presentation of each participant to the group: name, organisation/type of organisation, function.

Exercise (according to Support materials): Cooperation with others – experiences and expectations

CHAPTER 2

Course presentation

COURSE STRUCTURE AND METHODOLOGIES – HOW WILL IT WORK?

Enhancing multi-stakeholders' capacity to engage in regional smart specialisation strategies (training, self-study)

Enhancing regional collaboration (self-reflection and debate)



Enhancing multi-stakeholders' capacity to engage in regional smart specialisation strategies	Duration (total)	Training session	Self-study	Dates
1. About and around RIS3: What, Why, What for?	4h	2h30m	1h30m	
2. The stakeholders of RIS3: Who? To whom?	4h	2h30m	1h30m	
3. Reach-out and benefit from RIS3: How? What now?	4h	2h	2h	

Self-reflection and debate/ (Online questionnaire?)

CHAPTER
2

The RE-ACT Project



RE-ACT - EXPLORE THE INNOVATION POTENTIAL IN YOUR REGION!

<http://ris3heinnovate.eu/>



RE-ACT

Self-reflection Tools for Smart Universities Acting Regionally



[Home](#) [The Project](#) [HEInnovate](#) [Download Area](#) [News & Events](#) [Contact Us](#)



SELF-REFLECTION TOOLS FOR SMART UNIVERSITIES ACTING REGIONALLY

RE-ACT will develop, test and scale-up an innovative tool, using an interactive methodological approach and producing a useful set of resources - HEINNOVATE for RIS3- that will support HEIs

[KNOW THE PROJECT](#)

[CONTACT US](#)

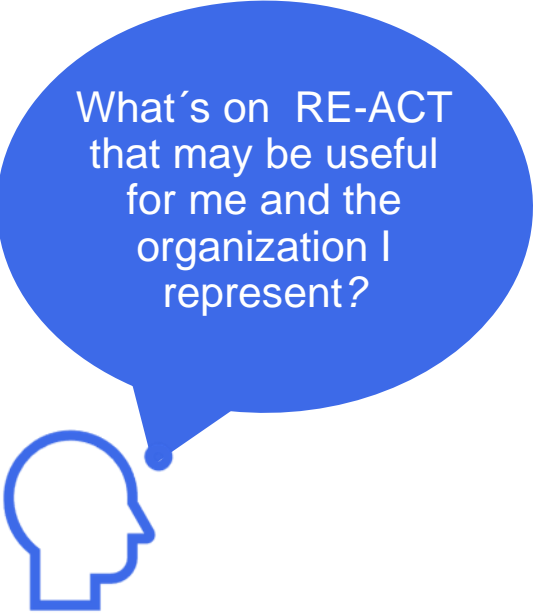


RE-ACT aims to support HEI's and stakeholders to revise their strategies, structures and actions in order to become **more engaged in the regional innovation ecosystem**

As a stakeholder representative you will:

- Better understand your role **in the regional ecosystem** and how all regional players can benefit from cooperation, especially with HEIs;
- Develop a vision of how to become regionally embedded in projects aiming innovation and turn this **vision into an actions**;
- Dialogue and **collaborate with other stakeholders, Universities and regional representatives** of the industry, policy and the community.

RE-ACT supports Organizations and Regions who wish to explore their innovative potential.



What's on RE-ACT that may be useful for me and the organization I represent?

HEInnovate for RIS3 online self-assessment tool and supporting resources



Porto Business School
(coordinator)
www.pbs.up.pt/

Capacity building programmes and resources for HEIs and regional actors



Corvinus University of Budapest
www.uni-corvinus.hu/

HEIs' self-assessment, organisational action plan and joint positioning



Technical University of Kosice
www.tuke.sk/

RIS3 design and other collaborative processes leveraged by HEIs and engaging key actors of the quadruple helix



University Babes-Bolyai
www.ubbcluj.ro/

UNIVERSITATEA
BABEȘ-BOLYAI

Trans-regional spillovers underpinned by a validated framework and facilitated by an effective peer support mechanism



University of Macerata
www.unimc.it/

White Paper with policy recommendations for HEInnovate for RIS3



SERN
www.startupregions.eu/



OVERVIEW



RESEARCH PHASE



Research activities

Literature Review

The role of HEIs in their regional environment. RIS3 and HEInnovate implication

Delphi Technique

HEInnovate implementation to enable HEIs to better operate within their regional innovation system

Interviews

Revision and implementation of HEIs involvement in RIS3.

Research Report



Research questions

*What and how should be changed in **HEInnovate** to be more in line with **RIS3** approach, and contribute to a more efficient involvement of HEIs in RIS3 process?*

*How can **HEInnovate** provide support in strengthening the role of HEIs as actors in regional innovation system?*

CHAPTER 4

RIS3 and its importance

RIS3

RIS3 = National/regional research and innovation strategies for smart specialisation: integrated, place-based economic transformation agendas to stimulate the sustainable economic growth of Europe through **knowledge** and **innovation**.

Source: European Commission Factsheet

https://ec.europa.eu/regional_policy/sources/docgener/informat/2014/smart_specialisation_en.pdf

Smart specialization

Capacity of an economic system [...] to **generate new specialities through the discovery of new domains of opportunity and the local concentration and agglomeration of resources and competencies in these domains**, by merging the existing industrial base with scientific resources, competencies and new technologies.

Source: Foray, D. (2015) Smart Specialisation: Challenges and Opportunities for Regional Innovation Policies, Routledge



▶ SMART

Identify the region's own strengths and comparative assets



▶ SPECIALISED

Prioritise research and innovation investment in competitive area



▶ STRATEGIC

Define a shared vision for regional innovation

Source: European Commission (2017). Smart Specialisation - Strengthening Innovation in Europe's regions.



INNOVATION

*activity itself and
outcome of an activity*

Innovation as an outcome “ is a new or improved product or process (or combination thereof) that differs significantly from the unit’s previous products or processes and that has been made available to potential users (product) or brought into use by the unit (process).”

*the generic term “**unit**” is describing the actor responsible for innovation, i.e. “any institutional unit in any sector, including households and their individual members”*

“**Innovation activities** include all developmental, financial and commercial activities undertaken by a firm that are intended to result in an innovation for the firm”.

- **knowledge** is the “basis for innovation, novelty and utility, and value creation or preservation as the presumed goal of innovation”

OECD (2018). OSLO Manual. OECD Publishing, p.20

- innovation is generated by the **exploitation** of knowledge produced by organisations that explore knowledge (*universities, R&D organizations*) or through **sharing** and **reinterpreting, recombining** existing knowledge; being favoured by proximity (*geographical, cognitive, social, organizational, institutional*).

Boschma, R.A. (2009). Evolutionary economic geography and its implications for regional innovation policy. Report for the OECD.

KEY ELEMENTS OF A SMART SPECIALISATION STRATEGY

Focus on
competitive
strengths

Place-based

Knowledge-based
development

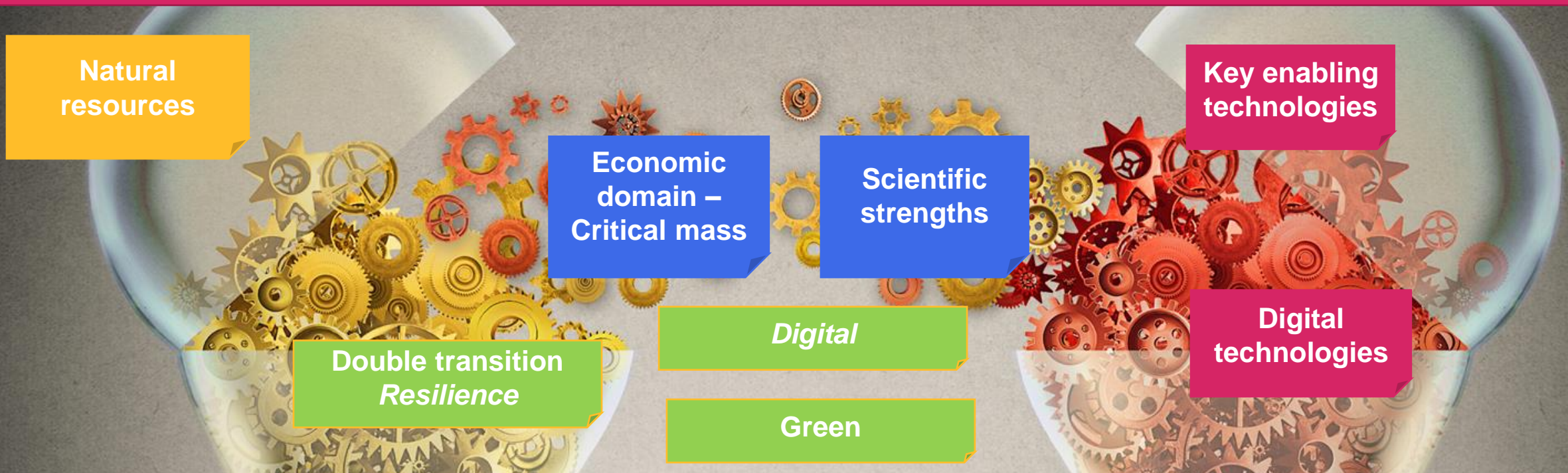
Entrepreneurial
discovery

Strategic
identification
of priorities

Innovation

- **Place-based and tailor-made approach:** S3 builds on regional and national assets and resources and on specific socio-economic challenges to identify unique opportunities for development and growth;
- **Focus on priorities and choices for investment:** S3 identifies priorities for knowledge-based investments and/or clusters, focusing on competitive strengths and realistic growth potentials.
- **Bottom-up:** Priorities are identified through an inclusive and interactive process of quadruple helix stakeholders' involvement centred on an “**entrepreneurial discovery**” (**experimental**).
- **Innovation:** supports technological as well as practice-based and social innovation and experimentation, also to stimulate private sector investment. The trend is to lead towards socio-technical system transformation.
- **Monitoring and evaluation system** as well as a revision mechanism for updating the strategic choices are needed, as S3 is evidence based and **reflexive**.

SMART SPECIALISATION PRIORITIES



⇒ **ECONOMIC TRANSFORMATION/STRUCTURAL CHANGE** through four patterns:

- **Diversification:** a new domain is created based on synergies between an existing and a new activity
- **Modernization:** efficiency and quality of an existing/traditional sector is improved through the application of a general purpose technology
- **Transition:** emergence of a new domain from the existing industrial base
- **Radical foundation of a new domain:** establishment of a new domain without a link to existing industries

Source: Foray, D. (2015) Smart Specialisation: Challenges and Opportunities for Regional Innovation Policies, Routledge

⇒ **SMART SPECIALIZATION FOR SUSTAINABILITY (S4) ⇒ SYSTEMIC TRANSFORMATION**

What is RIS3?

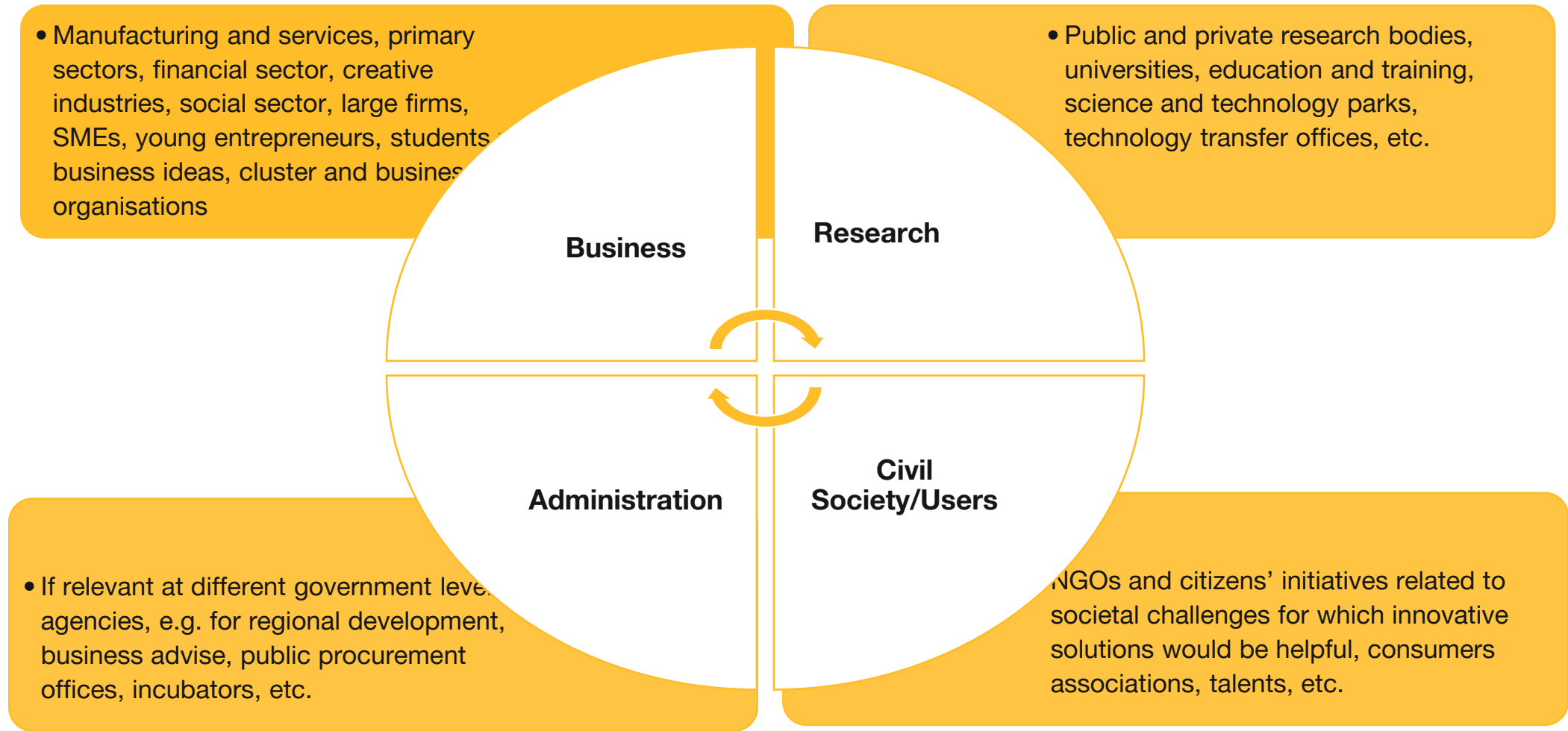
RIS3 stands for **Research and Innovation Strategies for Smart Specialisation**

- RIS3s represent an ambitious place-based and tailor-made industrial and innovation policy experiment;
- Are strongly connected to innovation, knowledge and new opportunities, as well as **integration in value chains and knowledge flows**;
- Were launched within the **EU Cohesion Policy 2014-2020** framework, by the European Commission their relevance is being increased for 2021-2027;
- Aim to promote regional innovation and economic transformation, to which aspects of industrial transition, green and digital transformation are added, as well as aspects linked to system transformation;
- Mobilizes entrepreneurial potential around emerging activities;
- Seeks to **improve governance arrangements**, concentrate resources, build critical mass and accelerate the uptake of new ideas.

Source: Guzzo, F & Gianelle, C. (2021). Smart Specialisation – JRC Policy Insights.
<https://s3platform.jrc.ec.europa.eu/s4>

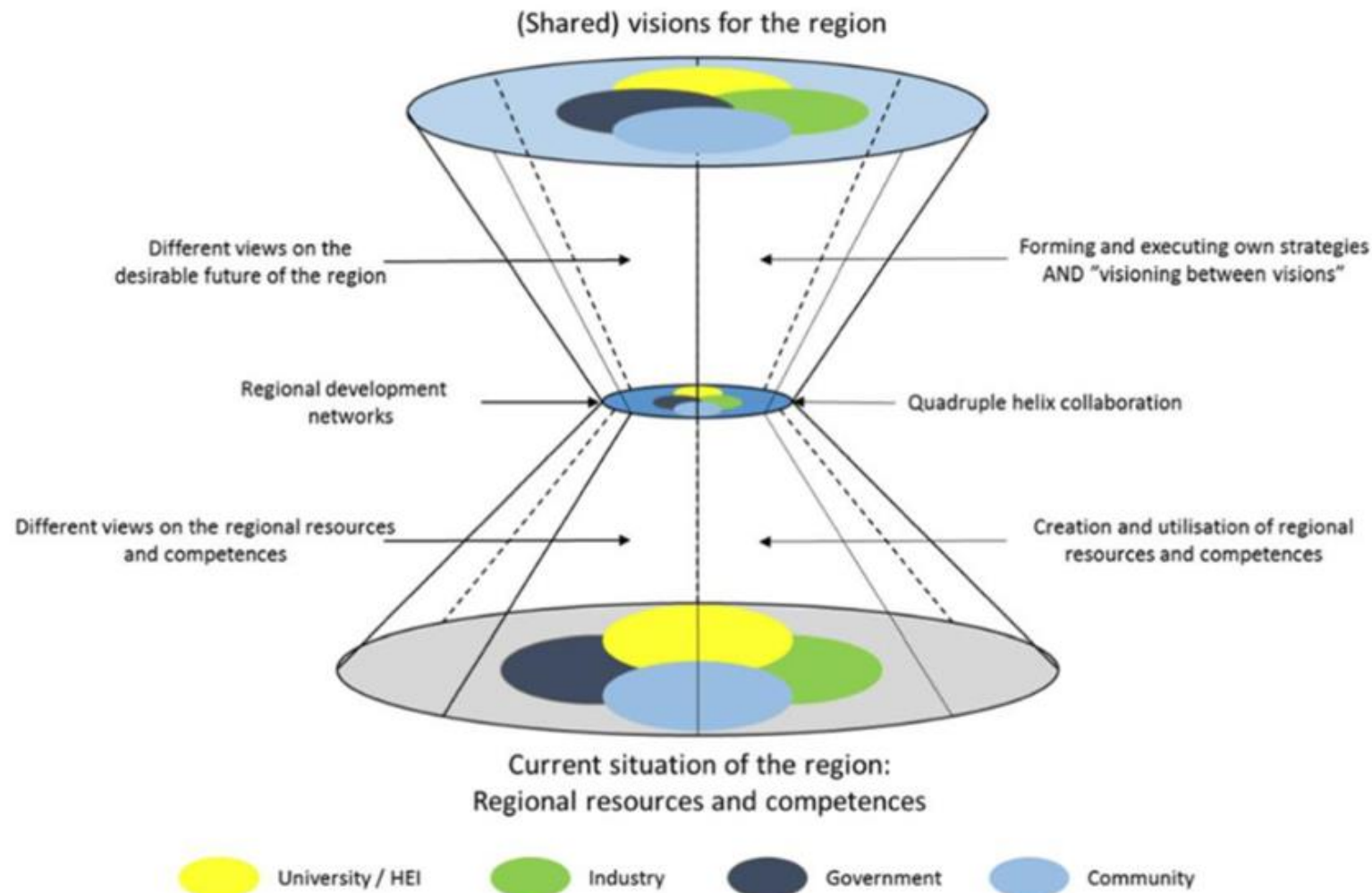
THE QUADRUPLE HELIX - - - “*entrepreneurial in spirit*”

The process of entrepreneurial discovery relies on the so-called **Quadruple Helix** approach related to the stakeholders representing key local actors, facilitating interaction between **representatives of the industry, of research and education organisations, of government or public administration, as well as of citizens, consumers and workers** (European Union, 2012).



THE QUADRUPLE HELIX APPROACH AND REGIONAL DEVELOPMENT

Collaboration among the stakeholders of the quadruple helix allows a better conciliation of different visions, resources and competences into a shared regional vision



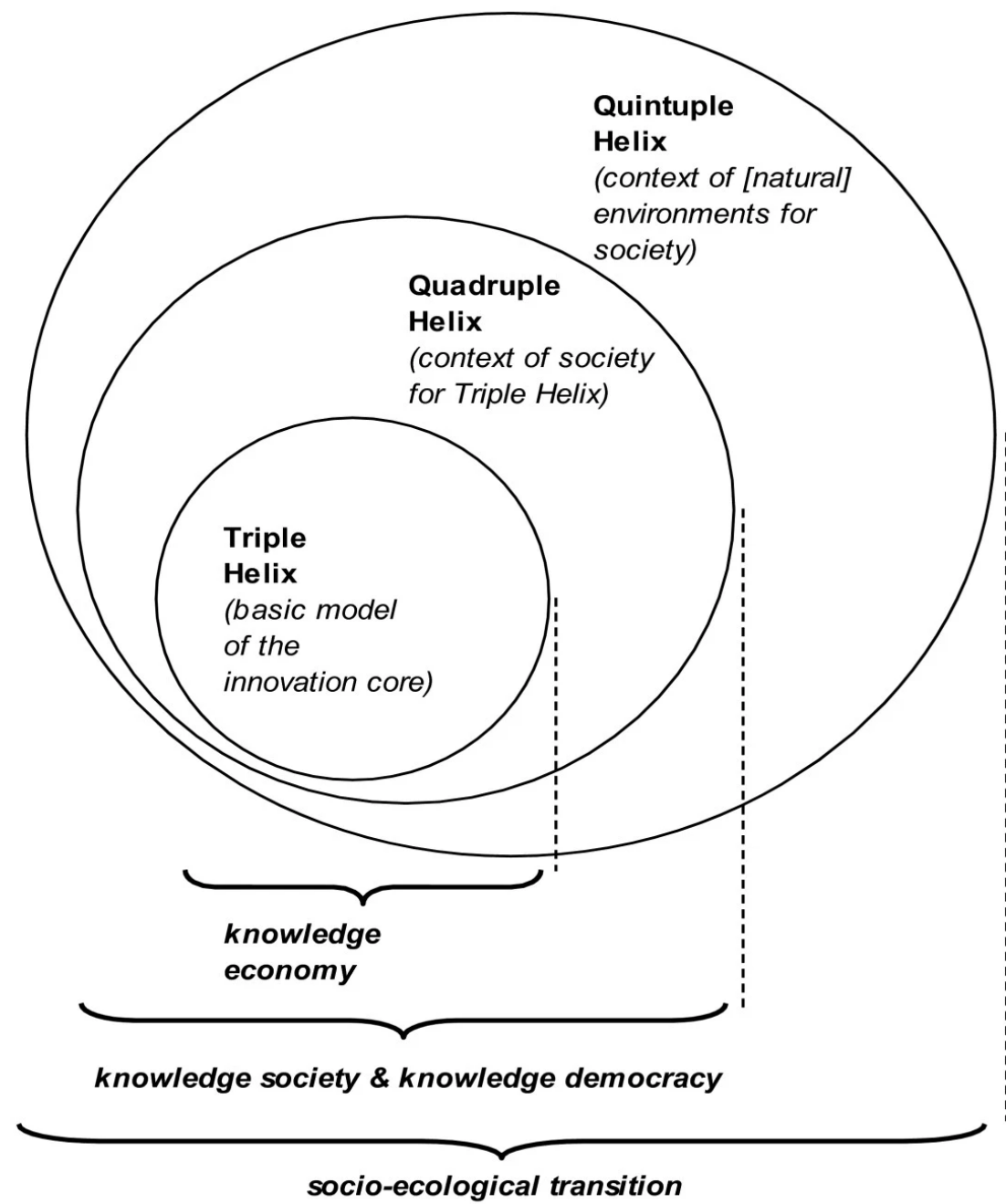
Framework for knowledge-based regional development

Source: Kolehmainen, J., Irvine, J., Stewart, L. *et al.* Quadruple Helix, Innovation and the Knowledge-Based Development: Lessons from Remote, Rural and Less-Favoured Regions. *J Knowl Econ* 7, 23–42 (2016).

THE QUINTUPLE HELIX APPROACH

+
sustainable development
+
climate change

Source: Carayannis, E.G., Thorsten B.D., Campbell, D.F.J.Ş
The quintuple Helix innovation model: global warming as a
challenge and driver for innovation. *J of Innovation and
Entrepreneurship* 1 (2), (2012). Doi: 10.1186/2192-5372-1-2



But how could stakeholders collaborate concretely?

As an example...

Universities, firms, and governments in a region may participate in discussions to enhance a local economy, develop a regional growth agreement, or establish a technology council.

As a result municipalities may agree to speed up building- permitting processes for new plant construction, universities may undertake to train more students in an area relevant to the local economy and firms may negotiate new supplier relationships with each other as an incipient cluster. At this initial level of the triple helix, **the three strands typically begin to interact in order to improve the local economy by enhancing the performance of existing industry.**

Etzkowitz, H. (2008), The Triple Helix. Taylor & Francis Group

Who is who?

Can you nominate an institution/organisation from your region which represents each part of the quadruple helix?

- Business***
- Research and Education***
- Public administration***
- Civil Society/users***



Strategies for innovation may look well designed in paper. However, they are often not implemented as expected due to some of the following **challenges especially characteristic to weaker or non-core regions**:

- unclear **attribution of roles and responsibilities**
- lack of **political support**
- **management bodies** not fully operating
- ineffective vertical and horizontal **multi-level coordination**
- weak **interaction with and involvement of the private sector**
- lack of adequate **training** for staff **on specific skills**
- **low capacity** of stakeholders
- lack of **resources** within administrations and relevant stakeholders

Due to these complexities, **the strengthening of governance structures and cooperation and interaction between stakeholders are crucial for Smart Specialization!**

Challenges of RIS3 design

Activity	Problems/challenges
Analysis of the context and potential for innovation	<ol style="list-style-type: none">1. Lack of data and/or data availability when needed2. Lack of evaluation studies and monitoring information on past policies3. Difficulties in getting civil society groups involved4. Lack of skills and capabilities in some groups of stakeholders
Monitoring activities	<ol style="list-style-type: none">1. Lack of data and/or data availability when needed2. Lack of evaluation studies and monitoring information on past policies3. Lack of skills and capabilities within the (regional/national) administration
Policy-mix and policy instruments	<ol style="list-style-type: none">1. Obstacles associated with the different rules governing diverse funding sources2. Synergies among policies and funding managed by different organisations placed on different level (EU, national, regional)3. Difficulties in managing/financing interregional collaborative projects4. Lack of skills and capabilities within the (regional/national) administration5. Difficulties in getting universities and public research organisations involved6. Difficulties in getting enterprises involved
Priority selection	<ol style="list-style-type: none">1. Difficulties in getting enterprises involved2. Lack of skills and capabilities in some groups of stakeholders3. Difficulties in getting civil society groups involved

Guzzo, F., Gianelle, C. and Marinelli, E. (2018), 'Smart Specialisation at work: the policy makers' view on strategy design and implementation', JRC Technical Reports JRC114141.

HEIs and cooperation with other actors in RIS3. The policy makers' perspective.

To support RIS3 implementation more effectively HEIs should:

- be more involved in **cooperation with businesses**, *i.e.* being open at institutional level to cooperate, being interested in creating partnership with businesses, being able to develop bankable projects (that are needed by the market and are cost efficient) and attract also private sources of financing, analyze market needs, develop technology transfer services/establish TTOs and elaborate and present their offer based on market needs. For achieving this internal changes are necessary, vision and strategy in this sense need to be developed, internal procedures updated and mentalities changed. Researchers should be offered incentives for their involvement in R&I projects.
- be able to **develop project ideas and partnerships** with **businesses** and attract financing for their projects.
- be more involved in **RIS3 design and implementation**, elaborating studies and analysis, participating more actively in EDPs, offering input for strategy monitoring.
- change existing **educational offer** according to market needs, and develop an additional education offer in cooperation with businesses, like trainings, post-university courses, etc.

? What about
the
community,
society?

*HEIs should become
bridges or gateways
for channeling
external knowledge to
the region and
disseminating it
towards stakeholders.
(RDA North West)*

CHAPTER 5

**RIS3 in each region/
country**

The Central Transdanubian Smart Specialization Strategy (RIS3)

The purpose of the RIS3 strategy is to provide a starting point and framework for the planning processes and implementation of innovation activities in the Central Transdanubian Region (CTR). At the same time, the aim of the RIS3 strategy, which also requires the adjustment of the governance structure, is to further develop previous innovation activities, as follows:

- Considering the regional border crossing nature of the industrial and service sectors;
- Integration, of sectoral division of tasks and specialization between Hungarian regions, into the innovation system;
- Unlocking the exclusively economic orientation of innovation;
- Stabilization and operation of an efficient service / support portfolio.

The aim of the strategy is therefore to create an internationally competitive, specialized innovation system by strengthening the sector's capabilities, which exceeds the innovation systems of previous periods in terms of its resource absorption capacity and resource use efficiency, and thus contributes to the creation of a competitive European economy.

- ✓ As a first step, the role of the regions in the innovation system needs to be redefined in the governance structure of the RIS3 strategy. A smaller, decentralized allocation of up to 15-25% operating in addition to the central resource allocation should be a fundamentally good solution.
- ✓ The task-oriented approach is expedient in defining the organizational framework.

The Central Transdanubia Smart Specialization Strategy (RIS3)

Future goals:

Maintaining its favourable economic potential, the Central Transdanubian Region is increasing its knowledge-intensive economic potential and reinforcing it with community networks becoming an open region that is sustainable in the long run, competitive, having a crucial role in the Central European economic space.

➤ Considering the aim and nature of RIS3, a specific sub-goal can be formulated:

The aim of the Central Transdanubian Region is the innovation-driven development of the currently determinant and emerging sectors, the renewal of the related infrastructure, the prioritization of knowledge production and utilization, and the strengthening of networking. It also aims to strengthen the social dimension of innovation and to integrate horizontal instruments in support of sustainable growth.

In order to realize these goals, the followings need to be accomplished:

- Differentiated development of the R&D efficiency, resources and background conditions of the region, which also includes the increase of the infrastructural supply of traditional, emerging and complementary economic branches and social activities;
- Development of the innovation capacity of the companies operating in the region, provision of conditions supporting knowledge production, technology transfer and knowledge utilization;
- Developing partnerships and networks to support innovation; supporting co-operation within and outside the region, tailored to the region's capabilities.

Traditional, determinant branches of CTR economy: Automotive Industry, Electronics, Materials Technology Industry, Environment and Health Industry, Informatics.

In the interviews, the importance of RIS3 was highlighted in a context that it is important in the renewal process of the Hungarian HEIs, making them more innovative and making HEIs more relevant to today's challenges. The goals include the broadening of R&D potentials of universities.

RIS3 in Hungary

- Responders highlighted the importance of sharing the infrastructure – opening HEIs' research infrastructure for the businesses can be a significant contribution to the development and implementation of RIS3 objectives. The role of big, multinational companies setting up joint RDI laboratories with universities also came up in the interviews.
- Hungarian experts stressed the importance of technology transfer and services that support market entry and intellectual property issues.
- The lack of coordination of projects and the prevalence of several smaller projects is also an issue.

RIS3 in Hungary

- An expert noted that universities are slow in adapting their supply of fields of study to the demand of businesses, while another expert also noted that business sector actors do not really know what services universities can offer.
- Collaboration in some cases occur only for one-shot innovative projects without a system of continuous planning. RIS3 stakeholders get involved in projects only if there is an availability of funds to cover the costs.
- The experts taking part in the interviews mentioned the the poor communication and the inferior quality of cooperation as problems in Hungary. It is important that RIS3 stakeholders and HEIs become attractive partners of each other, beginning with the improvement of communication.

Main features of the next RIS3

- HEIs can connect a place to the rest of the world, through international research collaborations. They act as hot spots: by listening to their territory to gain insights on specific local needs, through their international networks they collect the best experiences and potential solutions and they spread them in the territory, following the "think global, act local" philosophy.
- In terms of expertise, according to one of the interviewees, the region would need more skills in managerial and business management and HEIs do not respond adequately to this need. So, in Hungary, a specific innovation management program was launched.
- An expert in Hungary also mentioned that universities in the CEE region do not step up as lead partners and creative R&D projects tend to avoid Hungary. Hungarian HEIs usually take a more inferior role in EU-wide projects.
- Although, EU funds are given, they do not always bring the desired improvement in innovations. Nonetheless, there are several programmes that target the promotion of innovations.

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RIS3 in Italy Marche Region

Marche Region

Marche Region economic tissue is mainly characterized by SMEs specialized in the mechanical sectors and in some traditional sectors (including leather, footwear, textile and clothing, wood and furniture, food). Within this framework, the university system is moving towards applied sciences with the aim to achieve specialisation and innovation in the scientific and technological sectors.

There are 4 universities in the region with both scientific and humanistic competences. Moreover, academic spin-offs are also part of the regional research system, thanks to which the results of the research carried out in the universities are directly applied in business activities.

R&D activities in Marche Region

In 2011, Marche Region's expenditure on R&D is one of the lowest at national level (0.7%) with 0.29% for R&D expenditure in the public sector and 0.34% for the business one, compared to the Italian average (1.3%, fourth last in EU). About 50% of the expenditure is attributable to companies and the rest to the public sector (public research bodies and universities). In terms of R&D employees, Marche region's has lower values than in the rest of Italy (3.3 employees x 1000 inhabitants vs. 4 employees at national level).

Over the last decade, especially since 2007, a loss of attractiveness in Marche's university system has been detected (despite of an increase of interest in technical-scientific disciplines). This, in addition to the difficulty for graduates to enter the labour market, has led to the risk of brain-drain (i.e. that graduates from the Marche region leave the region to find a job).

Innovative regional performance

In terms of innovative performance (product, service and process), Marche Region stands below the Italian average; at European level it is defined as a region with "moderate" innovative performance.

It is important to point out that collaborations and networks stimulate research and innovation, if carried out within the region itself.

RIS3 in Italy Marche Region

Lessons learned from the past

The evaluation of past strategies has shown that:

- the evolution in process and product innovations is positive, in particular thanks to interventions addressed to specific technological areas and to the promotion of networks with universities;
- positive but limited effects of employment in R&D; growth in employment in collaborative interventions between research bodies and companies;
- the performance of companies, on average, in terms of turnover, is particularly positive in the case of networks between companies and universities;
- regional calls for proposals aim to create horizontal networks, based on the exchange of knowledge and on the involvement of universities and scientific partners, to complement vertical networks;
- the technological and scientific specialisation of the projects demonstrates a strong territoriality thanks to the partners involved and to the concentration of projects around university clusters.

Effects of the involvement of universities in the companies

Construction and consolidation of networks and relationships; enrichment of human capital with specialized skills or high professionalism; increase in quality and innovative capacity; openness to collaborations beyond the supply chain of the company sector.

Main phases

The process to the creation of the RIS3 strategy in Marche Region started in 2012:

- SWOT Analysis
- Stakeholder Engagement
- EDP
- Identification of Priorities and Actions

Results

Obstacles and needs:

- loss in the industrial system's competitiveness (manufacture – districts – predisposition to export) due to the threats related to the global international market context's uncertainty and high competition
- low spreading of innovation in high technologic products and services
- brain-drain risk ? ? low public resources for the university management and for research
- lack of technologic infrastructures for the enterprises' growth (with consequences in the loss of innovation capacity for the regional system and for future opportunities)
- limited excellence research activity: Marche Region stands among those who “utilize and transform knowledge” but it doesn't “produce new knowledge” in order to make the productive regional context grow.

Mid-term variables (objectives):

1. public/private system's capacity to attract additional national and European resources for research and innovation;
2. creation of networks among businesses and between universities and businesses
3. productive system's capacity to produce high added value products (capitalization of innovative and productive excellence niches and advanced services' trends)
4. capacity to invest in innovative technologic fields
5. development of new intelligent modes to provide services to the community (through “Innovative technologic clusters” and “Smart Cities and Communities”)
6. Employment of young talents (R&D and businesses' productivity improvement)
7. Training of the top management in order to support businesses in the turn-over and in the change in the business model

S3 priority areas 2014-2020

		Fields of Specialisation	Research topics
ICT	Home automation	<ul style="list-style-type: none"> New diagnosis systems Regenerative Medicine Safety and effectiveness of medicines E-health 	<ul style="list-style-type: none"> Food Safety Food Quality and Manufacturing
	Health & Wellness	<ul style="list-style-type: none"> Ambient Assisted Living Active ageing at home Comfortable, sustainable and safe life environments 	<ul style="list-style-type: none"> Educating cities Social museum and smart tourism Zero-consumption buildings Intelligent mobility
	Sustainable manufacturing	<ul style="list-style-type: none"> Sustainable production Flexibility and adaptability Intelligent production High performances 	
	Mechatronics	<ul style="list-style-type: none"> Sustainability and Health ICT Nanotechnologies Sustainable Innovative Materials 	

Identified priorities of action (which directly involve HEIs)

1. Promotion of investments in R&D and innovation through collaborative projects (businesses, universities and technology centres), systematic actions for higher education in the smart specialisation fields
2. Promotion of innovative solutions to face local community social challenges (especially health and wellness) through collaborative research projects (university, businesses and public authorities)
3. Engineering and industrialisation of the research results, piloting and first testing of the products
4. Promotion of the innovation capacity in businesses for digitalisation, organisation and management
5. Promotion of the valorisation of the Made in Italy supply chain through cross-fertilisation among businesses
6. Improvement of the ICT infrastructure equipment, the public/private advanced service provision and fruition
7. Promotion of the accessibility to alternative energy sources and to integrated systems of eco-innovation among business networks
8. Promotion of innovative solutions in the agricultural and agri-food sector for sustainable competitiveness and for food high-quality and healthiness

Regional Innovation Scoreboard 2011 and 2019: Marche Profile

2011		2019	
Indicator	Country	Indicator	Country
Design applications	197.29	Design applications	183.4
Non-R&D innovation expenditures	124.38	SMEs innovating in-house	137.18
Employment medium and high tech manufacturing & knowledge-intensive services	104.56	Non-R&D innovation expenditures	135.61
SMEs innovating in-house	102.53	Trademark applications	132.52
Sales of new-to-market and new-to-firm innovations	100.22	Product or process innovators	123.72
Marketing or organisational innovators	97.84	Sales of new-to-market and new-to-firm innovations	114.74
Product or process innovators	95.61	Marketing or organisational innovators	100.08
Trademark applications	86.55	Employment medium and high tech manufacturing & knowledge-intensive services	92.66
EPO patent applications	78.92	Innovation index	81.2
Scientific co-publications	75.13	Scientific co-publications	76.85
R&D expenditure public sector	72.49	Population with tertiary education	73.05
Innovation index	72.14	Most-cited publications	71.33
Innovative SMEs collaborating with others	67.78	R&D expenditure public sector	70.68
Most-cited publications	61.58	Innovative SMEs collaborating with others	67.98
R&D expenditure business sector	51.12	R&D expenditure business sector	66.97
Public-private co-publications	46.83	Lifelong learning	66.02
Population with tertiary education	44.73	EPO patent applications	60.02
Lifelong learning	39.6	Public-private co-publications	46.81

S3 priority areas 2021-2027 and industrial properties

Strengthen the innovative capacity of the consolidated and representative productive systems of the Marche Region

A1. Home and interior design

A2. Clothing and personal care

A3. Mechanics-engineering

Strengthening industrial systems with high growth potential and drivers of social innovation

B1. Products and services for culture and education

B2. Agrifood and health

Strengthen cross-functional services as drivers for innovation

C1. Service Innovation

Policy mix

RESEARCH AND INNOVATION

- Strategic projects for collaborative research
- Individual and supply chain R&D projects
- SMEs' innovation and diversification
- Hi-tech startups; Research infrastructures/centers
- Governance.

INNOVATION AND DEVELOPMENT

- Attraction and promotion of investments
- SMEs' innovation and investments, trade, handicrafts and cooperatives
- Funding tool for SMEs' growth
- Fund for new enterprises
- Local infrastructure per entrepreneurial development

INTERNATIONALISATION

- Promotional strategies for productive supply chains
- Support for SMEs' internationalisation
- Internationalisation of the R&I system
- Twinning and cluster-to-cluster collaboration

TRAINING AND JOBS

- High-level skills
- Higher technical education
- Lifelong learning
- Entrepreneurship and management
- School/HEI's orientation and traineeship
- Employment policies

Interview to the officer responsible for RIS3 in Marche Region.

RESULTS

2014-2020 Programming period

“As for the collaboration between companies and research organizations: it was intense.”

Example of collaborative action implemented: the company presented a research project in collaboration with a university. The university had to collaborate with the company and the company had to take advantage of the university skills. Several researchers visited the companies and supported and increased the skills of *the research team that was being formed.*

“When the “contamination” happens project can have a very high probability of success”

“There is a gain in investing in research and development. From 2015 to 2017 the investment in R&D especially in the private sector has increased, so maybe there is a change of mentality.”

Example of collaborative action implemented: innovative PhDs and Eureka (Industrial PhDs) are very important because they are a tool to generate knowledge. Many of the researchers and PhD students, at the end of the industrial PhDs remained working in companies. The number of researchers employed in companies increased from 2013 to 2017 from 977 to 1962. The industrial PhDs are useful to improve and complete the model of the Quadruple Helix.

Introduction

- Research and Innovation Strategy for Smart Specialisation or Smart Specialisation Strategy of North- West Development Region (RIS3 North-West) 2018 – 2020:
 - Finalized and adopted by the Regional Development Council in 2018,
 - Contributing to the fulfilment of the ex-ante conditionality for European Regional Development Fund (ERDF) under Thematic Objective 1 – *Research, Technological Development and Innovation*,
 - Relying on the Concept Note or Framework Document for RIS3 finalized in 2017 and elaborated to support implementation of Priority Axis 1 of the centralised Regional Operational Programme 2014-2020 – *Promoting technology transfer*,
 - This Priority Axis is the only direct financing source for smart specialisation projects.
- RIS3 North – West 2021-2020:
 - Revised version of the previous strategy, adopted in September 2020, but further updates expected,
 - Contributing to the fulfilment of the ERDF enabling condition under Policy Objective 1 – *A smarter Europe through innovative and smart economic transformation* (min. 35% of ERDF allocation in less developed regions), including the decentralised Regional Operational Programme 2021-2027.
 - Estimated regional allocation in ROP North-West 2021-2027: 270 milion EUR (ERDF + national co-financing)
 - There are also other indirect national and European financing sources.

RIS3 in Romania

- **Smart specialisation priority areas**

- **Pillar I - Innovation for health and wellbeing**

- Agro-food
- Cosmetics and food supplements
- Health

- **Pillar II - Development of emerging sectors**

- New materials (metal working technologies, paper, plastic, packaging, furniture)
- Advanced production technologies

- **Pillar III - Regional digital agenda**

- Information and Communication Technologies (both vertical and horizontal)

- **Priorities of the policy mix**

- The RDI „tripod” adapted to market needs
- An innovative and digitalised business environment
- Support for the creation of a connected innovation ecosystem

(for niches corresponding to each smart specialisation priority area and actions under the priorities of the policy mix see additional material)

PA 1 of the ROP 2014- 2020

- **Specific objective 1** (*all less developed regions*)
 - Operation A: Innovation and Technology Transfer Entities (ITTE) -> *2 closed calls*
 - Operation B: Technology Transfer in Scientific and Technological Parks -> *2 closed calls*
 - Operation C: SMEs in partnership with ITTEs -> *2nd call to close on 15th of March*
- **Specific objective 2**
 - Integrated projects developed under the „Lagging regions” initiative (*NW , NE, SE regions*) -> *closed call,*
 - Research Valorization Programme (*NW and NE regions*) -> *to be launched,*
 - Proof of Concept Programme (*all regions*) -> *to be launched.*

Main features of the RIS3 2021-2027

- **Vision:**

- *The North-West Regional Development Region will become one of the most innovative regions in Central and Eastern Europe by 2034 through the enhanced performance of research and innovation activities with the aim of increasing revenues, employment opportunities and living standards, at the same time considering the principles of a green, sustainable economy.*

- **Strategic objectives:**

- The structural transformation of the economy through innovation relying on new technologies and meeting the main social and economic challenges, based on the principles of sustainability and circular economy
- The development of the regional innovation ecosystem and connecting the latter to national, European and global networks
- The development of the research capacity and the valorization of research results in order to increase the level of innovation
- Maximizing the advantages of digitalization in both public and private sectors

Main features of the RIS3 2021-2027

Specialisation priorities

- **SAME PILLARS, SAME SMART SPECIALISATION PRIORITIES *but REVISED LIST OF NICHEs AND POLICY MIX***
- **Pillar I:**
 - **Objective:** Support for innovation in traditional areas from the North-West region in order to improve the health and well-being of a large number of inhabitants.
 - **Areas:** Agro-food, Cosmetics and food supplements, Health
- **Pillar II:**
 - **Objective:** Capitalizing on the results of research and development activity based on advanced technologies in order to develop emerging economic activities, of niche, in line with global trends.
 - **Areas:** New materials, Advanced production technologies
- **Pillar III:**
 - **Objective:** Digitalisation of the economy and society, supported by the transition of the ICT sector to innovation.
 - **Area:** ITC (vertical and horizontal)

Main features of the RIS3 2021-2027

Policy mix

- **Objective:** Sustaining innovation in the smart specialization priority areas through concrete actions solving bottlenecks and challenges supporting the structural transformation of the regional economy
- **Priority 1:** The research-development-innovation (RDI) “tripod” adapted to market needs
 - **Objective:** Consolidating the performance of RDI activities and the adaptation of technologic transfer services to market needs and smart infrastructure development.
- **Pillar II:** An innovative and digitalized region
 - **Objective:** Increasing the number of innovative businesses by ensuring access to new technologies, aligned to Industry 4.0 standards with sustainable economy standards, mobilizing private capital, developing human capital and supporting Smart City initiatives.
- **Pillar III:** Supporting the creation of a connected innovation ecosystem
 - **Objective:** Reducing the level of fragmentation at innovation chain level by facilitating an effective cooperation between the actors of the innovation ecosystem at regional level and by supporting the collaboration of these actors with national, European and international entities.

(for more information on niches corresponding to each smart specialisation priority area and actions under the priorities of the policy mix see additional material)

South Moravia RIS and JIC – Jihomoravské inovačné centrum: Long-term commitment, leadership, entrepreneurship

RIS: stimulate quality conditions for innovative entrepreneurship in the region by raising the level of education, encouraging research into activities in the local environment, strengthening the image of the region or directly supporting entrepreneurial activities in the event of market failure.

Participatory approach: intended for all actors of the innovation ecosystem who are interested in contributing in a structured way to the growth of living standards in the region through their individual activities - to share and make coordinated decisions.

The partnership approach: to meet common goals and oversee proper implementation of RIS.

Leadership, long-term strategic commitment: RIS 2021-2027 represents the fifth generation of RIS. In this way, the JIC develops its innovation environment on a long-term and systematic basis.

Measuring impacts: The progress of RIS is regularly monitored through indicators at the level of strategic objectives and individual projects. Impacts are assessed at the level of individual interventions (eg evaluation of creative vouchers, JIC consulting services for companies, program for talented students, etc.). At the same time, a comprehensive evaluation of the entire RIS was carried out in 2018 using an econometric model and counterfactual analysis.

Multi- source financing: The JIC seeks to coordinate innovation policy activities in the region, regardless of the origin of the resources.

2009: Innovation vouchers: inspired by the Netherlands led to the implementation of the innovation tool in other regions.

2010 The first start-up accelerator in the Czech Republic has supported 62 start-ups since its establishment, which received investments worth more than 122 million Czech crowns.

2011 Media interest New York Times, Financial Times present JIC as a successful start-up incubator and Brno as a technological paradise.

2013 JIC PLATINN: Not only start-ups, but also established companies looking for a new impetus. Inspired by the Swiss model.

2015 JIC VENTURES Investment Facility supports promising companies in faster growth.

2016 CREATIVE VOUCHERS BRNO In cooperation with the city of Brno, support for cooperation between companies and experienced creative people in the form of creative vouchers.

2017 FabLab: non-stop publicly available digital prototype workshop for technology companies, start-ups and the public.

2018 ESA BIC Brno: (European Space Agency) use of space technologies in everyday life and support of research, development, innovation and monetization of results.

2019 FabLab Experience is a mobile trailer, offering elementary and high school students practical education in the field of digital production technologies.

2020 New RIS 2021-2027: the heart is successful entrepreneurs, operating globally but with a home in the South Moravian Region. Development of technical skills and personal development of young people.



Debate Activity

Questions:

1. Within your organization, is there any experience of working with HEI's or other stakeholders of your region towards innovative solutions?
2. What barriers/challenges hinder from collaborating more with other stakeholders of your region? (complete the table)

From the list below, what possible challenges do you face when engaging with stakeholders in your region?

Possible challenges in engaging with stakeholders	Yes	No	Maybe
Lack of interest			
Lack of adequate skills or capabilities			
Lack of skilled personnel dealing with involvement with stakeholders			
Lack of trust on how public authority would use stakeholder's contribution			
Lack of political commitment			
Lack of adequate communication channels			
Geographic issues			
Funding issues			
Other:			

Adapted from Guzzo, F., Gianelle, C. and Marinelli, E. (2018), 'Smart Specialisation at work: the policy makers' view on strategy design and implementation'.

Conclusions

- Stakeholders have an important role at promoting regional innovative projects and cooperation between them is paramount
- Regional strategy development is a multi-level and bottom-up process that brings together different actors.
- The RE-ACT project aims to contribute to a more efficient interaction between HEIs and other regional stakeholders towards innovation and for creating better connected innovation (eco-)systems.