



Interreg



EUROPEAN UNION

Danube Transnational Programme

EDU-LAB

E-learning course 4
**Strengthening the Regional Economic
Development**

Theme 3

Higher Education Institutions as Centers of
Regional Development and Innovation

Course structure

	Strengthening the regional economic development			
	Theme 1: EU, regional and national context: challenges, policy context, recommendations	Theme 2: Business environment	Theme 3: Higher Education Institutions as centres of regional development and innovation	Theme 4: RIS3/Smart specialization
Session 1	Analysis of the regional context, challenges	Policy context, incentives barriers	Regulatory frameworks, policy mechanisms, incentives, barriers	Definition of RIS3, policy context, potential
Session 2	National policy responses	Challenges	Regional role of Higher Education Institutes (Connecting Universities to Regional Growth)	HEIs leading role in regional development and innovation strategies e.g. for smart specialisation
Session 3	EUSDR strategic context	Policy recommendations: Increasing labour force participation, Increasing the quality of existing workforce, addressing skills mismatch etc.	Policy recommendations on institutional, national and EU level	Creation of innovation friendly business environment
Session 4	Contribution and vision of EDU-LAB: Facilitate interaction between actors	Best practices (based on output 3.1)	Best practices (based on output 3.1)	Best practices (based on output 3.1)

Session 1

REGULATORY FRAMEWORKS, POLICY RECOMMENDATIONS, INCENTIVES, BARRIERS

... Investment in people development within the university and its regional partners will be critical, as the kinds of skills needed to undertake these transformational programmes are often in short supply, especially in less favoured regions. Leadership and boundary spanning skills are essential, as well as capacity to critically assess progress (both internally through self evaluation and externally through expert peer review processes)...

Why universities are important for regional development?

At the most basic level, universities can be anchor institutions in local economies as major employers across a wide range of occupations, purchasers of local goods and services, and contributors to cultural life and the built environment of towns and cities.

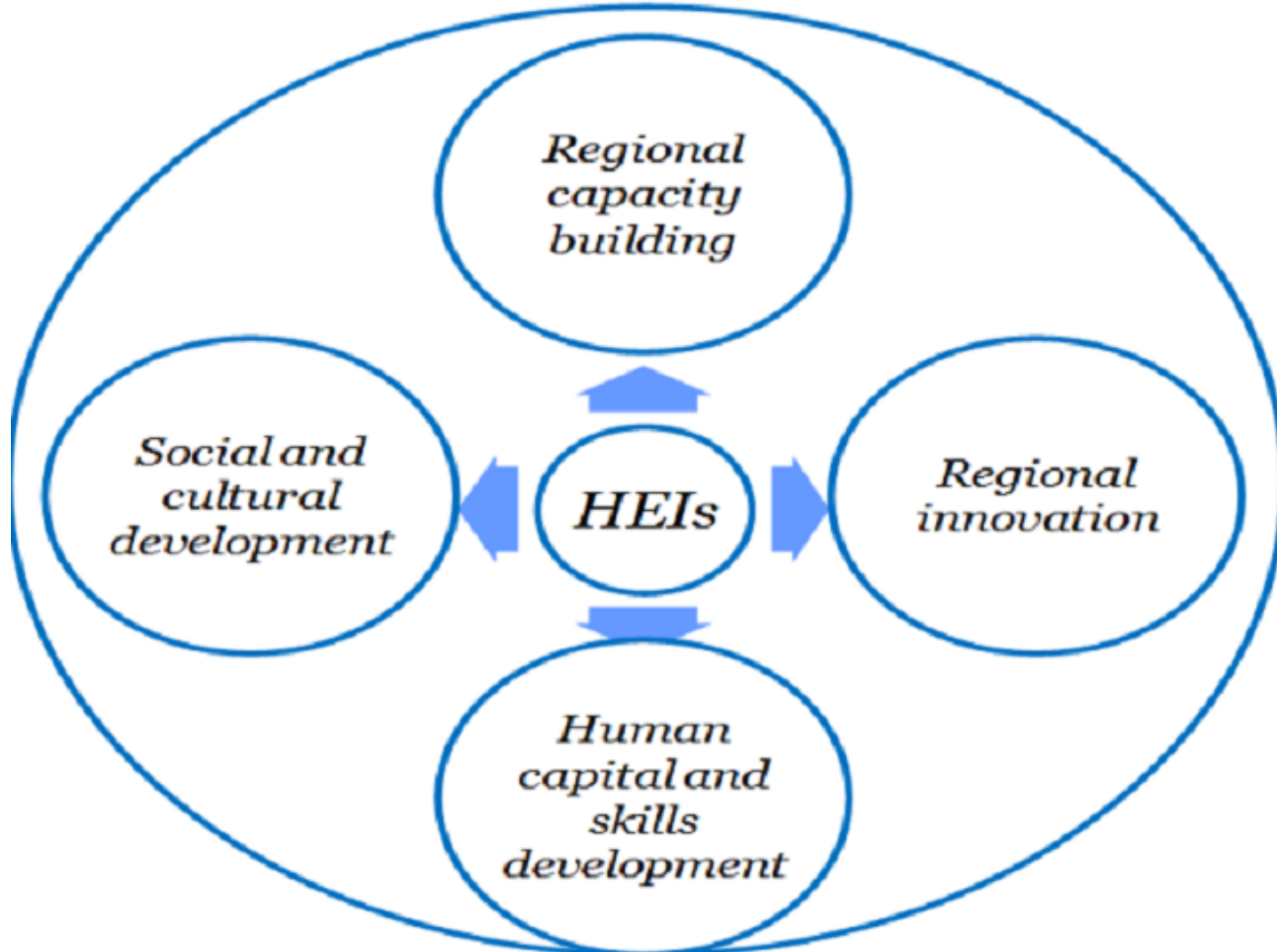
Regional investment in the infrastructure of a university to support its core business of research and teaching can therefore have a significant passive regional multiplier effect even if the university is not actively supporting regional development.

What of the more active contributions that universities can make?

This can be broken down into four areas:

1. Business innovation which is closely linked, although not exclusively, to the research function of the university;
2. Human capital development linked to the teaching function;
3. Community development linked to the public service role of universities;
4. The contribution of the university to the institutional capacity of the region through engagement of its management and members in local civil society.

National and regional context



The adoption of the RIS3 concept marks an important new development in the policy context of the EU. It follows directly from earlier concerns for social cohesion, but it is expressed in a new commitment to combine regional development and research and innovation policies.

Knowledge and Innovation have been key priorities in the European policy agenda since the adoption of the Lisbon strategy in 2000. Their central place in policy formulation and action at EU level has been further strengthened as part of 'Europe 2020', the European Union's political strategy to support increased competitiveness, social cohesion, and regional development during the period 2014-2020.

Simultaneously the EU cohesion policies, aiming to reduce disparities among European regions, have also relied on fostering and exploiting regional innovation. Specialisation in the form of prioritisation of regional strengths and opportunities has often been promoted, and indeed occasionally applied towards this end. In this sense, the idea of ‘smart specialisation’ is not new. However, the existence of a Strategic Policy Framework for Smart Specialisation is an ex-ante conditionality for the use of European Structural and Investment Funds for funding Research and Innovation. In fact, as part of the ‘Europe 2020’ strategy, RIS3 can potentially have major, far-reaching implications for regional and national development as well as for overall European competitiveness.

The role of HEIs and ROs in RIS3 is to be considered in the context of the 'Europe 2020' strategy's priority themes of smart, sustainable and inclusive growth and in particular the initiatives aimed at catalysing smart growth, an economy based on knowledge and innovation. These initiatives relate to:

- Innovation
- Education
- Digital Society

Innovation:

The aim of the Innovation Union Flagship Initiative is ‘to re-focus R&D and innovation policy’, and thereby strengthen every link in the innovation chain from basic research through to commercialisation (European Commission 2010). A central element of the research and innovation agenda of the Commission is the development of an open and competitive European Research Area (ERA). ERA has been established as a policy for facilitating European integration and scaling-up initiatives for the production and exploitation of knowledge; that is, strengthening the knowledge-based economy. The promotion of European R&D activities takes place via inter-European partnerships and networks which bring together HEIs and ROs with SMEs and larger companies. They also include dissemination activities between sectors and regions.

Innovation ... cont.:

ERA focuses also on removing barriers which prevent seamless access to online research services and e-infrastructures and on building a "digital ERA" (European Commission 2012). A policy for Open Access and Open Innovation will be further promoted in order to strengthen the knowledge triangle and research cooperation in the EU and on a global scale. A driving force for ERA within the next years is the implementation of 'Horizon 2020', the new Framework Programme for R&I. Embedded within the different actions of Horizon 2020 is the idea of scientific and technological excellence.

Education:

Europe 2020 highlights higher education as a key policy area where collaboration between the EU and Member States can deliver positive results for jobs and economic development.

The Higher Education Modernisation Agenda is designed to contribute to these goals. The basic tenets are that:

- (i) higher education, with its links with research and innovation, plays a crucial role in personal development and economic growth, providing the highly qualified people and the articulate citizens that Europe needs to create jobs and prosperity; and
- (ii) (ii) that if Europe is not to lose out to global competition in the fields of education, research and innovation, national higher education systems must be able to respond effectively to the requirements of the knowledge economy.

Education ... cont.:

The main areas for reform identified in the new agenda touch on all aspects of 'the knowledge triangle' and HEI's role therein: from delivery of education and research activities through to their potential as drivers of innovation. Again, achieving excellence is one of the guiding principles. These areas are: to increase the number of higher education graduates; to improve the quality and relevance of teaching and researcher training, to equip graduates with the knowledge and core transferable competences they need to succeed in high-skill occupations; to provide more opportunities for students to gain additional skills through study or training abroad, and to encourage cross-border co-operation to boost higher education performance; to strengthen the "knowledge triangle", linking education, research and business and to create effective governance and funding mechanisms in support of excellence.

‘Digital Agenda for Europe’ (DAE):

This aims at delivering “sustainable economic and social benefits from a digital single market based on fast and ultra-fast internet and interoperable applications” (European Commission 2010). “Research and innovation” and “Enhancing digital literacy, skills and inclusion” are among the main pillars of the Digital Agenda which are concerned with making full use of information and communication technologies (ICTs) and creating open knowledge environments for research and education. The EC highlights that excellent research depends upon world-class facilities and research infrastructures, including e-infrastructures which enable eScience, i.e. data-intensive collaborative research carried out by geographically dispersed teams. Such concepts, including the concept of Virtual Mobility (ESF 2013), are particularly relevant to HEIs and ROs in less developed European regions in the context of developing and implementing RIS3. It is noted that an explicit Digital Growth Chapter is required in each RIS3.

As part of Europe 2020 strategy, RIS3 represents a key policy response to a particular economic context. **Three** main aspects have influenced the adoption and the envisaged use of the RIS3 concept:

- 1. Uneven economic landscape and the concern for European cohesion.** Member States have adopted a set of shared economic objectives for the Union as a whole, but different regions in the EU have different capacities to contribute to and/or to reach these objectives. The level of economic development in the EU is uneven, with significant disparities between the most and the least advanced regions. RIS3 was conceived as a policy tool to give a new impetus to economic and social development, placing special attention on unlocking regional potential, including in currently less economically advanced regions. To achieve this, RIS3 proposes a particular type of engagement of HEIs and ROs in place-based development initiatives - in cooperation with the authorities, with the business sector and with the civil society.

Three main aspects ... cont.:

2. Global economic crisis and its specific manifestations in the EU. The EU has been affected in significant ways by the financial crisis and the recession that started in 2007-2008. The impact of the crisis included contraction of real GDP, a sharp decline in industrial production, or high unemployment in several Member States. The economic crisis generated a large discussion about economic governance in the EU. The adoption of the policy principle according to which investment in R&D, as well as in higher education, is part of the solution to exit from the economic crisis, represented an answer to this situation. RIS3 has emerged as a policy tool designed to help restore growth by promoting the expansion and application of science/research and innovation at regional level. It calls for formal strategies that bring together HEIs, ROs, national and regional authorities, and the business sector, while combining and taking advantage of various sources of support from the EU..

Three main aspects ... cont.:

3. Funding of HEIs and ROs. The economic crisis has generated a new discussion about and approaches to the funding of HEIs and ROs. Some EU countries have experienced significant reduction in the public funding for research and education. The adoption of RIS3 has been aimed in part at significantly increasing funding opportunities for HEIs and ROs, while stimulating them to engage more and in new ways in regional development

Higher education institutions - HEIs

HEIs have been around for a long time and have always been engaged with the communities (local, regional and national) of which they are a part. Martin Trow famously distinguished the elite, mass and universal forms of higher education (Trow 1974), defining their respective functions as “shaping mind and character of ruling class; preparation for elite roles”(elite); “transmission of skills; preparation for a broader range of technical and economic elite roles” (mass) and “adaptation of ‘whole population’ to rapid social and technological change” (universal). While the definitions relate mainly to the teaching role of higher education, the formulation relating to ‘universal higher education’ can readily embrace the research and knowledge transfer functions within knowledge societies.

Higher education institutions - HEIs

The responsibilities of higher education extend beyond producing graduates and research outputs to include greater public engagement. This takes a variety of forms and involves collaboration with government agencies, businesses, local communities and regional authorities. Mechanisms of interaction between society and higher education reflect the increasing social embeddedness of institutions within a multitude of communities. The implications for higher education arise from the expectations that higher education should be more visibly useful for economy and society, though this usefulness may apply to both global and regional/local levels with a different emphasis for different institutions and the basic units within them..

HEIs - Three main roles

It is common today to distinguish between the three roles of **teaching, research and knowledge transfer** in considering the work of HEIs. For each of them, it is important to be aware of history, of diversity, of boundaries, and of stakeholders.

While the **teaching** function is the longest established and the most universal role of higher education, there is growing differentiation and diversity in the forms that it takes as well as in its intended beneficiaries. Regarding the **research** role, it is necessary to consider its importance to both the individual and the institution and how it is managed and rewarded including the balance between autonomy and responsiveness, the balance and relationship between individual and collaborative work, the extent of boundary crossing between disciplines, institutions and professions, where the work takes place and the nature of its outcomes, the audiences to which it is directed, the impacts it makes, the ways in which it is assessed and rewarded, and the relationship it has with the teaching and knowledge transfer functions of higher education.

HEIs - Three main roles ... cont.

The notion of '**knowledge transfer**' is sometimes referred to as the '**third mission**' of higher education and this reflects its relatively recent arrival as an identifiable role of higher education, although not dissimilar functions can probably be identified in the long histories of higher education institutions. Here, the emphasis is less about the production of new knowledge and more to do with the application and utilisation of existing knowledge. Although much of the focus of knowledge transfer has been given to the application of scientific knowledge to societal developments of potential economic significance, there is in fact much greater diversity in practice with universities engaging with public institutions of various sorts – in education, health, governance etc. – with teaching-linked activities including workplace learning, graduate start-ups and a variety of entrepreneurial endeavours sitting alongside more applied research functions.

RIS3 is about growth through innovation.

HEIs play a central role in the innovation ecosystem – from human capacity building through to generation of knowledge and innovation. Apart from basic research, typically researchers in HEIs produce innovation to the point of proof of concept, while researchers in ROs may produce innovation to the point of demonstration and/or prototype development. HEIs (and Ros) which have at least some pockets of excellence will influence in a positive manner the environment in which they operate, attracting and nurturing talent, including entrepreneurial talent. An average department or research group in an institution with a ‘brand name’ associated with excellence benefits from what can be called an “aura-effect”. Simultaneously, the same effect attracts businesses and entrepreneurial activity, all of which contribute to RIS3.

Main sources (pdf available):

1. **Guide to Research and Innovation Strategies for Smart Specialisation (RIS 3) May 2012**
2. **The role of Universities and Research Organisations as drivers for Smart Specialisation at regional level, EUROPEAN COMMISSION, Directorate-General for Research and Innovation, Directorate B — Innovation Union and European Research Area, Unit B5 – Spreading Excellence and Widening Participation, Brussels, 23 January 2014**
3. **The role of universities in Smart Specialisation Strategies, European University Association asbl · Avenue de l'Yser 24 · 1040 Brussels, Belgium, EUA Publications 2014**

Thank you for your attention!