

UNIVERSITY SESSION: Mid-sized University Cities in the European Union -Graduate Flows & Local Labour Market

Workshop | Tue 10/10/2023, 16:30 - 17:30 CET

Moderator: Yannis Psycharis, Professor, Panteion University, Athens

Speaker: Alina Michaela Schoenberg, Professor, IMC Krems University of Applied Sciences, Austria



FINAL REPORT

Objectives

- Present the spatial distribution of European University Cities (city level).
- Mapping the Human Capital Production Map at NUTS-3 level.
- Classify EU regions according to their brain drain outcomes.
- Identify the brain drain regions at NUTS-2 level.

Main findings

I. Mapping European Universities cities based on Brain Drain

• The map of the EU provides a large dispersion of Higher University Institutions (HEI) across EU territory.

- Based on the European Tertiary Education Registry (ETER), there is a total number of 812 sites with Higher Education Institutions (HEI) across the European Union
- There are different patterns of concentration/ dispersion of Universities across countries. As per example the majority of Universities in France are concentrated in Paris, while in the Netherlands and Germany Universities follow a more dispersed distribution across cities and regions
- Medium and small University cities attract a large proportion of students and could act as catalyst for the improvement of human capital, age structure of localities and development prospects
- Retention rate and long-term engagement at the location of the graduation is asymmetrical across cities and regions
- Based on an index that has been constructed there are 87 out of the 184 NUTS-2 regions that are defined are brain drain regions
- Medium University cities graduates could increase the empower local labor market and entrepreneurial activity could play a critical role
- The majority of Universities and University students is concentrated in the North and Central countries and regions of the EU.
- The majority of the more advanced regions of the Northern EU countries are among the drain gainers; thus the level of economic development acts as a catalyst for the higher retention rates and higher attraction of graduates producing a selfreinforcing concentration of wealth and educated young people.

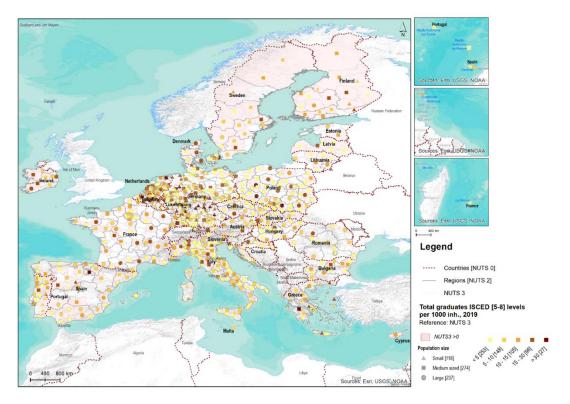


Figure 1. Graduates ISCED [5-8] per 1000 inh. by population size, NUTS3, 2019

II. Socio-economic Characteristics of European University Cities affected by Brain Drain and the University's Role for Urban Resurgence

The better the regional integration of the university, the more useful the university can be for regional growth.

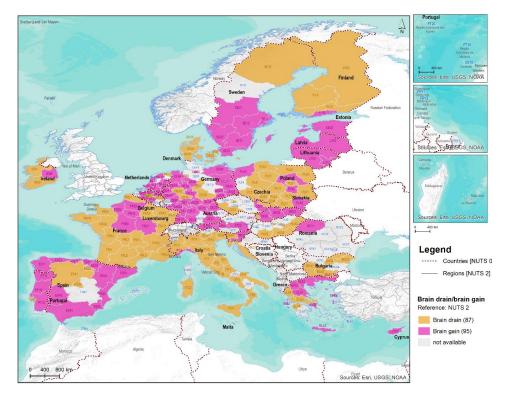


Figure 2. Brain drain/brain gain NUTS2, 2019

What are the Characteristics of Brain Drainers?

The study has identified four types of brain drainers:

- *The Basic*: Smaller cities in proximity of rural areas that cover local and regional demand for tertiary education. Problems related to socioeconomic, demographic and physical factors. Agricultural tradition with a low industry mix and low accessibility. Education opportunities for households in proximity, but no other opportunities for graduates than to leave.
- *The Emerging*: Cities, mostly peripheral, with low population density and tradition in agriculture and /or specific areas of manufacturing. Failure to carry out the shift from traditional manufacturing to innovation-driven industries and modern business-oriented services. Financial bottlenecks impeding the maintenance of local infrastructure levels and deteriorating quality of life. Challenges related to vacant and underutilized housing, uncompetitive, old local businesses, as well as a poor infrastructure. Sometimes, universities are purposely located in these regions to contribute to urban growth
- *The Advanced*: Bigger cities or smaller cities in metropolitan areas that do face structural problems and low industrial diversity. Benefits from agglomeration effects or positive spillover effects from bigger cities in their proximity. Lack of innovative performance and economic growth. Suffering from the lock-in effects

determined by traditional socioeconomic structure, less-speedy industrial evolution, and inefficient production practices. Universities are an organic part of the urban infrastructure and very often one of the most important contributors to local development. Reputation allows for the attraction of national and international students

• *The Front-Runners*: Certain level of economic dynamism, sectoral heterogeneity, involvement in global production processes, R&D investment, and human capital. Lack of certain types of important social capital such as accessibility shortcomings of firms' R&D cooperation with local research institutes and universities, missing knowledge transfers and personal exchange between firms. Universities are well known and attract many national and international students without having a matching labor market/Graduates are being pulled by regions with better opportunities.

Main challenges

- Can Universities form 'entrepreneurs'?
- Can Entrepreneurship increase the retention rate of graduates?

Conclusions

- The map of the EU provides a large dispersion of HUI across EU territory.
- HEI and higher education opportunities yield a reshuffling of young age population across space.
- Medium and small University cities attract a large proportion of students and could act as catalyst for the improvement of age structure of localities.
- Retention rate and long-term engagement at the location of the graduation is asymmetrical across cities and regions.
- Medium University cities graduates could increase the empower local labor market and entrepreneurial activity could play a critical role.