Brain Drain in the EU:Local and Regional Public Policies & Good Practices

Emil BOC

Mayor of Cluj-Napoca City

Associate professor Ph.D - Faculty of Political, Administrative and Communication Sciences | **Babeş-Bolyai University** | **Cluj, Romania** E-mail: boc@fspac.ro



Short History and Solutions Across Time

An Age-Old Problem:

- >> around 300 B.C.
 brain drain from
 Athens to Alexandria
- >> people from all over the Empire migrated to Rome



Short History and **Solutions** Across Time

>> Middle Age: Death Penalty for Emigrants

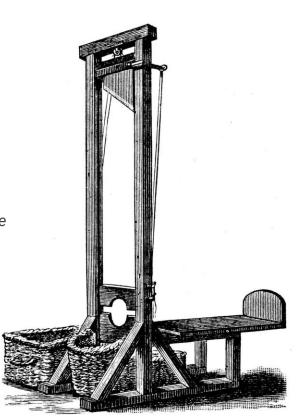
In 1274, an edict published in Bologna stated:

"By this edict, we solemnly forbid any ecclesiastical or lay person, Bolognese or foreign, either personally or by messenger, letter or other means, to attempt to negotiate with ecclesiastical or lay persons, colleges, universities, regions, communes, or communal entities, the transfer of the studium of the city of Bologna to another place. No citizen or inhabitant of the city of Bologna may attempt to take students away from the city with the intention of continuing the studium elsewhere."

Later, the Bolognese authorities strengthened their laws against "the thieves of universities" (including death penalty). (Dedijer, 1969)

>> Beginning of the 1970s: **Bhagwati tax**

(a tax on the income earned by the skilled migrants in the destination country, to the benefit of the source country)



Today: "Brain drain" vs.

"Brain gain" vs.

"Brain circulation" and
networks of cooperation







Freedom of movement - a fundamental value of the EU

The free movement of labour is one of the "four freedoms" of the European Union and its single market.

The free movement of labour has long been regarded as a cornerstone of European Union (EU) competitiveness, facilitating the reduction of territorial imbalances, rigidities and skills mismatches.

(Source: ESPO Addressing labour migration challenges in Europe)

The Treaty of Lisbon - Article 45

Everyone is free to move voluntarily inside the European Union, but no one should be forced to leave the country due to poverty and other economical reasons.

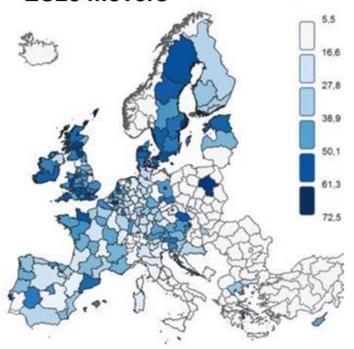
The Regional Perspective of Brain Drain

Intra-EU mobility: receiving and sending regions



Source: extracted from ESPON (2017).

Share of highly educated EU28 movers



Source: map elaborated by the authors, based on Eurostat data accessed in July 2018.

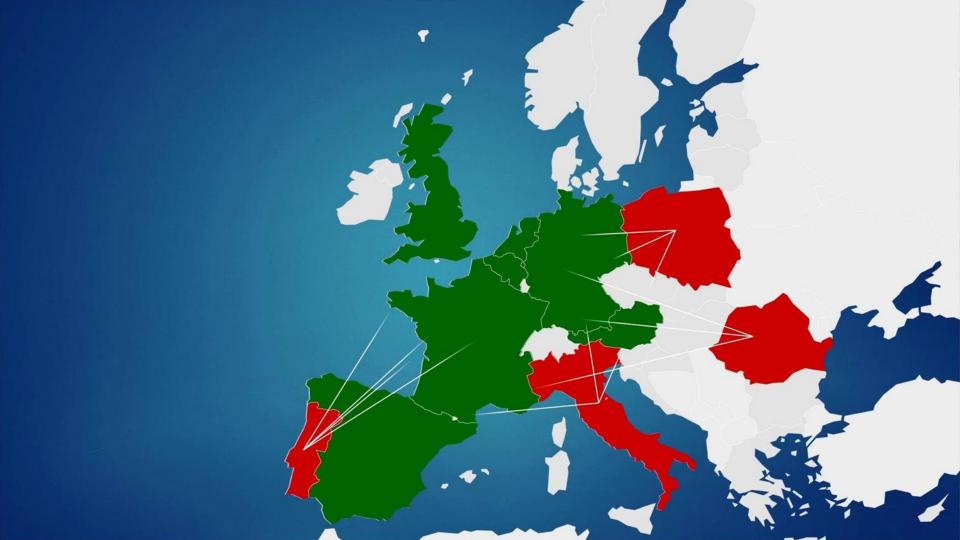
The Regional Perspective of Brain Drain

Top destinations for the 17 million EU28 working movers:

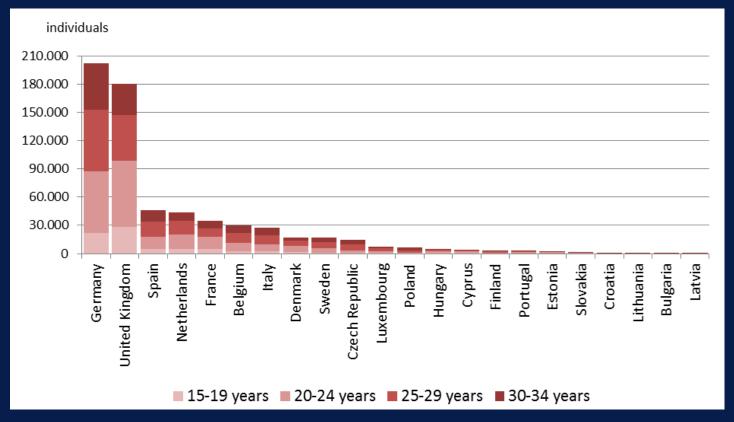
- >> Germany (33%) 3 million people
- >> UK (20%) approx. 2 million people
- >> Spain (9%) >1 million people
- >> France (7%) <1 million people
- >> Italy, Austria, the Netherlands, Belgium (5%)

Top countries of origin of EU28 movers were:

>> Romania, Poland, Italy and Portugal (ECR, 2018)



Destination countries for EU28 movers, age 15-34, approx. 5.5 mil. people



Source: European Committee of the Regions, 2018, Addressing Brain Drain: the Local and Regional Dimension, Commission for Social Policy, Education, Employment, Research and Culture, p. 11

Negative impact for Sending / Receiving regions

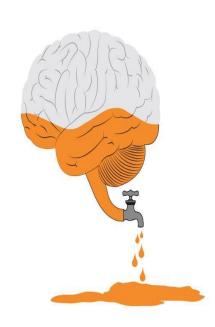
For sending regions:

- >> reduction of the stock of human capital,
- >> reduced economic growth,
- >> reduced productivity, reduction of tax income
- >> labour market changes (e.g. reduction of wages)
- >> limited capacity to innovate.

For the entire system:

>> "brain waste"

Highly skilled workers end up in being unemployed or employed in a job not requiring their high skills. (Cavallini, S. et al., 2018)



Positive Impact for Sending/Receiving regions

For sending regions:

- >> dissemination of knowledge,
- >> remittances etc.

For receiving regions:

- >> increase in innovation potential,
- >> economic growth,
- >> competitive advantage a.s.o.



Push and Pull Factors

overall
quality of
living in the
region

Socio-economic conditions

- >> job opportunities & higher wages
- >> higher per capita wealth
- >> economic growth
- >> robust social security
- >> easier access to labour market
- >> higher employment rates
- >> affordability and availability of housing
- >> decent cost of living
- >> quality education system
- >> availability of infrastructure
- >> good healthcare system
- >> leisure activities, social life
- >> good marketing of these regions availability of information on the job market

Decision makers need to find solutions to:

(1) counteract the magnet effect of receiving regions by reducing the force of the pull factors - **employment opportunity is the main pull factor** according to those who *move* (51%) followed by *family reasons* (37%) and *study* (6%)

(2018 Annual Report on intraEU Labour Mobility, p. 83);

- (2) decrease of push factors from the sender regions (labour conditions more attractive and higher quality of life of receiving regions, *ECR*, 2018, p. 9) by reducing disparities and stimulating economic convergence;
- (3) calibrate the labour mobility flows with labour market conditions to counteract the negative effects of brain waste a skill mismatch between receiving region labour market conditions (demand for labour in specific lower skilled sectors) and worker education and qualifications (higher skilled).

Brain drain: risks at the European Union Level

- In 2007 approx. 25% of the population of the European Union lived in regions with an income per capita below 75% of the EU average in 2017 we have the same percentage of 25%
- II. Regarding the **population** at risk of poverty or social exclusion:
- 116 million in 2007 112 million in 2017

The proposed target for 2020: 96 million

III. 83 million Europeans (one in six EU residents) live in low-income and low-growth regions (Widuto, 2019)

The phenomenon of brain drain is directly triggered by existing social and economic imbalances among the EU regions.

Although EU institutions have strived to put forward mechanisms to reduce these disparities, they have been partially effective.

The risk posed by this phenomenon to the long term sustainability of the European Project



MORE
INTEGRATION
NOT NEW
BARRIERS.

Tackling brain drain: interconnected levels

>> local, regional, national and supranational (EU).

>> Brain drain and the other connected phenomena (brain gain, brain circulation, etc.) need to be understood and assessed in the EU in the context of multilevel governance (MLG).



Tackling the brain drain: political commitment for cohesion

>> EU'S cohesion policy 2021 - 2027 to be a long-term investment policy for all regions, focused on overcoming the economic, social and territorial divides, based on the partnership principle and the place-based approach, better coordinated with other EU policies on a level playing field (#CohesionAlliance)

>> At EU level, improve the vertical coodrination of different funding sources in the governance of post-2020 Cohesion Policy and programmes to guarantee more coherence of the agednas at different governance and planning levels in the short to medium term;

Tackling brain drain: policy recommendations

- 1. Good governance and effective democracy
- 2. Building knowledge economy
- 3. Improving attractiveness of regions
- 4. Developing diaspora strategies
- 5. Quality of Life



Tackling brain drain: leadership and coordination

- >> Strong support for knowledge economy and smart specializations;
- >> Invest in human capital matching educational supply and labour demand;
- >> Real time labour market intelligence through a real time market information system in place;
- >> Reduce regulatory burdens;
- >> The rule of law: support anti-corruption measures and judicial reform.

Tackling the brain drain: bold and innovative projects

>> Special attention towards
removal of structural impediments
which exacerbate brain drain
(such as infrastructure / highways,
quality of services, access to
technology, etc.).

>> Propose bold and innovative projects that attract young talent.



Tackling the brain drain:

Education, Education

>> Lack of well-performing education systems is one of the problems associated with brain drain.

Education is clearly an area where improvements can help to mitigate the negative effects of brain drain.

>> Stronger cooperation between European research institutions



- >> Development of the European University Consortium
- >> Public authorities need to develop partnerships with universities. Partnerships between private firms (interested in R&D), local authorities and universities are engines for local growth and development.

Tackling the brain drain:

Education, Education

>> The importance of Erasmus+ program and similar ones in connection with brain drain, in terms of creating academic and professional opportunities for talented individuals and creating opportunities for international networking and partnerships.

The new Commissions support for increasing the budget (Ursula von der Leyen - A Union that strives for more. My agenda for Europe, p. 14) of the Erasmus+ program is a step in the right direction.



>> The objective of the new EU Commission for a European Education Area by 2025 "in which learning, studying and doing research would not be hampered by borders" (Ursula von der Leyen - A Union that strives for more. My agenda for Europe, p. 14) needs to carefully consider the potential effects of increasing the brain drain phenomenon if mechanisms are not put into place to foster brain circulation and brain re-migration instead of drain.

Tackling the brain drain:

Education, Education

- >> A phenomenon which needs to be closely monitored is that of **children** who remain at home.
- >> Quick procedures for diploma and skills/competencies recognition can help a lot in reducing the magnitude of brain waste phenomenon.



>> Digital connectivity and smart specialization can have positive effects on brain drain phenomenon. Digital connectivity and development of digital literacy should be essential elements in the new Commissions efforts in updating the Digital Education Action Plan.

Responsibilities and Recommendations for local, regional and state level

- R1. "Investigate and understand the needs of talent"
- **R2.** "Coordinate players and synergies resources for talent-based growth"
- R3. "Identify and support key driving sectors for retaining/attracting talent"
- R4. "Stimulate the absorption of outside talent"
- **R5.** "Mitigate/remove structural impediments/barriers to attracting international talents"
- **R6.** "Cooperate with other authorities facing the same challenges with regards to highly skilled workers" (Cavallini, S. et al., 2018)

Public Policies and Good Practices

>> Local and Regional Authorities in cooperation with national
authorities and institutions of the
European Union - can adopt an active
attitude and can implement local and
regional policies to create a favorable
socio-economic environment for job
creation for highly skilled workers
and for attracting talents

>> The most comprehensive comparative study on intra-European brain drain (Cavallini, S. et al., 2018):

30 initiatives related to fighting brain drain and/or favoring brain gain at the local and/or regional levels

WHY CLUJ-NAPOCA?

The city with the highest economic growth rate in Romania in the last decade

Forbes, 2018

Cluj-Napoca, the best-ranked Romanian city in the global Quality of Life Index 2019

Numbeo, 2019

The second European city in terms of access to employment

Eurostat, 2018

The most attractive Romanian city

Highest city magnetism index value, World Bank, 2017

The Romanian city with the highest cultural vitality besides the Capital

The Cultural Vitality of Romanian Cities, National Institute for Cultural Research and Formation, 2016

8 economic clusters that support the innovation ecosystem

393 companies, 8 universities, and 22 catalyst organizations

Highly skilled workforce

≈ 80.000 students and 100.000+ higher education graduates Ministry of Education, The National Institute of Statistics

Romania ranks 6th in Europe and 16th worldwide for English Proficiency

According to EF's Global English Proficiency Index 2018

Romania is the 2nd European country with the lowest business economy labour cost

Hourly Labour Cost in Romania is 26% of the European Average, Eurostat Labour Cost Index, 2018

Top civically engaged city in Romania

Highest citizen participation in choosing the cities priorities, World Bank and The Federation of Metropolitan and Urban Areas in Romania, UrbanizedHub, 2019

Friendliest city in Europe with foreigners

European Commision study, 2015

A. Good governance

- Participatory governance Multiple Helix model: public administration, universities, private sector, NGO's and citizens
 - Participatory budgeting processes
 - Civic Creativity and Innovation Center
 - Advisory Council for Entrepreneurship and Innovation in IT
- Inclusive public sphere
- Drafting the City's Strategy together with the specialists from the "Babeş-Bolyai" University and with the broad participation of civil society structures











B. Knowledge economy

- Development of the educational system at all levels (pre-school, school, university and post-university) and child care policies (for every 5 lei paid by the inhabitants of Cluj-Napoca on taxes, at least 1 leu goes to the City Hall's programs supporting access to education).
- "Young Researchers in Science and Engineering Prize".
- "Cluj Future of Work" Project.
- Cluj Innovation City Project Cluj Innovation Park (CREIC & TEAM).



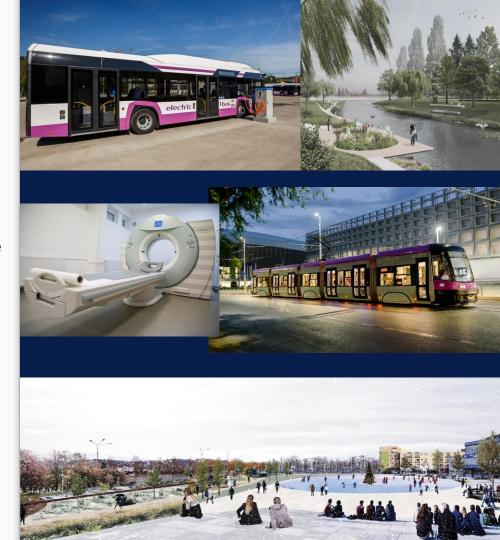


B. Knowledge economy

- IT and innovation hub number of employees in IT: approx. 20,000 (source: ARIES Transylvania estimate, 2018); the Romanian city with the highest percent of software development from the total IT employees.
- Romanian capital of clusters (8 Business Clusters with: 393 member companies, 8 member universities, 5 Partner public institutions, 22 Catalyst organizations).
- Startup City (the number of startups doubled in the last 10 years, 2500 new companies registered on average in the metropolitan area; Cluj-Napoca has the fastest expanding economy in the country with 25% increase of new registered companies).

C. Quality of life

- Green Mobility
- Protection of the environment and energy efficiency
- Green spaces (parks and urban gardens) and the use of water courses
- Investments in infrastructure and housing facilities
- Quality of public spaces international competitions for major city projects
- Safety of the citizens
- Efficient medical care system



C. Quality of life

- Promoting sports: the best investment in health and wellbeing
- Financial and symbolic support for cultural activities
- Open minded public administration, citizens-oriented: supports innovation and digitalization in public sector (smart city)
- Everybody should feel like home the friendliest city in Europe with foreigners (Source: Eurostat 2015).



D. Incentives for investors

- Fiscal facilities regional state aid schemes and de minimis state aid schemes
- ☐ The incentives for green buildings: the reduction of the tax on the building in the case of buildings which have an official certification recognized worldwide (LEED, BREEAM or DGNB) as "green building" (A class)
- Innovative policy to support office buildings instead of malls or real estate (more than 334K sqm of office space)
- ☐ Business clubs: **business support**

Conclusions

- → Policy-makers and political representatives need to clearly understand the specific reasons which trigger massive relocations of population and workers within the European Union.
- → The instruments offered by **the cohesion policy** as well as the synergies with the centrally managed programmed should be fully exploited to limit brain drain.
- → Improve the coordination of different funding sources in the governance post-2020 Cohesion Policy and programmes.
- → Realistic policies to attract, retain, and re-attract an educated workforce can be designed and implemented. **One key strategic concept is quality of life**. It is desirable that quality of life measurements are conducted periodically and in a structured manner.

Conclusions

- → LRAs should set up local alliances that include **all stakeholders** (public authorities, businesses, universities, NGOs, etc.) and which are able to draft and implement local policies that help to mitigate the phenomenon of brain drain.
- → Identify and promote best practices and adapt initiatives that are already successful with the support of partners under the territorial cooperation programmes.
- → Integration of efforts undertaken at various levels is crucial to successful EU policy. A mechanism specifically designed to foster integration and coordination of policy actions linked to brain drain needs to be initiated at EU level.

The European Commission should actively support, in strong cooperation with the European Parliament, the European Council, the European Committee of the Regions, the action of local and regional public bodies in addressing brain drain.

Thank You!

Emil Boc

Cluj-Napoca City Cluj. Romania. Europe.



Bibliography

Boc, E., "Inovare sustenabilă pentru un oraș colaborativ (Sustainable Innovation in a Collaborative City)", Revista Transilvană de Ştiințe Administrative, 1(40), 2017, pp. 3-12.

Boc, E., "Cluj-Napoca Smart City: More than Just Technology", in Hintea, C. et al (editors), Transylvanian International Conference in Public Administration, Cluj-Napoca, Romania, 2-4 November 2017, Accent Publisher, 2018, pp. 57-73.

Brock, G. and Blake, M., Debating Brain Drain. May Governments Restrict Emigration?, Oxford and New York: Oxford University Press, 2015.

Busetti S. et al., The Geography of New Employment Dynamics in Europe, Applied Research, ESPON, 2017.

Cavallini, S. et al., Addressing brain drain: The local and regional dimension, European Committee of the Regions, 2018.

Cedefop, Eurofound, Skills forecast: trends and challenges to 2030, Luxembourg: Publications Office, Cedefop reference series No 108, 2018.

de Concini, A. and Toth, J., The future of the European space sector. How to leverage Europe's technological leadership and boost investments for space ventures, European Investment Bank, 2019.

Cristea, M. et al., Magnet Cities. Migration and Commuting in Romania, Washington, DC: World Bank, 2017.

Dedijer, S., "The Brain Drain: An Age-Old Problem", in *European Community*, No. 127, September 1969, pp. 3-5.

Bibliography

Dumitru, S., "Skilled Migration: Who Should Pay for What? A Critique of the Bhagwati Tax", in *Diversities: Skilled Migration and the Brain Drain*, Vol. 14, No. 1, 2012, pp. 9-23.

EUROPE 2020 - A strategy for smart, sustainable and inclusive growth, Communication from the Commission, COM(2010) 2020, Brussels, 3.3.2010.

European Commission, Directorate-General for Employment Social Affairs and Inclusion, Directorate D - Labour mobility, 2018 Annual Report on IntraEU Labour Mobility, Luxembourg: Publications Office of the European Union, 2019.

Garcia Pires, A.J., "Brain drain and brain waste", Journal of Economic Development, Volume 40, Number 1, March 2015.

Grecu, M. and Titan, E., "Brain Drain - Brain Gain, Evidence from the European Union", in *Journal of Applied Quantitative Methods*, Vol. 11, No. 3, Fall 2016, pp. 61-69.

Hautamäki, A. şi Oksanen, K., "Sustainable Innovation: Competitive Advantage for Knowledge Hubs", in Lappalainen, P., Markkula, M. şi Kune, H. (eds.), *Orchestrating Regional Innovation Ecosystems. Espoo Innovation Garden*, Aalto University in cooperation with Laurea University of Applied Sciences and Built Environment Innovations RYM Ltd, 2015, pp. 87-102.

Hintea, C. et al. (editors), Transylvanian International Conference in Public Administration, Cluj-Napoca, Romania, 2-4 November 2017, Accent Publisher, 2018.

Tacob, R., "Brain Drain Phenomenon in Romania: What Comes in Line after Corruption?", Romanian Journal of Communication and Public Relations, Vol. 20, No. 2 (44), July 2018, pp. 53-78.

Bibliography

ICF, Study on the movement of skilled labour. Final report, Luxembourg: Publications Office of the European Union, 2018.

International Fund for Agricultural Development, Sending Money Home: European flows and markets, 2015.

Kone, Z.L. and Özden, C., *Brain Drain, Gain, and Circulation*, Global Knowledge Partnership on Migration and Development Working Paper 19, March 2017.

Lappalainen, P., Markkula, M. şi Kune, H. (eds.), Orchestrating Regional Innovation Ecosystems. Espoo Innovation Garden, Aalto University in cooperation with Laurea University of Applied Sciences and Built Environment Innovations RYM Ltd, 2015.

Lutz, W. et al., Demographic Scenarios for the EU. Migration, Population and Education, JRC Study, Luxembourg: Publications Office of the European Union, 2019.

Peris-Ortiz, M. et al (editors), Multiple Helix Ecosystems for Sustainable Competitiveness, Cham: Springer International Publishing, 2016.

Position paper on the European University initiative, Luxembourg: European University Foundation, April 2018.

Riaño, Y., "The Invisibility of Family in Studies of Skilled Migration and Brain Drain", in Skilled Migration and the Brain Drain, Vol. 14, No. 1, 2012, pp. 25-62.

The Treaty of Lisbon, Title IV Free Movement of Persons, Services and Capital, Chapter 1 Workers, Article 45 (ex Article 39 TEC).

United Nations, The Universal Declaration of Human Rights, 1948.

von der Leyen, U., A Union that strives for more. My agenda for Europe. Political guidelines for the next European Commission, 2019, available at: https://ec.europa.eu/commission/sites/beta-political/files/political-guidelines-next-commission_en.pdf Widuto, A., Regional inequalities in the EU, European Parliamentary Research Service, 2019.