Seminar Paper Topic Pitch

The Determinants of Growth in EU Candidates' Regions

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Table of Contents

Paper Inspiration

Jesús Crespo Cuaresma, Gernot Doppelhofer & Martin Feldkircher (2014): *The Determinants of Economic Growth in European Regions*

- Panel dataset of 255 NUTS-2 regions, 48 variables, 1995-2005.
- BMA approach:
  1. Baseline model of cross-section of European Union regions;
  2. Baseline model plus country fixed effects;
  3. Baseline combined with a spatial autoregressive (SAR) structure

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- Panel dataset of 255 NUTS-2 regions, 48 variables, 1995-2005.
- BMA approach:
  1. Baseline model of cross-section of European Union regions;
  2. Baseline model plus country fixed effects;
  3. Baseline combined with a spatial autoregressive (SAR) structure
- The convergence process **between** European regions is dominated by the catching-up process of regions in 'new' EU members in CEE countries, whereas convergence **within** countries is mostly a characteristic of regions in 'old' EU states.

Research Question

The aim of the paper is to investigate the determinants of growth of EU candidates at regional level.

1. Republic of Serbia (4 regions)
2. Bosnia and Herzegovina (3 regions)
3. Montenegro
4. Kosovo
5. North Macedonia
6. Albania (3 regions)
7. Turkey (26 regions)
8. Georgia (11 regions)
9. Ukraine (24 regions + Kyiv)
10. Moldova

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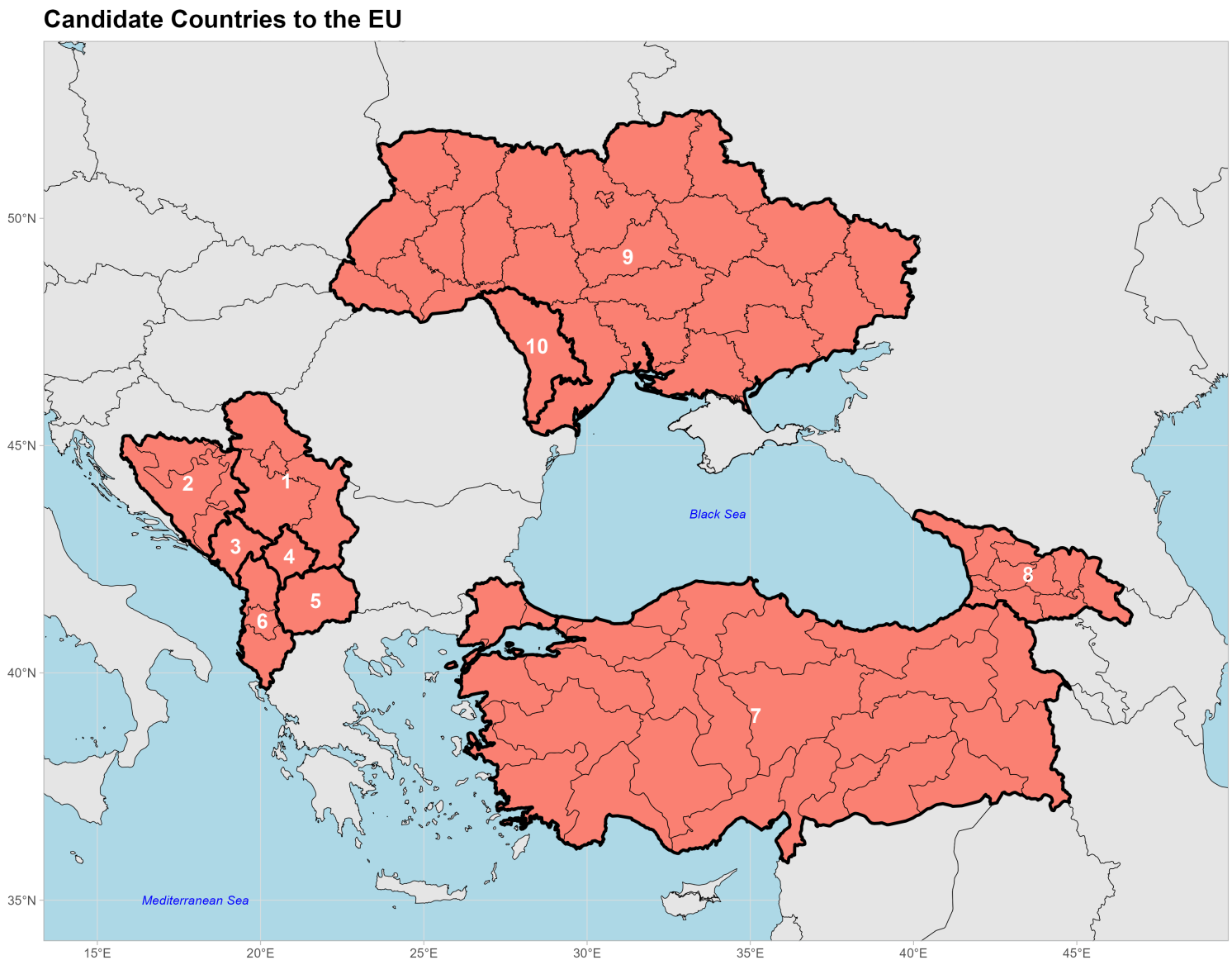
Area of Research



Data

Sources: Eurostat/Ardeco, WIIW, National Statistical Offices.

- Factor accumulation and convergence
- Human capital
- Technological innovation
- Sectoral structure and employment
- Infrastructure
- Socio-geographical

Time span from early 2000s - 2019

Regional Data Coverage

Country coverage:

- Kosovo, North Macedonia, Montenegro, Albania, BiH, Moldova→ singular NUTS-2 region
- Serbia, Ukraine, Turkey, Georgia → multiple NUTS-2 region

Population threshold as per Eurostat NUTS regulation [1]:

Level	**Minimum**	**Maximum**
NUTS-1	3,000,000	7,000,000
NUTS-2	800,000	3,000,000
NUTS-3	150,000	800,000

[1] More information *here*.

Method

- Paper uses the 3 BMA Model specification as in Crespo Cuaresma et at. (2014) [1].
- Prior structure: binomial-beta prior distribution.
  - MC^3 method adapted to strong heredity principle
- W selection:
  - first-order queen contiguity matrix
  - inverse distance weights

  Map
- Code Packages: `bma` and `bsreg` packages [2]
- Robustness Check:
  - different prior specifications (non-informative, dilution)
  - distance decay parameter
  - Unconstrained Durbin Model

Feedback

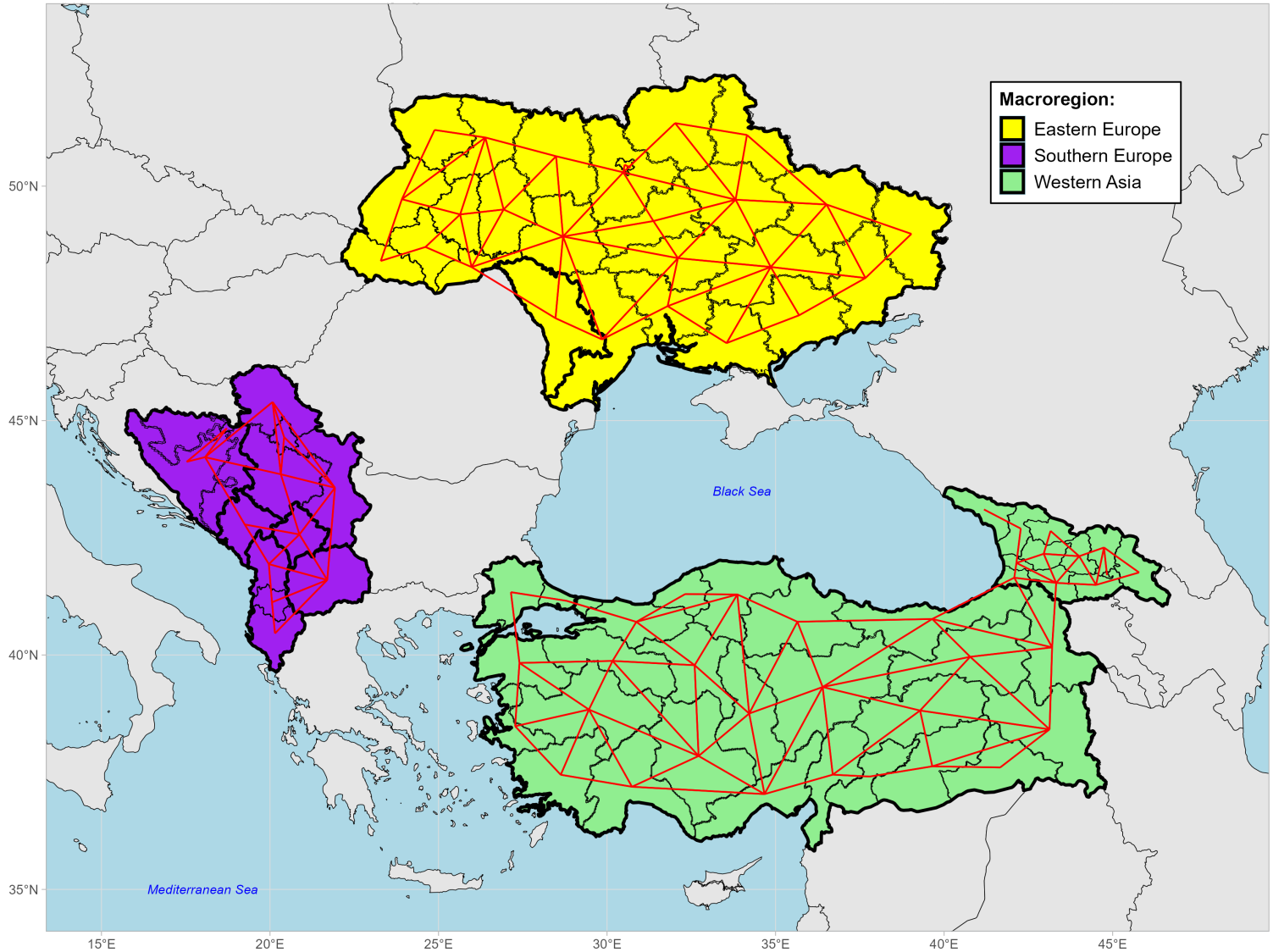
Thank you for your attention!

Feedback on open-points:

- W Selection
- `bsreg` package
- Additional regional data sources

W Consideration

Macro-regions of Candidates to the EU and Contiguity W



Go back

References

[1] J. Crespo Cuaresma, G. Doppelhofer, and M. Feldkircher. The determinants of economic growth in european regions. Regional Studies, 48, February 2009.

[2] N. Kuschnig. Bayesian spatial econometrics: a software architecture. Journal of Spatial Econometrics, 3, May 2022.