LAMASUS
Land Management for Sustainability

WP4: Development of ex-post econometric models for assessing land use management drivers

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Why?

- Understanding the drivers of land-use and -management is crucial for informing public policies at both the European and national levels.

- These drivers can be economic, demographic, or pedoclimatic, and can vary across Member States and over time and spatial scales.

- Policymakers need to understand the drivers in order to evaluate the impact of past public policies and account for new climate challenges and economic contexts when formulating new policies.

What?

- Statistical/econometric models and associated papers discussing the drivers of land-use and -management and policy impacts at country, regional, and local resolutions

- Open-source code and documentation of the models (accessible for researchers and potential users)

- Three policy briefs on which policies and non-policy related drivers of land-use and –management matter at various spatial scales

How?

- Developing comprehensive statistical models for understanding the drivers of land-use and -management and evaluating policy impacts

- Analyzing the impacts of climate change on land use and how land-use and -management will adapt to future climate conditions

- Assessing the effectiveness of large-scale payments and prices on land dynamics at the national and subnational administrative scale (NUTS2 regions)

- Examining the impact of the Common Agricultural Policy (CAP) on the structure of holdings and their economic behavior at the farm level

- Understanding spatial patterns of land-use change and the impact of protection areas and zoning policies at a high-resolution level (5 km^2).

Region of Marseille: (a) Dominant land uses; (b) Local impact on "urban" share; (c) Local impact on "other" share
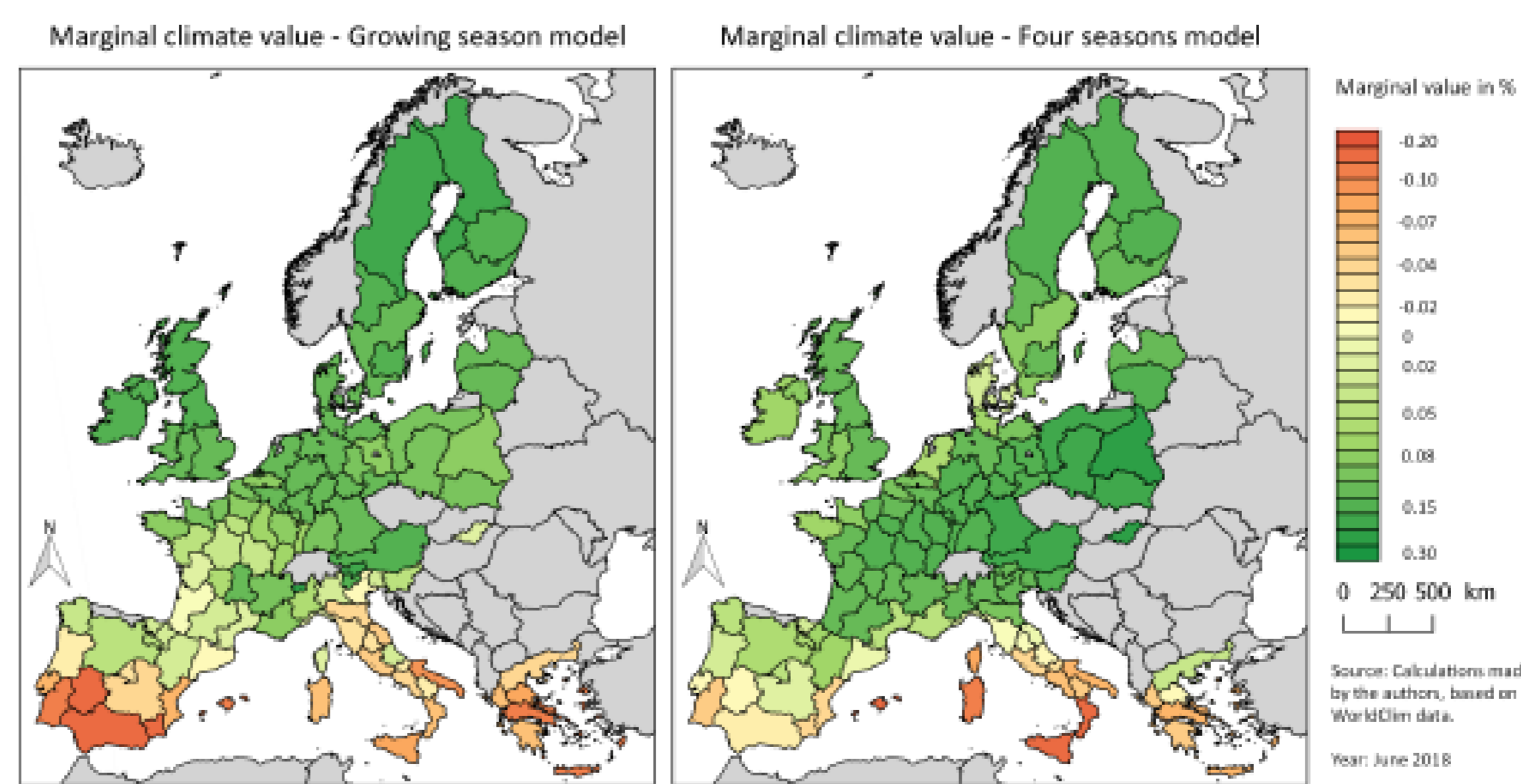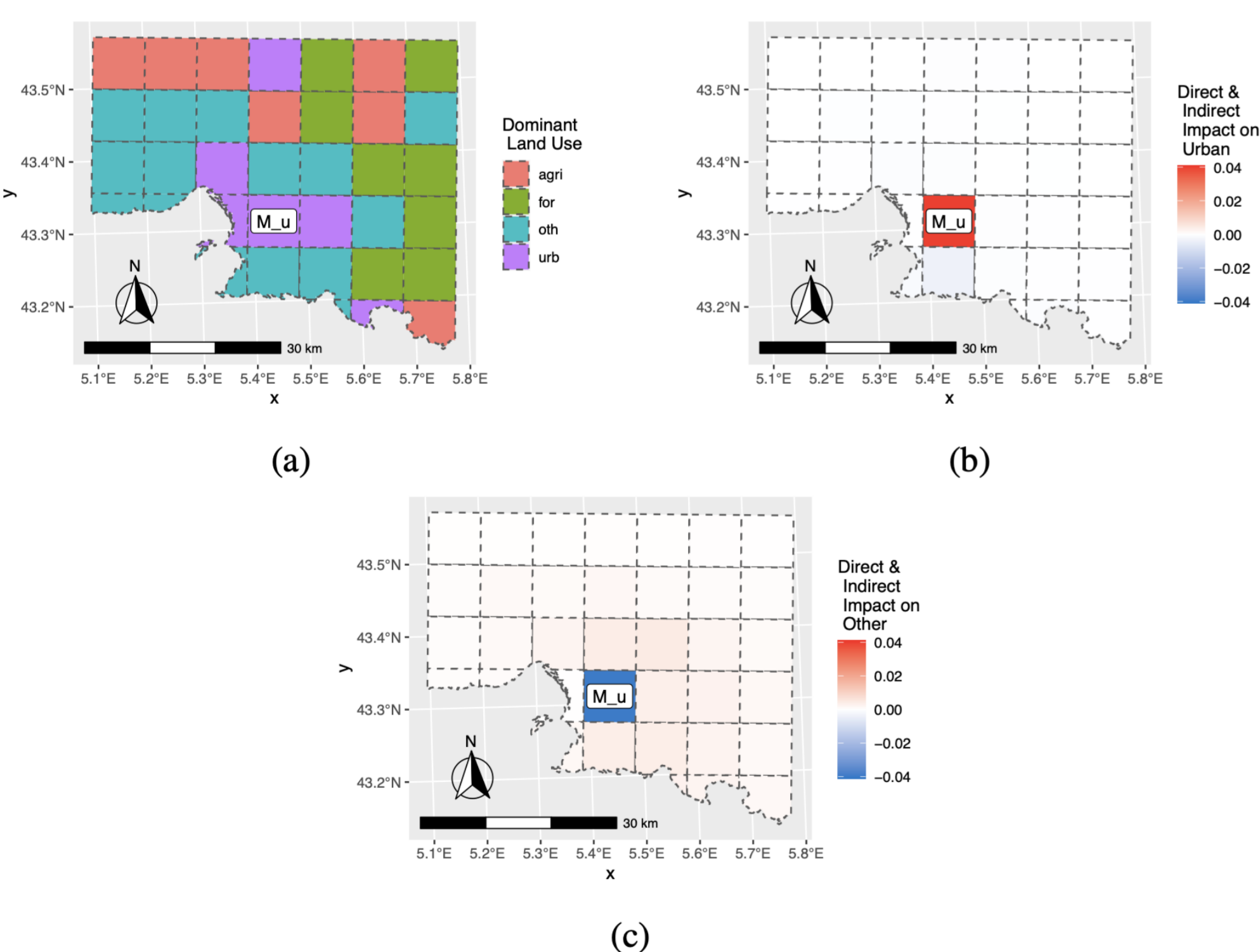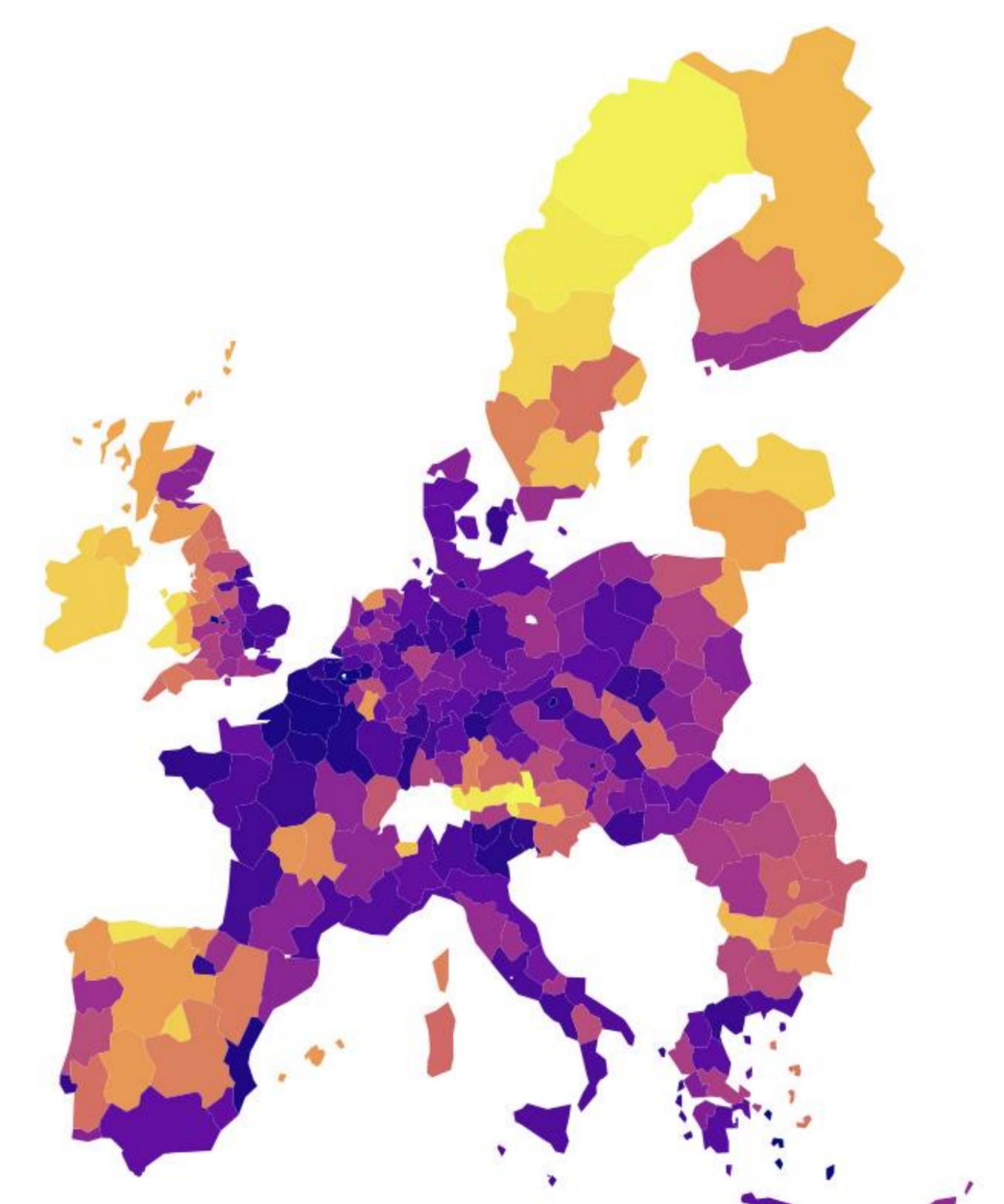

Figure 4: Total marginal effect of climate for the growing season and four season models (Models 1 and 3 respectively)

Illustrative impacts of policies on land-use change

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