

Desafíos, políticas y gobernanza de los territorios en la era post-covid XLVII REUNIÓN DE ESTUDIOS REGIONALES XIV CONGRESO AACR



## **EXTENDED ABSTRACT**

**Title:** The economic implications of Smart Specialisation governance: a general equilibrium analysis for Italy 2014-2020

Authors and e-mail of all: Carlo Gianelle <u>carlo.gianelle@ec.europa.eu</u> - Fabrizio Guzzo <u>Fabrizio.guzzo@ec.europa.eu</u> - Javier Barbero <u>Javier.barbero-</u> <u>jimenez@ec.europa.eu</u> - Simone Salotti <u>simone.salotti@ec.europa.eu</u>

## **Department: Unit B.7**

## **University: JRC Seville**

## Subject area: Governance and impact of territorial policies

**Abstract:** Effective policy design and implementation depend on the quality of institutions, which in turn is reflected in governance arrangements (Rodríguez-Pose, 2020). Yet, the ex-ante policy impact assessment literature mostly ignores the quality of governance dimension.

The quality of governance, and more specifically the capacity to design and implement policy interventions according to envisaged timeframes and budget allocations to achieve the expected results, cannot be taken for granted. Governance is a fundamental enabling condition for policy effectiveness, and not taking it into account deprives policy impact evaluations of explanatory power and, ultimately, of value as tools to guide policy action in practice.

Governance, and more generally the institutional context in which policies are conceived and implemented, acts as a mediating factor in the relationship between ends and means, i.e. in the policy intervention logic, and should be made instrumental to impact assessments. The reality of the implementation phase ought not to be ignored as it is often done in ex-ante impact assessments.

In the context of the European regional innovation policy called Smart Specialisation, evidence shows that often seemingly well-designed policies were not implemented as expected. The reasons behind this include unclear attribution of responsibilities and lack of political support in the implementation phase, ineffective inter-government coordination, weak interaction with (and engagement of) relevant stakeholders, and lack of adequate skills and resources in public administrations and other partners.

In this paper, we offer insights on the potential macroeconomic impact of the European innovation policy for Smart Specialisation governance. More specifically, we use original empirical data on the governance of the policy, funded through a dedicated financial envelope of the 2014-2020 EU cohesion policy, in a spatial macroeconomic modelling framework capable of gauging the general equilibrium effects of varying degrees of governance quality. This framework integrates a notion of the observed

quality of policy processes, concerning in particular the strategy design and the early implementation phases.

Our original methodological contribution narrows the gap between the abstraction of traditional ex-ante impact assessment exercises based on macroeconomic simulations and the often bumpy reality of how policy interventions may take place. The objective is twofold. On the one hand, we respond to a real and pressing need in the context of multi-annual, complex policy programmes, that is to provide the policy makers with well-timed impact scenarios that take into account the actual factors influencing the success of the policy. On the other hand, we address a fundamental shortcoming of most policy impact assessment approaches based on ex-ante simulations, i.e. the assumption that the policy will have a good design and actually be implemented in the expected manner and timeframe, which is an arbitrary assumption and one that is quite often disproved in the facts and therefore liable to invalidate the results.

Smart Specialisation is an "ambitious experiment" of a policy approach implemented on a continental scale in accordance with a set of common rules and principles, the application of which is guaranteed by the development of specific strategies. The existence of these strategies was a legally binding requirement (ex-ante conditionality) for accessing cohesion policy funds for research and innovation in the 2014-2020 period. There is an interest in evaluating this programming period which is coming to an end, and just prior to the launch of the programmes of the next period.

Smart Specialisation represents an ideal case study for the purposes of our research, as the implementation of its defining principles depends crucially on governance structures and processes. In particular, the following governance-related characteristics are all relevant: the ability to carry out selective interventions functional to strategic priorities and pursue them over time (Gianelle et al., 2020); the effective management of a broad stakeholder participation in the definition of those priorities through a search and discovery process (Foray, 2015); and the operationalization of a monitoring system that ensures a continuous feedback of information in the process of policy implementation.

In this paper, we combine two different methods of analysis by using survey data on the nature and quality of Smart Specialisation governance in a spatial general equilibrium model. In particular, we construct a synthetic indicator of the quality of Smart Specialisation governance using the responses to a survey targeted at regional and national administrations responsible for the Smart Specialisation strategies, with data for all the NUTS 2 regions of Italy. We then use the indicator as an input in a spatial dynamic general equilibrium model (based on Lecca et al., 2020) to simulate scenarios quantifying the economic consequences of various levels of governance quality. To the best of our knowledge, there is no available study yet incorporating the quality of governance of Smart Specialisation into policy impact assessments.

We firstly show that the regional quality of Smart Specialisation governance is not related to the amount of cohesion policy of funds received by the regions, nor to the more generic European Quality of Government Index based on citizens' perceptions. The general equilibrium modelling framework is then used to simulate the impact of the  $\epsilon$ 2.31 billion of cohesion policy funds whose disbursement were related to the implementation of regional innovation strategies for Smart Specialisation. The results suggest that the way in which the Smart Specialisation policy is implemented in the Italian regions could generate between  $\epsilon$ 1.02 and  $\epsilon$ 1.64 billion of GDP over twenty years, depending on the quality of governance in the regions, in addition to the  $\epsilon$ 4.41 billion of potential GDP gains over twenty years would not materialize due to the comparatively low quality of governance of the policy in some regions. This means that the actual quality of Smart Specialisation governance in Italian regions could have increased the pure investment-related impact of the policy by 23 to almost 40 percent

over the entire time horizon we consider. At the same time, we estimate that further potential GDP gains – in the order of an additional 40-50 percent over what was achieved with current levels of governance - would not materialize because of the comparatively low quality of governance in some regions.

These results hint to a dramatic variation in policy outcomes depending on the quality of governance. Our contribution hence narrows the gap between the abstraction of traditional ex-ante impact assessment exercises based on macroeconomic simulations and the reality of how policy interventions take place. Our results highlight the importance of all the phases of the policy cycle, from planning to implementation and monitoring. They also call for improvements in the way in which standard macroeconomic policy assessments are carried out, since it appears that the assumption of perfect implementation of the policy may often be unrealistic.

At the same time, the results suggest that the margins for increasing the impact of innovation policy by means of improving governance quality are substantial. This begs the crucial question of whether and how it is possible to increase the quality of innovation policy governance in the least-performing regions in order for them to converge towards the more virtuous models already experienced in some territories.

We argue that achieving such convergence would be helped by the interplay of three factors: (i) an improved knowledge about how innovation policies operate in their systemic contexts and institutional environment (Rodríguez-Pose and Di Cataldo, 2015), allowing for a more customised design of intervention measures and programmes; (ii) mechanisms favouring trans-regional and transnational policy transfer (Stone et al., 2020), which can be public initiatives and services; (iii) the build-up of policy capacity (Howlett, 2015) both in the territorial public administrations and in the network of innovation actors and intermediary bodies that participate in the development of the territory.

These factors tend to be addressed in different strands of literature, ranging from the economics and policy of research and innovation, to regional sciences, through political science and administrative studies. To the best of our knowledge, they have seldom been treated in an integrated manner; for example, policy transfer and policy capacity have been touched on only marginally in the mainstream research and innovation policy literature. An interesting avenue for future work might therefore be the attempt to create a more systematic bridge between these research areas.

**References:** Foray, D. (2015). Smart Specialisation. Opportunities and Challenges for Regional Innovation Policy. Routledge, London and New York.

Gianelle, C., Guzzo, F., and Mieszkowski, K. (2020). Smart Specialisation: what gets lost in translation from concept to practice? Regional Studies 54(10), 1377-1388.

Howlett, M. (2015). Policy analytical capacity: The supply and demand for policy analysis in government, Policy and Society 34: 173–182.

Lecca, P., Christensen, M., Conte, A., Mandras, G., and Salotti, S. (2020). Upward pressure on wages and the interregional trade spillover effects under demand-side shocks. Papers in Regional Science 99(1), 165-182.

Rodríguez-Pose (2020). Institutions and the fortunes of territories. Regional Science Policy & Practice 12(3), 371-386.

Rodríguez-Pose, A. and Di Cataldo, M. (2015). Quality of government and innovative performance in the regions of Europe, Journal of Economic Geography 15(4): 673–706. Stone, D., Porto de Oliveira, O. and Pal, L. A. (2020). Transnational policy transfer: the circulation of ideas, power and development models, Policy and Society 39(1): 1–18.

**Keywords:** *Governance, Smart Specialisation, General equilibrium modelling.* **JEL codes: C68, E61, O32.**