Modes of Innovation Intermediaries and Territorial Governance of Regional Innovation

Comparison of 'pôles' and 'filières' in Normandy

Auteur(s): Wang Yihan, Bourdin Sébastien, Fabien Nadou, Gibert Romain, Emmanuelle Faure

Innovation intermediaries are the public or private organizations that support innovation activities by facilitating knowledge sharing and collaboration among various stakeholders in a regional innovation ecosystem (Caloffi et al. 2023, Colovic et al. 2025). They play the crucial roles in the territorial governance of regional production and innovation activities, whereby different parties or actors of various natures contribute to working out—sometimes through discussion, and sometimes through conflict—common projects for the future development of the territories (Torre 2014, Torre and Traversac, 2021). By coordinating innovation projects and organizing social events, innovation intermediaries stimulate technological and market knowledge diffusion while strengthening the ties among stakeholders of regional innovation ecosystem (Wang and Bourdin, 2024).

Meanwhile, the geographical proximity of stakeholders and the organized proximity in innovation cooperation affect the business model of innovation intermediaries, in turn, they play different roles in territorial governance mechanism (Delorme, 2023). Nonetheless, limited research has been done on how different types of innovation intermediaries affect regional innovation in the territorial mechanism based on geographical and organized proximity of stakeholders.

This research studies how different modes of innovation intermediaries affect territorial governance of regional innovation. Specifically, we focus on two types of public innovation intermediaries in France - "pôles de compétitivité" (pôles) and "filières excellence" (filières). Whereas they both gather multiple stakeholders in the regional innovation ecosystem that collaborate on common interests, they play different roles in the territorial governance of regional innovation. The "filières" are both more territorially rooted and more focused on connecting local stakeholders on specific sectors. In contrast, the "pôles" establish cross-sectorial collaborations among stakeholders in different regions.

In the context of Smart Specialization Strategies (S3) of EU regional policy, both "pôles" and "filières" leverage technological and institutional tools to support research and innovation (R&I) grounded on place-based competitive advantages of local stakeholders of French regions. Meanwhile, the implementation of NOTRe law in France initiated the decentralization process of French regional innovation ecosystem characterized by successive mergers of clusters that are located in different regions but share similar thematic focuses (e.g., Aquamer, Pôles Mer, Valorial...) to enhance their international

visibility. As a result, local authorities now oversee transregional clusters whose geographical footprint extends beyond the originally intended territorial anchoring of competitiveness clusters. At the same time, the Strategic Industry Associations (Filières Stratégiques d'Excellence), defined by the regions and notably used in the development of Smart Specialization Strategies (S3), have historically operated under a purely regional governance model. The need to coordinate these two mechanisms within the S3 framework highlights the importance of clearly distinguishing their differences, especially in terms of governance, to ensure their effective mobilization by regional authorities.

In this research, we compared the modes and roles of "pôles" and "filières" in the territorial governance of regional innovation in Normandy, France. Specifically, we focus on the geographical location of affiliates (Bourdin and Wang, 2024; Speldekamp et al., 2023), the organizational logic (Polge & Torre, 2017) and their functions in intermediation (Caloffi et al. 2023; Bourdin et al., 2020) of both types of public innovation intermediaries. Grounded on proximity theory in territorial governance (Torre & Rallet, 2005), we establish a conceptual framework on territorial governance in regional innovation. Then, we apply the grounded theory approach to analyze qualitative data from the survey and interviews with key stakeholders in the regional innovation ecosystem in Normandy, thus we compare how these two types of innovation intermediaries balance cooperative and competitive dynamics in regional innovation (Torre, 2023) and affect the network structure of partnerships (Niang et al., 2022, Hussler and Hamza-Sfaxi, 2013).

The qualitative data collection consists of a survey regarding the innovation project participation and network building of stakeholders in both "pôles" and "filières", as well as a series interviews with their members and public policymakers on how geographic proximity and organizational proximity generated through the intermediaries shape their R&D activities. In this term, we explore the role of public innovation intermediaries (PIIs) in coordinating and structuring relationships between various stakeholders, who may be either competitors or collaborators. Then, we assess the roles and perspectives of public policymakers on the collaboration and cooperation between the two PIIs in the regional innovation ecosystem.

These findings will contribute to the literature on the territorial governance of innovation intermediaries and provide insights for policymakers responsible for their management and coordination, which can present challenges within the framework of Regional Innovation Systems (RIS) (Kristensen et al., 2023).

References:

Bourdin, S., Nadou, F., & Obermöller, A. (2020). Comment les politiques publiques favorisent-elles les dynamiques collaboratives d'innovation? Analyse du management de l'intermédiation territoriale. *Revue d'Économie Régionale & Urbaine*, (2), 311-335.

Caloffi, A., Colovic, A., Rizzoli, V., & Rossi, F. (2023). Innovation intermediaries' types and functions: A computational analysis of the literature. Technological Forecasting and Social Change, 189, 122351.

Colovic, A., Caloffi, A., Rossi, F. and Russo, M., 2025. Institutionalising the digital transition: The role of digital innovation intermediaries. Research Policy, 54(1), p.105146.

Delorme, D., 2023. The role of proximity in the design of innovation intermediaries' business models. Technological Forecasting and Social Change, 188, p.122246.

Hussler, C., & Hamza-Sfaxi, N. (2013). Le pouvoir transformatif de la gouvernance des réseaux. Analyse des réseaux d'innovation au sein des pôles de compétitivité. *Revue française de gestion*, 232(3), 139-161.

Fil Kristensen, I., Shearmur, R., & Doloreux, D. (2023). Comparing innovation strategies: Canada's Ocean Supercluster and Europe's Smart Specialisation initiatives. *Canadian Public Administration*, 66(3), 285-302.

Niang, A., Torre, A., & Bourdin, S. (2021). Territorial governance and actors' coordination in a local project of anaerobic digestion. A social network analysis. *European Planning Studies*, 30(7), 1251–1270.

Polge, E., & Torre, A. (2017). Territorial governance and multiple proximity. The case of public policy arrangements in Amazonia. *Papers in regional science*.

Torre, A. and Rallet, A., 2005. Proximity and localization. *Regional studies*, 39(1), pp.47-59.

Torre A, Traversac JB (2011) *Territorial governance. Local development, rural areas and agrofood systems*. Springer Verlag, New York

Torre, A. (2014). Proximity relations at the heart of territorial development processes: from clusters, spatial conflicts and temporary geographical proximity to territorial governance. In A. Torre & F. Wallet (Eds.), Regional Development and Proximity Relations: Edward Elgar Publishing. https://doi.org/10.4337/9781781002896.00009

Torre, A. (2023). Contribution to the theory of territorial development: a territorial innovations approach. *Regional Studies*, 1-16.

Speldekamp, D., Knoben, J., & Saka-Helmhout, A. (2023). Intermediation in European aerospace clusters: a configurational approach. *Regional Studies*, *57*(9), 1649-1665.

Wang, Y., & Bourdin, S. (2024). Coordination matters-territorial governance in innovation clusters: Comparison of Cité biotech (Canada) and Polepharma (France). *Management International*.