Issues of coherence between economic and socio-political regulations: the example of wind energy in western Switzerland

Marie-Joëlle Kodjovi, PhD, Research Fellow, University of Applied Sciences Western Switzerland, +41 24 557 62 68, marie-joelle.kodjovi@heig-vd.ch

Pierre-Henri Bombenger, PhD, Professor, University of Applied Sciences Western Switzerland, +41 24 557 23 24, pierre-henri.bombenger@heig-vd.ch

Overview
The implementation of energy transition objectives is part of a set of converging provisions at the global level. In most Western countries, the aim is to replace conventional energy with low-carbon production. However, the deployment of renewable energy infrastructure faces several obstacles. The Swiss case is illustrative of this situation. The Canton of Vaud, one of the territories with the best wind resources, plans to build 156 wind turbines by 2035. The projected energy production of these machines is comparable to the production of the Bourgogne Franche-Comté or the Bretagne regions. However, these two French regions have areas 15 times larger (for Bourgogne Franche-Comté) and 8 times larger (for Bretagne) than those of the Canton of Vaud. To date, none of the wind farm projects in Vaud has yet emerged from the ground, although some have been in the process of being developed for more than twenty years.

The literature suggests two explanatory factors: economic on the one hand, because of the costs necessary for the development of these new infrastructures, and socio-political on the other hand, because of the emergence of collective actions to oppose these energy projects. The analysis of the Waldensian case identifies in particular four main phases during which the institutional framework for regulating wind power activity is structured and modified, first to remove the economic barriers to investment, and secondly in response to the mobilization of different groups of private or social actors. It shows that the result is an institutional instability that undermines the legitimacy and legality of wind farm projects.

Methods
Our work mobilizes an analytical framework in both new institutional economics and political science. The case study concerns the Canton of Vaud and more specifically the seven wind farm projects most advanced in the construction authorisation procedure among the nineteen projects included in the cantonal master plan. This case study is placed in the national context of energy transition and the resulting federal and cantonal regulatory measures. Our analysis uses two data sources based on public and private documents (federal and cantonal legislation, public reports, cantonal master plan, preliminary examination files, opposition letters, court decisions, press) and interviews of key actors (semi-directive interviews with cantonal services, municipalities, developers and associations). Data collection took place between 2014 and 2018, in two contexts: the Swiss national research Fund’s Gouvéole research project and several mandates from the Canton of Vaud.

Results
Attempts to institutionalize wind power regulation have so far failed to achieve the energy transition objectives, particularly through the construction of wind farms in the Canton of Vaud. Of course, economic incentive instruments have proved their worth by generating a significant number of project intentions among promoters. On the other hand, the modalities of territorial regulation by public policies have failed to bring together the divergent interests and social representations that are expressed around wind energy projects.

In this context, our study identifies three factors that more precisely influence the effectiveness of territorial regulation: the lability of the regulatory framework, a cantonal administration that oscillates between promoting and regulating, and a planning procedure that favours the crystallization of opposition.

Conclusions
The analysis carried out here outlines the main institutional factors explaining the gap between the dense normative and argumentative production by federal and cantonal administrations to support and regulate wind power activity and the many obstacles that wind power projects face. In particular, it highlights the novelty of the sectoral issues raised by the emergence of this energy activity on territories and the oppositions they generate at
different territorial scales. In this context, the Canton must produce both the standards to be met and the methodologies to control their consideration when issuing land use permits. These procedural uncertainties coupled with the highly unstable nature of the applicable legal standards confer a decisive strategic advantage on opponents who find many procedural flaws admissible by the courts of law.

The more structured and professional the opposition becomes, the more extensive the processing of claims requires a high degree of technical expertise, requiring new studies on the part of the proponents and required in judicial proceedings before the courts. This is where the limits of such a process of institutional regulation of wind power activity appear. The recent evaluation of the cantonal actions deployed since 2015 to support this sector shows that, in a context where no wind turbine has received a definitive authorization to set up, both for promoters, political-administrative actors and opponents, the only answers expected are those from the judicial authorities. They are the only referees of a series that has known only twists and turns but no end.

This case study highlights the role of the institutional framework in the development processes of renewable energy projects. It illustrates the difficulties of implementing the energy transition linked to the dissociation between economic regulation at federal level and territorial regulation of a renewable energy production activity at local and cantonal levels, all the more substantial when the latter are produced by different administrative scales. It also highlights the difficulties for public authorities to define stable rules, while the economic and social context, energy production technologies and knowledge of their impacts are constantly evolving rapidly. Technical, but also organisational, legal and social innovations are thus produced at the same time as their implementation. The Waldensian case finally makes it possible to grasp the challenge of ensuring intersectoral coherence between public policies produced at different institutional levels.

References