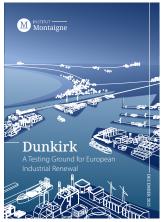


REPORT Executive summary - December 2025

Dunkirk

A Testing Ground for European Industrial Renewal



Over the past three years, approximately four billion euros of French and European public funds have been allocated to the industrial renewal of Dunkirk. The stated objective is clear: make Dunkirk a testing ground for European industrial renewal, one in service of the environmental transition, green technologies, and regional competitiveness.

This monograph on Dunkirk and its surroundings seeks to provide a first progress report of this ambition. It allows us to both examine how local, national, and European public policies have been coordinated to support such a project and to draw key lessons.

The first lesson concerns the concentration of resources on a single territory and their synergies: land, infrastructure, procedures, and taxation. Everything must contribute to the speed of execution and the coherence of the project, both at the industrial level and in social and political terms. The second focuses on conditions of competitiveness: low-cost energy, risk management sufficiently anticipated upstream and administrative promptness—whether in proposing investments, issuing permits, or connecting networks. The third concerns governance, local, of course, but above all European, so that on-the-ground efforts are not undermined by the overarching principles of free trade and to ensure economic security strategies fully justify hard-won public investments.

Dunkirk has become the symbol of a proactive approach needed for European industrial renewal. It is a gamble that has not yet been won and illustrates the difficulty of reconciling, on the one hand, French competitiveness, European governance, and global aggressiveness, and, on the other, of sustainably investing in decarbonized sectors that remain too immature within an economic and political context that lacks long-term clarity.

Marie-Pierre de Bailliencourt, Institut Montaigne's Managing Director



he European economy is stalling, its industrial power is faltering, its international influence is being called into question, and its environmental transition agenda is being challenged. Against this backdrop, this in-depth study of a region at the intersection of all these challenges offers valuable insights for rethinking public policy.

1. DUNKIRK, A FLAGSHIP PROJECT FOR ECOLOGICAL AND INDUSTRIAL TRANSFORMATION AT THE INTERSECTION OF LOCAL, NATIONAL, AND EUROPEAN SCALES

Today, Dunkirk is at the forefront of industrial revitalization efforts in France and, more broadly, in Europe. Two emblematic dynamics are at work: on the one hand, the decarbonization and transformation of traditional heavy industries, and on the other, the establishment of new industrial sites around the construction of a battery value chain. The energy transition and reindustrialization of France and Europe are unfolding through these dynamics, thus reducing the external dependencies that constrain our strategic room for maneuver.

ArcelorMittal and Aluminium Dunkerque (which together employ 4,000 people across the territory) have invested around €4 billion in the decarbonization of their local sites while benefiting from nearly €1 billion in public aid. These sites alone account for 40 percent of national steel production and two-thirds of aluminum production;¹ they also generate more than 15 percent of industrial carbon emissions in France. At the same time, connected to northern France's historic automotive industry ecosystem, Dunkirk is now at the heart of ambitions to develop a "Battery Valley." Four projects are currently under development in the region:

 Upstream in the value chain, Orano and XTC are planning together to set up two factories to produce battery components and assemble battery cells.

- These factories are intended to supply, in particular, two gigafactories (battery production and assembly) that are currently under development: one by Verkor, which plans to produce 16 GWh of lithiumion cells per year starting in 2026, and one by ProLogium, which aims to produce 48 GWh of solid-state batteries. Together, the gigafactories should be able to equip nearly one million cars per year.
- Conceived from the outset in connection with the installation of the gigafactories, the Suez project completes the value chain with downstream activities as part of a circular economy approach. It plans to set up a battery dismantling plant intended to process 200,000 batteries per year; a second recycling plant could also be built on site. In addition, Orano/XTC is also planning a battery recycling plant.

These projects are at very different stages. The Verkor plant is almost complete, while construction on the Pro-Logium and Orano plants is not expected to begin until 2026. The launch of the Suez site, meanwhile, has been postponed until after 2025. In total, these investments in the battery sector in Dunkirk are expected to exceed €9 billion, of which roughly €3 billion is financed by public aid (regional, national, and European). They are expected to create at least 5,000 direct jobs.

These companies all agree on their reasons for choosing Dunkirk: the availability of serviced land, abundant access to carbon-free electricity, a region situated at the intersection of European industry and rich in logistics infrastructure, the crucial involvement of the local authorities, and support from the public authorities at the national level (including financial support). This last point emerged in all interviews with local stakeholders conducted during the preparation of this report: Dunkirk's industrial dynamic benefits from the support of all public stakeholders working together, backed by local public opinion that is supportive of industry, which is perceived as an integral part of the local identity.

¹ Two-thirds of primary aluminum production and one-third of total production (including recycled aluminum).



However, Dunkirk still faces many challenges and risks in pursuing its renewed industrial ambitions. Energy prices are a major concern for all projects. International competition distorted by state capitalism in China, which heavily subsidizes its green energy sector, is a threat that could worsen in the absence of a political response commensurate with the stakes. Sustainable access to a skilled workforce is a constant challenge, and all stakeholders in Dunkirk's transformation believe that an adjustment to public policies is needed to achieve this. Changes to the European carbon market regulatory framework are a source of both concern—regarding the disappearance of free emissions allowances—and hope, regarding validation of decarbonization efforts. At the same time, the emergence of a European demand-based policy, through sustainability criteria or European preferences in public procurement, could be an important determinant of Dunkirk's success. However, this option is currently only at a preliminary stage of debate and design, in contrast to China, which is making full use of it to provide its national players the scale they require to conquer international markets. Added to these are ongoing difficulties, notably the slow pace of administrative procedures, particularly for environmental issues, as well as cumbersome and complex applications to access essential French and European public funding to support these projects.

2. THE IMPORTANCE OF CONCENTRATING NATIONAL AND EUROPEAN INDUSTRIAL POLICY RESOURCES IN SPECIFIC AREAS

Between the creation of a Battery Valley and the decarbonization of its historic heavy industries, Dunkirk is at the forefront of next-generation industrial development. The convergence of these political ambitions and the multiple forms of support that accompany them—in a region that has, in many ways, been devastated by the deindustrialization of recent decades—make it an exceptional testing ground for the industrial changes that are currently underway. The lessons that can be learned here resonate strongly with local, national, and European public policymakers alike.

Several of the strengths of the Dunkirk industrial area mentioned above are prerequisites for the success of French and European industrial ambitions. The Dunkirk case study also highlights a factor that is essential if reindustrialization efforts are to succeed: the importance of concentrating resources in one geographical area, i.e., a cluster-based approach. Dunkirk's industrial dynamism is thus based on local political will in line with national and European levels. It is reflected, among other things, in land-use planning and appropriate project support and employment policies. Such policies respond to a specific context and would lose their effectiveness if generalized.

In a particularly competitive and increasingly globalized industrial economy, such a proactive approach requires alignment among industrial, political, and administrative actors. Beyond individual, partisan, institutional, and corporatist interests, the willingness to "work together" is a marker not only of this shared strategic ambition but also of the day-to-day operational commitment to supporting projects that contribute to it. Synergies between different projects are a key factor in their respective successes.

The mass effect (the cumulative impact achieved by concentrating multiple related projects and policies in one region) plays a role in ensuring consistency between the various public policies related to reindustrialization. This enables the region to put to good use its expertise and assets to serve certain industrial sectors and support their success: training programs tailored to industry needs; services to address the shortcomings of the workforce; administrative services acquainted with industrial issues; supporting the long-term development of industries through the establishment of nearby research centers, etc.

The fact that a shared vision in an environment of strong trust is a determining factor for success makes the case for an industrial policy vision refocused on regional and sectoral clusters—in contrast to the dominant European approach, which favors equalization between regions and tends to spread resources too thinly.



3. THE SUCCESS OF DUNKIRK? A TIPPING POINT

There are several urgent reasons why a renewal of industrial policy in Europe is necessary. The first is the need to advance our economies' environmental transition in the face of climate change. Second, we need to reduce our external dependencies in the context of increasingly brutal globalization. Finally, we need to bring our economic decline and territorial disintegration to a halt. On the initiative of France and Germany, Europeans started to make this industrial policy shift shortly before the COVID-19 pandemic, with the Green Deal and then the Clean Industrial Deal spearheading these new ambitions.

The revival of European industrial willpower—which was already fragile—has been hit by a series of shocks of exceptional magnitude. The sharp reduction in the availability of Russian gas has permanently driven up the price of energy in Europe compared to the rest of the world. The U.S.' aggressive approach to trade, via massive subsidies to green industries under Joe Biden and customs barriers under Donald Trump, has severely affected European prospects in its main export market. Finally, the rapid emergence of a world-class industrial base in China in a number of industries, coupled with massive subsidies and overcapacity, challenges industrial production around the world, particularly in Europe.

Despite a genuine but belated commitment, industrial policies in France and Europe still risk failing to deliver the expected returns on investment. In Dunkirk, more than €4 billion in public investment is already at stake—to say nothing of the indirect exposure and economic and social damage of potential failures.

If these efforts to bring about an industrial revitalization in Dunkirk were to fail, despite the many advantages mentioned above, the consequences for both France and Europe would be heavy. The credibility of our entire industrial capacity would be called into question and, even more so, our ability to withstand the fierce industrial competition brought by the new phase of globalization. Our ambitions for strategic

autonomy would also be severely affected. More generally, public support for a decarbonization agenda, which cannot be achieved simply by closing down our industries, would undoubtedly be weakened. Dunkirk invites us—and at the same time obliges us—to identify room for maneuver at the national and European levels to further accelerate the path to reindustrialization.

At the national level, it is important to take action in the following four priority areas:

- Clarifying energy policy, particularly with regard to the role of French energy players.
- Strengthening skills in industrial professions, which must also be developed and coordinated with existing regional clusters.
- Simplifying and introducing more flexibility in our regulatory framework by shortening implementation and certification timelines or even considering location-specific policies and supports to help areas with concentrated industries and important strategic projects thrive.
- Reducing production taxes, which remain a specifically French burden on the national production.

At the European level, it is important to take action in the following areas:

- Ensure a reduction in the energy price differential for manufacturers compared to other major regions of the world. The recently established flexibility in terms of direct support for energy-intensive industries and decarbonization projects must be further exploited and, above all, financed.
- Concentrate financial support: Underinvestment by the public and private sectors (compared with our non-European competitors, particularly China) and the fragmentation of national and European financing instruments lead to a sub-optimal dispersion of efforts, while their cumbersome nature adds constraints, delays, and complexities that are out of step with the pace of global developments. The obvious response to this is to move to a new approach that concentrates public efforts and support in targeted regions.



 Existing European policies must be adapted to the new industrial objectives. Far from being limited to the targeted easing of state aid rules, competition policy must go beyond just the European market and focus more actively on global competitors. At the same time, trade policy, along with establishing preferential treatment for European producers in public procurement and publicly funded projects, must help stabilize market prospects across Europe for critical industrial sectors. The establishment of priority areas for industrial recovery would be based on spontaneous local industrialization initiatives and support them retrospectively through tax and bureaucratic relief or relevant *ad hoc* measures.

To this end, it is necessary to think on a European scale—on the one hand, convincing the European Commission and other Member States of the relevance of this type of territorial concentration and, on the other hand, being able to rely on robust supply chains within the European market. Indeed, an integrated approach at the continental level would secure such an organization in the long term by strengthening industrial complementarities and market synergies.

Recommendations

Recommendation 1

Establish priority areas for industrial recovery based on access to land, support for infrastructure construction, tax exemptions, and bureaucratic relief.

Building on the French "Territoires d'industrie" (Industrial Territories) initiative, a public policy launched in 2018 and renewed in 2023, that certified 183 French territories, this report recommends, in order to go further, faster, and with greater impact, entrusting the prime minister's office with identifying a dozen of these priority areas in mainland France and its overseas territories on which to focus efforts and develop special administrative and tax regimes.

In close cooperation with the Ministry of Industry and drawing on local authorities' knowledge of industrial ecosystems, a strong signal should be sent to local stakeholders about the priority given to value creation and industrial job creation and about its commitment to accelerating the upgrading of the necessary infrastructure and simplifying the administrative and regulatory implementation of projects.

Recommendation 2

Promote a project-based organizational model for the end-to-end administrative assistance of industrial projects and related local infrastructure and development plans.

In Dunkirk, coordination between the Port (Grand Port Maritime de Dunkerque) and RTE (Electricity Transport Network) with the Urban Community of Dunkirk (CUD), supported by the sub-prefect, enabled them to play a structuring role in land planning ahead of the implementation of various industrial projects, by anticipating needs and coordinating actions ahead. This success argues for the widespread adoption of these best practices at the national level.

It is therefore necessary to take the following actions:

- Align the region's assets with the essential needs for the success of the projects in terms of infrastructure, training, and service support.
- Identify, in each priority area, the players necessary for its success. Local specificities are essential to defining the strategy, and industrial and administrative players must be able to align themselves under the leadership of an industrial champion.



- Enable manufacturers to bring their R&D closer to production areas by facilitating the financing and pooling of regional multi-sector laboratories and test benches. In the case of Dunkirk, such an approach could be led by the Dunkirk Campus of the Université Littoral Côte d'Opale.
- In line with a "clustering" approach, prioritize rapid connections to the electricity grid for sites to be industrialized and develop large-scale energy storage capacities there.
- Encourage all local stakeholders to submit a list
 of recommendations for administrative and regulatory simplification to the State via the prefecture in order to accelerate the development of
 identified industrial projects. The prefecture can
 play a major role in identifying the key conditions for success and coordinating closely with
 the stakeholders involved in territorial decentralization, particularly the regions and Chambers of
 Commerce and Industry.

Recommendation 3

Create a specific tax regime for these industrial clusters, especially by reducing production taxes.

Our study of industrial revitalization projects in Dunkirk highlights the priority importance of stabilizing corporate taxation and continuing to reduce production taxes. Despite the efforts begun in 2017, France remains at a disadvantage compared to its European partners.

Industries, due to their large land holdings, are particularly affected by property tax, and a reduction or exemption from this tax would encourage them to set up in the region. Beyond the immediate financial effect, measures targeting skilled and expert salaries could improve the region's ability to attract talent with competitive salaries: An exemption from employer contributions on these salaries would help break out of the low-wage trap, motivate skills training, and attract new talent. Other tax levers, such as a reduction

or elimination of the C3S (corporate social solidarity contribution), are also avenues to explore to strengthen the establishment and development of industrial clusters.

Recommendation 4

Guarantee long-term access to secure, carbon-free, and competitive energy.

Access to affordable and stable electricity is the primary concern for industrial companies in the Dunkirk area. In this context, and within the framework of the European market, it is necessary to take the following steps:

- In France, clarify the government's strategic objectives and priorities in terms of energy policy—which should be addressed by the draft Multi-Year Energy Program (PPE 3), due to be published this year. It is necessary to clarify the role and objectives of EDF, between profitability and priority for industrial development, which must concretely lead to an increase in nuclear production allocation contracts (CAPN) between EDF and "highly electro-intensive" industries.
- In Europe, encourage futures markets to reduce dependence on short-term markets, thereby guaranteeing stable and competitive electricity prices for manufacturers, in particular through long-term contracts such as Power Purchase Agreements (PPAs) or Contracts for Difference (CfDs).
- In the medium term, reduce the share of fossil fuels in the electricity mix in order to better control electricity prices. This would require the following actions:
 - Continuing efforts to shift a significant portion of energy use to electricity to replace fossil fuels.
 - Supporting the revival of new nuclear reactor construction in France (which will only be able to meet additional demand in fifteen to twenty years' time).



- Supplement this plan with a policy focused on faster development of renewable energies.
- Take advantage of the political structuring around clusters to keep pace with the growth in demand for carbon-free electricity. When this demand exceeds the available nuclear supply, respond to it with the simultaneous deployment of renewable capacities.
- In conjunction with this accelerated development of renewable energies (intermittent and decentralized), accelerate and amplify investments in networks and energy interconnections at the European level to facilitate grid balancing, increase flexibility, and make consumption more predictable. This also includes the issue of storage in industrial clusters. These clusters encourage the establishment of carbon-free industries, thereby creating demand. It is also necessary to anticipate future energy storage needs and install large-scale storage infrastructure.

Recommendation 5

In order to create the conditions for a project-based approach, the government must implement a state-backed risk guarantee system, for example by instructing Coface (Compagnie française d'assurance pour le commerce extérieur, a major trade credit insurance company) or an equivalent body to pay particular attention to this.

In Dunkirk, several decarbonization projects using new technologies are struggling to get off the ground or have been abandoned. This is particularly the case for the Heat Highway and other projects involving waste heat recovery, hydrogen, and carbon use and storage. There are two reasons for this: the lack of risk-taking by project stakeholders faced with economic uncertainty and insufficient guarantees and support mechanisms.

Recommendation 6

Strengthen the adaptation of training systems to the objectives of reindustrialization.

In the collective imagination, industry remains associated with arduous work. Reindustrialization requires a change in these perceptions through communication and education aimed at specific target audiences (young people, women, etc.). Again, in line with the cluster approach, these educational initiatives should be organized at the local level, in conjunction with the industries in each region, with a view to aligning the region's resources and assets with the needs of its industry. In Dunkirk, for example, this has resulted in the organization of open days at factories, collaborations between industries and schools, trade shows for the general public, etc. At the national level, the need to retrain the workforce requires strengthening the attractiveness of scientific and technical training in early education, in a manner adapted to the new needs of industry, and encouraging lifelong learning in these fields. This is a key element of a genuine industrial policy strategy, giving French and European citizens the skills they need to achieve their ambitions. Reindustrialization must go hand in hand with greater social inclusion through opportunities for education, lifelong learning, and wellpaid, high-quality jobs. Regional industrial clusters have an essential role to play in implementing this policy.

Recommendation 7

Work towards better alignment of European competition and territorial cohesion policies with industrial policy objectives.

The European Union tends to favor economic harmonization among its Member States, a choice guided by the legitimate requirement of fairness but which results in a territorial cohesion policy that spreads resources too thinly at the expense of effectiveness. It thus steers



its policies with a view to catching up on development delays in certain regions rather than reorienting them toward strategic industrial projects capable of mitigating its economic fragilities and dependencies. This involves, in particular, reorienting the ERDF, the European Regional Development Fund (€9.1 billion for France in the 2021–2027 budget), toward industrial projects in territorial clusters. The case of Dunkirk shows the importance of aligning territorial cohesion policy with industrial policy objectives, an alignment that also applies to competition policy.

Indeed, the difficulties encountered by several actors and businesses in the Dunkirk area highlight the need to broaden the scope of exemptions from European competition law for IPCEIs. It is not only necessary to clarify the objectives that allow for exemptions. There is also an urgent need to introduce a more permissive interpretation of the types of projects that can benefit from exemptions. **Projects that can reduce** proven European dependence or promote the resilience of critical value chains should be assured of their eligibility for exemptions from the IPCEI state aid regime, which is currently limited by an innovation criterion. This IPCEI framework must be mobilized in favor of these territorialized industrial clusters. In the same vein, the expansion of aid authorizations provided for in the new European Clean Industry State Aid Framework (CISAF) would benefit from incorporating a territorial approach. In addition, competition law should be amended so as not to hinder the emergence of European champions in sectors where critical mass is achieved on a continental scale.

Recommendation 8

Beyond the Industrial Accelerator Act (IAA), create an "investment shock" for European industry through dedicated labels and tax incentives.

The Dunkirk study demonstrates the relevance of the conclusion of the 2024 Draghi Report on the need for an investment shock in Europe, which is the only way to

overcome the asymmetries with China and the United States. The instruments for European reindustrialization are undergoing a complete overhaul at the level of the Commission and the Member States: European preference in public procurement, reflection on the development of the Capital markets Union, preparation of a second Chips Act, refocusing of the European budgetary framework on industrial issues, etc.

In the wake of the adoption of the Clean Industrial Deal in early 2025, new tools are being developed to this end. The Industrial Accelerator Act (IAA), scheduled for adoption early next year, aims to stimulate demand by introducing low-carbon criteria into public procurement for heavy industry decarbonization and green industry projects. European local content criteria are also being considered, which is highly desirable in order to stimulate demand and promote clusters. Measures to support Member States in planning and implementing environments conducive to industrial clusters are planned but with the main objective of maximizing the effectiveness of the transition. This should be an important step in the European institutions' recognition of the need to act by concentrating support geographically in the areas best placed to strengthen Europe's industrial competitiveness and resilience.

However, it is necessary to go further. While waiting for agreements on the European capital markets union, which are still uncertain, a few immediate measures can be considered:

- Place European resilience and competitiveness criteria at the heart of European industry support mechanisms, similar to the approach currently being taken with regard to the criterion of industrial projects' usefulness to the energy transition.
- Establish an EU tax refund system—a cash rebate system that reimburses businesses after they have made investments, similar to tax credits but within the framework of EU subsidies.
- Create a "resilience" label for priority projects, potentially backed by preferential treatment, in addition to the "low carbon" label currently in preparation.



 Encourage the convergence of existing national and European financing instruments through a reform of the IPCEI, with a view to simplifying procedures, broadening eligibility criteria based on resilience and competitiveness, and allocating European budgetary resources to support national state aid.

Recommendation 9

In the face of international competition, better adapt European trade policy to industrial and resilience imperatives by mobilizing economic security instruments in a strategic and coordinated manner.

European industries, and in particular industrial ecosystems such as Dunkirk, are bearing the brunt of global trade dynamics: massive distortions of free competition, expansion of Chinese capacity in strategic segments of value chains (particularly batteries), US policy aimed at imposing asymmetric agreements, increasing acts of economic coercion, tensions over critical supplies, and persistent weakness in European domestic demand.

These trends are creating major uncertainty about the viability of industrial projects, given distorted international competition and a multilateral framework that is losing its regulatory capacity. The French government must focus its political action within the EU on three areas:

Mobilize European trade defense instruments in a more coordinated and strategic manner. Existing instruments (anti-subsidy, anti-dumping, safeguard measures) are currently used sporadically and on an ad hoc basis. They must be deployed in the service of a coherent strategic agenda for the protection of European industry, in a methodical manner and with a carefully considered timing so that the sequence of procedures has maximum impact. To achieve this objective, it is necessary to

- speed up the procedures for initiating trade defense instruments by strengthening the European Commission's investigative capabilities.
- Mobilize targeted economic diplomacy to secure critical supplies. The new European trade policy instrument (Clean Trade and Investment Partnerships) is a promising tool that is currently being tested in negotiations with South Africa. It can be used to conclude simplified agreements focused on critical materials, resilience issues, and Europe's industrial interests. They should be used to build structural industrial partnerships (co-investment, co-processing, value sharing) in order to anchor capacities in Europe and with partner countries willing to play by balanced rules on a long-term basis.
- Adopt a coalition trade policy by deepening agreements with economies willing to commit to resilience and industrial competitiveness interests, particularly around the alignment of public procurement criteria. The French presidency of the G7 offers an opportunity to push this agenda in 2026 within a framework that could be extended by a multilateral initiative led by the EU.
- Making the Carbon Border Adjustment Mechanism (CBAM) and ETS true guarantors of our industrial sovereignty. The ETS system, combined with the CBAM, must become a tool for competitive fairness rather than a factor weakening energy-intensive industries.
 - Gradually extend the CBAM to intermediate and finished products in order to prevent circumvention and protect the entire European value chain.
 - Combine the European target of a 90 percent reduction in emissions by 2040 with a pooled financing mechanism, enabling strategic industrial sites to make the necessary decarbonization investments.
 - Recycle CBAM and ETS revenues according to three priorities:
 - Targeted compensation for exposed industries.
 - Financing industrial transformation and



- decarbonization projects on European soil.
- Decarbonization partnerships with countries that supply critical resources, in order to secure supplies while supporting their transition, in a spirit of strategic reciprocity.

Recommendation 10

Ensure that the Commissioner for Prosperity and Industrial Strategy promotes a coherent policy among Member States, industry, and the general public.

Despite numerous national and European initiatives in the field of industrial policy, there is currently no overall vision or strategy that takes into account the reality and potential of Europe's territories. While sectoral plans are multiplying (semiconductors, hydrogen, cleantech, etc.), governance is struggling to develop an overall strategy with a territorial dimension. A clear mandate from the heads of national and European institutions to agree on a few priorities is undoubtedly necessary, particularly to coordinate the various public policy silos that such an ambition must mobilize. This approach has been successful in overcoming the euro crisis and could represent, with regard to industrial ambition, a necessary step toward political convergence at the relevant level.