

Briefing Note: Foundational Industries and the UK's Modern Industrial Strategy: Securing Steel and Critical Minerals

INTRODUCTION

Recent events in Iran highlight how geopolitical conflict creates deep economic uncertainty and risks of supply chain disruption in the UK. In doing so, global instability in 2026 have reaffirmed the pressing need for policies that ensure national economic resilience in a context of continued global rivalry over materials and technologies.

The UK's Modern Industrial Strategy, published in 2025, reflects a growing recognition that **economic security is inseparable from industrial capacity**. Ensuring the resilience of **foundational industries** has become a core concern for trade, industrial, and security policy, and the Modern Industrial Strategy recognises this by carving them out a separate category supporting the 'IS-8' growth-driving sectors. The foundational sectors 'upstream' in supply chains focus on extracting and/or producing raw materials. They also remain highly vulnerable to economic problems caused by trade disruption, global conflict, and financial loss.

In this briefing, we draw on a recent study completed by Critical Minerals Challenge Centre (CMCC) researchers with the Foundation for European Progressive Studies (FEPS) to examine the growing political and policy importance of these foundational industries. We argue that, rather than an afterthought, the **designation of foundational industries in UK industrial policy should be strengthened as a tool for managing strategic dependence and building national advantage**. This should involve the **development of a suite of measures to ensure both the resilience and growth of foundational industries** (see final section).

This briefing was prepared following the Call for Evidence on critical minerals from the UK Business and Trade Subcommittee on Economic Security, Arms, and Export Controls. We present a comparative analysis of two sectors of strategic importance in the UK. First, we explore the **steel sector** as an established foundational industry that has require new policy to ensure its resilience. Second, we draw on CMCC expertise to introduce **critical minerals** as a re-ascendant foundational industry, and the extent to which current policy frameworks might provide comparable security and resilience.

ECONOMIC SECURITY AND FOUNDATIONAL SECTORS

The recent FEPS report *"Place Based Industrial Policy: Places, people & Power in European Industrial Policy"* (Cox *et al.*, 2026) examines how industrial policy in the UK and Europe is being reshaped by economic security concerns, supply chain disruption, and geopolitical risk. Drawing on document and policy analysis and stakeholder engagement through interviews and roundtable discussions, the report introduces four case studies that illuminate the turn towards securitisation and resilience-building in industrial policy:

- **Semiconductors in Dresden, Saxony, Germany**, examining how long-term state support has supported the development of a new ecosystem manufacturing a technology of critical importance across sectors.
- The **transformation of multiple industries in Pori, Finland**, where proactive and multi-scalar policies have been introduced to support the growth of metals, energy, and defence related industries, and the role of proactive local and national coordination.

In this briefing, we draw on the two UK case studies explored in the report:

- **Steel in Port Talbot, South Wales, UK**, where a foundational sector has been placed under considerable financial pressure by global competition, high energy prices, and policy uncertainty.
- **Critical minerals in Cornwall, UK**, where the re-emergence of upstream materials (tin, lithium, tungsten) has re-positioned former mining communities in the centre of an evolving national policy framework to ensure economic and supply chain resilience.

Our findings build on the UK's Modern Industrial Strategy to show that industrial policy should move beyond a narrow focus on 'growth sectors' to now include a prioritisation of supply chain resilience and managing upstream risk. While the UK's Modern Industrial Strategy focuses on eight key sectors (such as advanced manufacturing, clean energy, and life sciences), it also responds to submissions received in the consultation on the original Green Paper to include an explicit focus on '**foundational**' industries. Defined in a standalone section distinct from the overall structure of the Strategy, these sectors are defined as providing "critical inputs and infrastructure" and include industries in **metals, minerals, and materials**. These are understood as **critical inputs** that enable broader supply chains, and whose disruption would have significant consequences across energy systems, advanced manufacturing, digital infrastructure, and defence supply chains.

The focus on foundational industries should underpin a significant shift in how the UK conceptualises economic vulnerability and strategic dependence. It refocuses attention on the broader supply chains that support growth industries and pays attention to the need to ensure such upstream sectors remain secure and resilient against the headwinds of global events.

Our work highlights that such a move is necessary but requires further strategic clarity and policy certainty. Metals, minerals, and materials underpin all eight growth-driving sectors, yet remain areas of heightened vulnerability due to global concentration, foreign state intervention, and limited domestic capacity. The further strategic designation of these sectors as '**foundational industries**' reflects three economic security considerations central to the Committee's call for evidence:

- **Strategic dependency risk:** Reliance on overseas suppliers for critical inputs exposes the UK to disruption, coercion, and price volatility.

- **Systemic supply chain exposure:** Disruption in foundational industries propagates rapidly across downstream sectors, amplifying economic and security impacts.
- **State responsibility for resilience:** Market mechanisms alone are insufficient to secure supply of strategically essential inputs, necessitating targeted state intervention.



From this perspective, foundational industries cannot simply be an industrial classification. They, instead, are a **category for managing strategic risk**, signalling where the state may need to act to safeguard continuity of supply. In the sections below, we outline such an approach in relation to the steel and critical minerals sectors.

STEEL AS AN ESTABLISHED FOUNDATIONAL INDUSTRY

The steel sector in the UK provides the clearest example of the need for cohesive policy frameworks to ensure a strategically important sectors (and those working within it) are supported. Steel is a key input across multiple critical national supply chains, including energy infrastructure, transport, construction, and defence manufacturing.

Despite this importance, the steel sector has remained precarious for many years. As detailed in our FEPS study, challenges stem from high energy prices, price volatility through cheap imports, and policy uncertainty.

However, a series of policy responses to this uncertainty are apparent. All signal the ways that national government have sought to manage risk in a foundational industry:

- **Financial support in paying high energy costs.** This recognises that the exposure of foundational industries to higher electricity prices increases production costs and reduces global competitiveness and, with it, the viability of domestic capacity.
- **State subsidies to support the** transition of the Port Talbot steels to electric arc furnace. This was framed as an intervention with multiple benefits: including

emissions reductions, protecting jobs at the works, and preserving sovereign production capability.

- **Legislative action** to prevent the closure of blast furnaces at Scunthorpe. This was explicitly justified as an intervention to ensure national supply chain resilience and the economic security of a strategic sector.

The uncertain future of the steel sector has often been used as an example of national economic vulnerability and a lack of competitiveness. As a foundational industry that is strategically important for multiple industrial sectors, its resilience is of an ever-growing importance. Recent interventions, such as securing steel jobs in Scunthorpe in 2025, signal a growing willingness to tolerate fiscal cost when ensuring domestic production and supply chain resilience.

The case of the steel sector provides an important example for the policy focus on foundational sectors: once a sector is recognised as foundational to national capability, the state is prepared to deploy **exceptional measures** that may be extended in other areas of economic activity beyond steel alone. This is further evidenced by continuing public discussions around the nationalisation of British Steel, with the King's Speech (2026) containing further commitments on this front subject to a Public Interest Test.

CRITICAL MINERALS AS A NASCENT FOUNDATIONAL INDUSTRY

The extraction and processing of critical minerals hold an increasingly central role in discussions of national economic sovereignty, supply chain resilience, and industrial strategy. In our work, we have focused on the potential domestic production of **tin, lithium, and tungsten** to highlight their role as essential inputs to clean energy technologies, digital technologies, and defence industries.

While previous interventions to grow the UK's critical minerals sector have framed it as a route to trade diversification and sustainability, it has recently been repositioned as a key site of managing global supply chain risk and contributing to the country's defence, security and resilience. This was evident in the integration of the sector into the Clean Energy Industries Sector Plan, where critical minerals are treated as critical inputs to a strategic industry, rather than a standalone sector, and the interest in stockpiling of resources for the purposes of defence production

This direction of travel was consolidated in the UK's new Critical Minerals Strategy (Vision 2035), which describes critical minerals as foundational inputs to the sectors driving the Industrial Strategy. Researchers at the Critical Minerals Challenge Centre (CMCC) are examining the repositioning of critical minerals as foundation industry materials, and their importance to four of the IS-8 sectors (advanced manufacturing, clean energy, digital, and defence).

Our analysis highlights several emergent signs of policy interventions to support the critical minerals sector. These include:

- **Public equity participation** through investments made by the National Wealth Fund, designed to boost additional private sector investment.
- **Acceleration of planning processes** through the designation of critical minerals projects as Nationally Significant Infrastructure Projects.
- **Policy alignment with national security policy**, including commitments to stockpiling and recognition of critical minerals as a terrain of growing geopolitical competition.
- **The use of place-based investments** to boost jobs and growth in mineral hotspots like Cornwall (e.g. the Kernow Industrial Growth Fund).

Given the significance of critical minerals as an emerging foundational industry, the impact of these interventions must continue to be assessed. Government must also be responsive to industrial needs as development progresses.

STEEL, CRITICAL MINERALS, AND ECONOMIC RESILIENCE

The recent report for FEPS highlights several key similarities and divergences in how foundational sectors are treated in the UK. In doing so, it raises points central to the Committee's inquiry: **whether critical minerals are being afforded commensurate protection given their strategic role.**

The steel and critical minerals sectors share several characteristics that justify their characterisation as foundational industries. These include:

- 'upstream' importance in numerous supply chains driving national industrial strategy;
- capital-intensive modes of extraction, processing, and production;
- high exposure to global trade wars, geopolitical risk, and economic competitiveness;
- significant role in the defence, energy and critical infrastructure sectors pivotal to powering and protecting the nation.

Such characteristics highlight that **the critical minerals sector may meet the same economic security criteria that has justified exceptional intervention in steel.**

The designation of **foundational industries** in the UK's Modern Industrial Strategy is a significant acknowledgement that economic security depends on safeguarding upstream capacity. Recent treatment of the steel sector signals how far the UK is willing to go when supply chain resilience is deemed at risk. While the critical minerals sector is moving in the same direction, it remains at an earlier and less consolidated stage of policy development.

Measures taken to support the critical minerals sector are less comprehensive and less institutionalised than those applied to steel. There are three points of divergence:

- **Maturity of sector and intervention:** Where the steel sectors benefit from established support mechanisms and longer histories of importance and intervention, policy support for the critical minerals sector remains nascent and fragmented.
- **Coverage across the value chain:** Where steel policy addresses production capacity directly (and links it to key manufacturing sectors), critical minerals policy would benefit from a further elaboration on how processing and refining stages will be secured in national supply chains.
- **Institutional coordination:** Where policies for the steel sector primarily stem from the Department for Business and Trade, the multi-faceted, systemic benefits of a national critical minerals sector may lead to multiple departments having decision-making authority. This may confuse and dilute matters of ownership, responsibility, and sectoral leadership in HMG.

IMPLICATIONS FOR FUTURE POLICY DESIGN

The UK Government should be prepared to extend to critical minerals the same **robust, security driven approach** that has been recently applied to steel. Both are foundational industries with significant value in strategically important supply chains.

For this to happen, **the nascent designation of foundational industries in national industrial policy should be strengthened as a tool for managing strategic dependence.** Rather than an afterthought in the Modern Industrial Strategy, foundational industries could be a critically important part of the green economy, from which the UK could build significant advantage and resilience. Far from just an industrial classification, this designation can come to represent the signalling of a set of upstream industries of national importance – now and far into the future.

This should involve the **development of a suite of measures to ensure both the resilience and growth of foundational industries. For the critical minerals sector, this might include:**

- The stronger deployment of public finance and demand-side instruments to ensure longer-term financial viability and investment.
- Further expansion of critical minerals stockpiling efforts, both sustaining demand (supporting domestic industry) and building resilience against exogenous shocks.
- The streamlining of mineral rights policies to bring Britain up to date with all other minerals-producing countries and facilitate smoother domestic exploration.
- More explicit work to coordinate and map institutional cooperation.
- Further supply chain analysis (particularly following the UK Critical Imports and Supply Chains Strategy).
- A clearer prioritisation of domestic midstream capacity for the purposes of value retention.

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Critical Minerals Challenge Centre – Accelerating the Green Economy

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