

# Aldersgate Group response: The energy grid and grid connections

February 2025

## Background

The Aldersgate Group represents an alliance of major businesses, academic institutions and civil society organisations, which drives action for a competitive and environmentally sustainable UK economy.<sup>1</sup> Our corporate members represent all major sectors of the economy, and include Associated British Ports, Aviva Investors, BT, CEMEX, the John Lewis Partnership, Michelin, Nestlé, Siemens, SUEZ, Tesco, and Willmott Dixon. Aldersgate Group members believe that ambitious environmental policies make clear economic sense for the UK, and we work closely with members when developing our independent policy positions.

The Aldersgate Group has completed and contributed to a significant body of work on energy and grid infrastructure development. For more information, please see:

- Aldersgate Group (2024), [Why Nature Matters for Business](#)
- Aldersgate Group and UK Energy Research Council (2025), [Electrifying Industry and Distribution Networks: considerations for policymakers](#)
- Aldersgate Group, Frontier Economics (2024), [The Role of Regulation in Restoring Nature and Delivering Net Zero](#)
- Aldersgate Group, RenewableUK, CPRE (2024), [Electric dreams: how the planning system can help deliver the UK's low-carbon energy](#)
- Aldersgate Group, RenewableUK, CPRE (2024), [Insights for the decarbonised electricity system: journeys through planning \(interim report\)](#)

## Short summary of the response

- The transition to net zero is introducing new sources of power generation, located in different parts of the country, and increasing demand for electricity as other sectors decarbonise. All the National Energy System Operator's future energy pathways show significant increases in electricity demand in 2050, between 2 and 2.7 times more than 2023.<sup>2</sup> The UK energy grid is critical infrastructure for the transition to net zero and a growing economy – progress towards a grid fit for the future is urgently needed.
- Current challenges, such as the connections queue, delays in the planning system for new infrastructure, and uncertainty, are caused by a lack of strategic planning and a lack of joined-up policy across energy and environmental policy. These challenges contribute to undermining investor confidence.
- A strategic approach and greater coordination across national and local bodies will be important for success. Efficient resourcing and other improvements in the planning system can support the planning system to act as an enabler for new infrastructure and restore certainty in timelines and private sector confidence. Finally, higher quality public engagement at the national and project level can support better outcomes for local communities, developers and the environment.
- Our response highlights the government's role in ensuring greater join up across its existing energy and nature related policies, both at the strategic and local levels. The government must harness mutually inclusive opportunities across climate and nature policy by incentivising integrated solutions for decarbonisation and nature-positive energy infrastructure.

---

<sup>1</sup> Individual recommendations cannot be attributed to any single member and the Aldersgate Group takes full responsibility for the views expressed.

<sup>2</sup> NESO (2024), [Future Energy Scenarios](#).

## Questions

- 1. What is your view of the National Energy System Operator’s proposals to reform the connections queue? Will those changes be sufficient to ensure that projects necessary to meet the clean power target will be able to connect in a timely way? If not, what further changes are needed?**

The connections queue, as it stands, is a crucial challenge to resolve for the decarbonisation of the energy system. The lack of strategic approach in the current system means that critical projects may be waiting a significant time for a connection, when they could otherwise be progressing. This impedes progress towards a clean power system but also introduces investment risk, with investors citing the connections queue as a barrier.

The National Energy System Operator (NESO) must carefully consider reforms to the connections queue to set up a more strategic approach and ensure greater alignment with the Clean Power Action Plan. It will be essential to test for and understand potential unintended consequences of proposed reforms to mitigate them ahead of time, including potential impacts on energy users (as opposed to generators) in the queue, market effects and investment signals for projects perceived as prioritised or deprioritised.

- 2. It is possible that the removal or deprioritisation of projects in the connections queue could be subject to legal challenge. What protections will NESO and networks need from any legal challenges which could arise as a result of changes made to the connections queue?**

N/A

- 3. What barriers to delivering energy network infrastructure are imposed by the planning and consenting system? To what extent do these barriers relate to the resourcing of the various planning authorities, or to levels of community consent for this infrastructure? What is your view of the Government’s proposals to address these barriers, and are further changes needed?**

In a recent collaborative project with RenewableUK and CPRE, the countryside charity, Aldersgate Group investigated how the onshore planning system for renewable energy and grid infrastructure can be improved. This research took a user journey approach, exploring how different user groups (energy developers, the environment, and local communities) interact with the Nationally Significant Infrastructure Project (NSIP) regime. As part of this, in the interim findings<sup>3</sup>, we identified several system challenges that contribute to unintended or cascading consequences. These included:

- **Lack of strategic plan, joined-up policy and public engagement:** the NSIP regime is designed to deliver on a project-by-project basis, rather than taking a whole-system programmatic approach to delivery. The choice of location is frequently driven by the availability of grid connections or the need for new grid infrastructure for offshore developments, rather than a holistic consideration of issues facing developers, the environment and local communities. The public also reports a lack of information on decarbonisation, more widely. This lack of a strategic plan, joined up energy and environment policy, and wider engagement contributes to cascading challenges in the system.
- **Resourcing challenges across the system:** resource and skills shortages, especially across statutory bodies and local authorities, as well as particular expertise such as ecology or public engagement, result in delays and timeline uncertainty.

---

<sup>3</sup> Aldersgate Group, RenewableUK, CPRE, (2024), [Insights for the decarbonised electricity system: journeys through planning](#)

- **Data:** the NSIP process requires significant data and evidence gathering and sharing, which are critical to good stakeholder engagement and decision-making. Inefficiencies are introducing additional strain into the system.
- **Uncertainty**, which is inherent throughout the process: the characteristics of the environment are highly local and are not fully known at the onset of a project, before environmental surveys have been carried out. In the case of innovative technologies, an understanding of the impacts and effectiveness of mitigation evolves with time. Uncertainty is not always best managed or communicated, with potential negative consequences for trust and engagement. Opportunities to learn lessons through monitoring and research are also missed.
- **Trade-offs** can be complex, needing to balance local impacts and national public interest priorities. In some cases, stakeholders do not view policy as sufficiently clear to set out how trade-offs should be managed and support decision-making

**More specifically, on resourcing planning authorities**, we found that the efficient resourcing of statutory consultees, for example through access to centralised or regional hubs and relevant expertise, would help reduce uncertainty around timescales for applications and improve community engagement.

Resourcing challenges across the planning system are well documented and widely recognised, in particular skills and capacity shortages affecting statutory consultees and local authorities. They contribute to delays and uncertainty on timescales to progress applications, undermining confidence for the private sector to invest.

Skills and capacity shortages affecting statutory consultees contribute to delays and uncertainty on timescales to progress planning applications, undermining confidence for the private sector to invest. A freedom of information request to Natural England by Wildlife and Countryside Link highlighted that between 2022-2023, Natural England failed to meet deadlines for 17.1% of NSIP applications,<sup>4</sup> due to under-resourcing and workload issues in over a fifth of cases. Lack of resources within statutory consultees also contributes to reduced or limited participation during early engagement, which can lead to unexpected requests for additional time and information during the formal application process, further increasing uncertainty for developers. Productive conversations at an early engagement stage help develop more thorough and high-quality applications upfront and reduce the back and forth in the formal process.

Ecology and planning skills are highlighted as particular areas of concern. Demand and competition for ecologists will continue to increase with the expansion of Biodiversity Net Gain (BNG). With regards to planners, remuneration is declining in real terms and up to a quarter of planners are estimated to have left the public sector since 2013.<sup>5</sup>

Potential solutions that may provide more immediate relief and efficient use of public funding to address skills and capacity challenges at local authorities include:

- A public sector body, similar to Active Travel England, might have a role in supporting coordination and delivery of regional plans, providing specialist support to local authorities.
- The Net Zero Hubs, regional publicly funded bodies who supported organisations on matters related to net zero, could provide expertise and support with planning, ecology, public engagement and the NSIP system.
- Local authorities who have experienced the NSIP system could be supported to share more widely lessons and experience with others, building on the example of Suffolk's NSIP Centre of Excellence.

---

<sup>4</sup> Wildlife and Countryside Link, 2024, [Comprehensive Spending Review \(CSR\) submission](#)

<sup>5</sup> RTP1 (2023), [State of the Profession 2023](#)

**Improving community engagement at both the strategic and project level is vitally important for better project outcomes.** While public support for net zero is high, support varies for energy infrastructure.<sup>6,7</sup> More granular awareness and understanding of the potential benefits and impacts of energy infrastructure vary across the country and communities. At the project level, this can contribute to a lack of engagement or the spread of misinformation if there is an information vacuum. Opposition to projects can be strong and well-organised from the outset or increase over time, which introduces risks to the wider net zero transition if public views shift towards greater opposition. Developers report that significant time can be spent discussing the need for a net zero transition and new energy infrastructure overall, which reduces the time available to discuss project specifics. Cases of strong community opposition can lead to wider opposition to energy infrastructure development and net zero policy more generally. Such opposition can create significant pressure on politicians, leading to delays in planning decisions and policy changes.

Better quality engagement with local communities can contribute to better outcomes for both communities and developers, with communities bringing valuable local knowledge to shape the project. Early engagement is also a key stage in the process, when changes can be made and solutions co-developed. The scope for change is increasingly limited as an application progresses through the system.

To better engage local communities, action is needed at both the strategic level and the project level. At a strategic level, the government should lead a public campaign making the case for new renewable energy and grid infrastructure to lay foundations for positive community engagement. The campaign should bring together a coalition of organisations, including energy developers, environmental NGOs, relevant charities and local bodies. The campaign would provide accessible evidence on the need for new infrastructure, benefits and trade-offs and raise awareness of the mechanisms through which the public can participate in the planning system.

At the project level, the government, local authorities and the energy sector should work together to increase capacity, expertise and sharing of good practice for public engagement around renewable and grid energy infrastructure at both a strategic policy making level and project level. We suggest:

- Developing and sharing good practice guidance and standards for public engagement for the NSIP regime, including developers and local authorities. Models such as Suffolk's Centre of Excellence or regional Net Zero Hubs could provide mechanisms to share expertise and good practice across the country.
- Supporting capacity at local authorities and parish councils to play a more active role in local community engagement and representation in the NSIP process. Making wider use of the Planning Advisory Service to act on behalf of local communities is another potential solution to explore.
- A wider public campaign, recommended above, would also contribute to a higher quality of engagement by increasing public awareness and understanding of mechanisms to engage and by providing accessible collateral materials to support discussion.

#### **4. What community incentives and/or obligations might best enable grid expansion, and how should they be decided?**

'Community benefits' are considered separately from the planning consent process or issues of impact mitigation, due to the need in legal terms to avoid questions of planning permission being bought or sold. Improving the quality of engagement around 'community benefits' is also important to

---

<sup>6</sup> DESNZ (2024), [DESNZ Public Attitudes Tracker: Renewable energy, Spring 2024, UK](#).

<sup>7</sup> Onward (2023), [Power to the People](#).

ensure new renewable energy and grid infrastructure contribute to better outcomes for host communities.

For transmission infrastructure, the Electricity Networks Commissioner has made recommendations for community benefits, to which the previous government had responded.<sup>8</sup> This included lump sum payments to households close to new lines and a community fund established and distributed in the locality of new lines.

Other examples of benefits co-developed by the developer and local community include the incorporation of new public footpaths, visitor learning centres and engagement with local schools, creation of funds to invest in improvements for the local community such as support for energy efficiency improvements. The Hornsea 3 Community Benefit Fund has awarded grants to local groups, including village hall renovation and sustainability projects, and marine and wildlife rescue.

Research shows that support for development could be increased with well-delivered community benefits. Politicians are also more likely to support developments where benefits to the local areas are clear. However, poor experiences of engagement on community benefits with energy and grid developers can negatively impact community views on new infrastructure developments, including the positive and negative impacts of developments, and perceived distributional and procedural fairness. Views on community benefits also vary across communities, with some perceiving payments off bills as bribes or inadequate.

We support the recommendation from the Independent Review of Net Zero to use community benefits as a vehicle to deliver local net zero and environmental projects.<sup>9</sup> With higher quality engagement, supported through good practice and guidance for developers and accessible advice for local communities on nature and climate positive options, funds could provide benefits to host communities aligned with energy efficiency, decarbonisation and environmental improvement.

The government should also review the terminology around 'community benefits' and consider whether more distinct language may be helpful to avoid confusion. For example, 'direct community energy support' could be an alternative.

## **5. How can environmental considerations be accommodated in extending the grid network?**

The government must improve join-up between environment and energy policy to harness opportunities and incentivise integrated solutions for decarbonisation and nature-positive energy infrastructure. There is a perception that nature and landscapes are a secondary consideration in energy infrastructure development.

Solar and onshore wind developments have the potential to deliver significant nature benefits. However, this is not being driven by the policy frameworks currently in place. This contributes to a lack of trust in the integration of energy and environmental objectives in the Energy National Policy Statements and at the Development Consent Order stage for renewable energy and grid projects.

Environmental NGOs view climate change as the primary threat to nature, recognising the need for new energy infrastructure; some forms of new energy infrastructure can be an opportunity for nature recovery if done well. Integration can be complex and highly specific to the local area, with the cost

---

<sup>8</sup> Department for Energy Security and Net Zero (2023), [Community Benefits for Electricity Transmission Network Infrastructure – Government Response](#)

<sup>9</sup> Rt Hon Chris Skidmore OBE (2023), [Mission Zero: Independent Review of Net Zero](#)

and impacts of alternative solutions on nature varying depending on the area. Offshoring and undergrounding are good examples of this. We found goodwill with renewable energy developers and environmental stakeholders to identify nature-positive solutions and opportunities.

The Land Use Framework (LUF) currently being consulted on, the Strategic Spatial Energy Plan (SSEP), the review of the Environmental Improvement Plan, and Local Nature Recovery Strategies should be leveraged to join up energy and nature policy, both at the strategic and local level. For example, strategic planning offers the opportunity to use a strategic environmental assessment for site selection, reducing the risk of selecting sites that are not suitable and for which mitigation of impacts would be significant or not possible.

The government has announced the development of a new Nature Restoration Fund, described as “enabling infrastructure builders to meet their environmental obligations faster and at a greater scale by pooling contributions from developers to fund larger strategic interventions for nature”.<sup>10</sup> A strategic approach to environmental impact mitigation and compensation offers significant opportunities for a step change in progress towards nature recovery. In particular, a strategic approach has the potential to deliver increased good practice, efficiency and positive impact, with environmental impact mitigation and compensation delivered at scale. If designed well and appropriately resourced, the proposed approach could help ease the process for developers and ensure necessary oversight and delivery of good outcomes for both development and nature.

The design and implementation of the new approach must be carefully considered and tested with stakeholders to ensure that it works in practice. Reforms must not weaken existing environmental protections, and the government must carefully consider which habitats and species this new approach is appropriate for. Whilst a strategic approach presents significant opportunities, it must not be delivered at the expense of on-site mitigation, especially where on-site mitigation is beneficial. Developing a new approach may require time, and the government should consider what measures can be taken within the existing planning system in the interim. The Crown Estate’s whole seabed approach and research carried out for environmental NGOs may provide valuable lessons and good practice to draw from.

The implementation of BNG highlights the importance of adequate public sector resourcing to deliver effectively and efficiently. For example, the NAO identified challenges for local authorities due to the shortage of ecologists at the local level.<sup>11</sup> The Wildlife and Countryside Link also found that BNG enforcement was an issue, with 80% of surveyed enforcement officers reporting they were short staffed for their increased workload.<sup>12,13</sup>

Lessons from other countries highlight unintended consequences to avoid (turnkey sites in France, Renewable Energy Acceleration Areas in the EU, and renewable electricity zones in Australia).<sup>14</sup> Sites subject to a new approach could become more attractive (or much less attractive) than others, limiting the scope for development or investment in some areas. Developers may be limited in their ability to choose alternative locations based on specific project requirements or changing market conditions. Zones can also introduce boundary effects – for example, a concentration of new developments around the edges of renewable energy zones was observed in Australia, where benefits were available without being subject to the same requirements as within the zone.

---

<sup>10</sup> Department for Environment, Food and Rural Affairs (2025), [Planning proposals to unblock vital infrastructure and drive nature’s recovery](#)

<sup>11</sup> NAO, 2024, [Implementing statutory biodiversity net gain](#).

<sup>12</sup> WCL, 2024, [Fixing Biodiversity Net Gain](#).

<sup>13</sup> RTPI, 2022, [Planning Enforcement Resourcing](#).

<sup>14</sup> Aldersgate Group, CPRE and RenewableUK, 2024, [Electric dreams: how the planning system can help deliver the UK’s low-carbon energy](#). See Annex B, p. 54-55.

Public consultation and expert advisory groups will be valuable to test, iterate and inform the development of the proposed approach to ensure effective implementation. Evaluation and monitoring should be put in place to ensure changes can be made where necessary.

In the 12 months since BNG became mandatory for major developments, and although some progress has been made, shortfalls remain. These include application loopholes, enforcement shortfalls, limited ambition and patchy coverage.<sup>15</sup> BNG is expected to apply to NSIPs from November 2025. We believe government should bring forward a consultation to guarantee current issues are resolved and ensure the policy is more effective ahead of its introduction. The scale of NSIPs is an opportunity for BNG and biodiversity credit markets. The government should also consider how to incentivise better practice and nature positive design. Building on the advice from the Natural Capital Committee and lessons from the roll-out of BNG, the government should set out a roadmap to develop 'environmental net gain' and its integration into renewable energy and grid infrastructure projects. How BNG and the new Nature Restoration Fund operate together will also be important to clarify, to provide certainty to developers.

Aldersgate Group has also called for the National Planning Policy Framework (NPPF) to incorporate climate and environmental objectives, including climate change mitigation and adaptation<sup>16</sup>. Businesses strongly support this sentiment. It will be essential that the NPPF clearly incorporates the UK's net zero emissions target and environmental improvement plans so that all developments support our joint ambition to reverse the decline of nature and reduce our emissions to zero.

**6. Are Ofgem's price controls and regulatory regime appropriately balanced to ensure the necessary network investment to meet the UK's clean power target? Are changes needed to ensure greater network investment, and if so, what should those changes be?**

In 2023, Ofgem was given a new statutory regulatory duty around net zero. This welcome development can enable Ofgem to take a more strategic and anticipatory approach in delivering its duties.

As highlighted in the Aldersgate Group's work on the planning system with RenewableUK and CPRE, a strategic approach can help resolve cascading challenges upfront. This includes better coordination across the system, including multiple projects in a particular area. Anticipatory investment has a key role to play in delivering an energy system fit for the future, whilst minimising disruption to local communities where possible. Communities prefer a 'do it well, once' approach. It will be essential for Ofgem's price controls and regulatory regime to appropriately balance the necessary network investment to meet the UK's clean power target. Effective collaboration with DESNZ and the NESO will also be important to ensure the overall policy and regulatory landscape is consistent, supporting private sector confidence to invest.

Research for the UK Energy Research Centre has identified potential challenges to resolve in distribution networks, to prepare for the electrification of different sectors of the economy, from industry to home heating with heat pumps and transport with electric vehicles.<sup>17</sup> With a supportive policy environment, electrification of industry could deliver more than 40% of the greenhouse gas emissions reductions needed by industry to help reach the UK's net zero target. However, without further investment and rising electricity use, the distribution networks could become significantly

---

<sup>15</sup> Wildlife and Countryside LINK (2024), [Fixing Biodiversity Net Gain](#)

<sup>16</sup> Aldersgate Group (2024), [Aldersgate Group response: consultation on proposed reforms to the National Planning Policy framework and other changes to the planning system](#)

<sup>17</sup> Aldersgate Group and UKERC (2025), [Electrifying industry and distribution networks](#).

constrained from 2030. This means industrial sites in many regions may not be able to access the electricity they need to decarbonise. 42% of large industrial sites are constrained in 2030, increasing to 77% in 2050. By 2050, Yorkshire and the Humber will be the only unconstrained region.

From a policy and regulatory perspective, anticipatory investment in distribution networks must be enabled to support the decarbonisation of industry and other sectors. At present, regulation does not sufficiently encourage Distribution Network Operator's (DNO) to invest in network capacity ahead of need. This analysis shows that the rapid increase in demand from different sectors cannot be met without additional capacity beyond 2030. The accessibility and ease of the connection process and the information available for businesses should also be improved.

The government also needs to provide clarity on industrial electrification and the policies that will help enable electrification. This will be valuable in informing DNO scenarios, wider energy system planning, and investment in industrial decarbonisation. Better data on future industrial electricity demand is needed to develop an accurate understanding of where and when distribution network constraints will emerge.

## **7. What incentives need to be introduced to encourage generation and energy demand to locate closer to one another? Should this be done through locational pricing, and if not, should network charges be reformed to provide these incentives?**

The Aldersgate Group agrees that there is a need for more effective locational signals for generators, demand and storage. However, it is important to recognise that multiple factors affect the location choice of new energy infrastructure, including natural resources, supply chains and planning constraints. It will be important to assess the extent to which locational pricing would be effective in practice, to understand the risk of disincentivising investment in the additional low-carbon infrastructure the UK urgently needs, and to determine to what extent the benefits are sufficient to warrant additional complexity in the system. For example, a smaller number of zones would help for simplicity but may not be as effective, and a high number of zones could introduce additional complexity and perverse local situations.

Renewable assets are less flexible than other types of power generation and cannot be relocated to areas of high demand as easily as other power generation assets, such as gas plants. For instance, wind turbines must be situated in locations with optimum wind conditions. Electricity market reform will therefore need to focus on creating effective signals for flexibility and the co-location of renewable generations with long-term electricity storage options and/or areas of high demand where feasible. In particular, investigating how greater price exposure for renewables could create effective locational pricing and flexibility signals will be crucial.

With regard to the location of energy demand, energy cost is one factor among many that businesses consider when selecting a location for their operations. Other factors include the proximity of customers and supply chains, the availability of skills in the area, and other infrastructure, such as transport. For those businesses already operating in a particular area, energy price signals are unlikely to prompt relocation due to the associated costs and disruption.

Locational pricing could have negative implications for energy-intensive users, who could be placed at a competitive disadvantage if located in an area with higher prices. Implementation will need to be carefully considered, as well as mitigation for disproportionately negatively impacted energy users.

The government should also consider what role the SSEP and the Regional Energy System Plans (RESPs) can play in providing locational signals, as well as other policy and regulatory tools available to incentivise energy supply and demand to locate closer to one another.

**8. What is your view of Ofgem’s proposals to require a higher standard of service to connection customers from distribution networks? Should there be a greater standardisation of application processes and connection deadlines, with compensation for customers if they are not met?**

We welcome the introduction of higher standards of customer service from distribution networks. The connections process can be challenging to navigate for companies intending to electrify their operations. The process may currently also vary from one region to another. Increased consistency and standardisation of application processes will be valuable. A package of policies will be required to enable electrification across industry, including action to make industrial electricity prices more internationally competitive. The ease of connection to distribution networks should be part of this package.

**9. Is there sufficient strategic planning for distribution networks? What will Regional Energy Strategic Plans need to deliver in order to be a success?**

Our recent briefing with the UK Energy Research Council observed that electricity distribution networks need to be strengthened to meet the increasing electricity demand from industry and other sectors.<sup>18</sup> The government is currently developing spatial energy plans, including the SSEP and the RESP. Industrial electricity demand and potential constraints must be considered and addressed as part of these plans.

Historically, the scenarios used by DNOs to calculate headroom on the distribution network have not assumed significant increases in industrial electricity demand. Moreover, place-based, sectoral and temporal considerations are important when tackling network constraints as some regions, sectors and types of sites may be affected sooner than others by potential network constraints. As the government pursues the Clean Power 2030 Action Plan, it must ensure the energy system is set up to meet the developing electricity demands of all sectors beyond 2030.

In addition to challenges facing energy-intensive industry, homes and businesses also face bottlenecks at the district network-level. In some places, a lack of capacity in the local network is limiting new development. This is one reason that buildings generating electricity using solar photovoltaics (PVs) can have their PVs switched off, curtailing distributed local energy generation. Increasing the opportunities for distributed low-risk generation and use would support local growth and reduce transmission and distribution losses, and lost electricity. Local growth and development plans should provide valuable information to distribution networks.

Furthermore, anticipatory investment in distribution networks must be enabled to support decarbonisation of industry. At present, regulation does not sufficiently encourage DNOs to invest strategically in network capacity ahead of need. Our analysis shows that the rapid increase in demand from different sectors cannot be met without additional capacity beyond 2030. The accessibility and ease of the connection process and the information available for businesses should also be improved.

---

<sup>18</sup> Aldersgate Group and UK Energy Research Council (2025), [Electrifying industry and distribution networks: considerations for policymakers](#)

**10. Is there sufficient focus on connecting sources of demand, such as businesses, to energy networks, as well as connecting new sources of energy supply? How can the needs of potential consumers of energy be balanced with the need to ensure adequate supply?**

Businesses, including heavy industry, must be better supported in electrifying their operations and heating. This includes bringing on more sources of renewable energy, which would help drive down the relatively higher cost of UK electricity.

The electrification of industry could deliver more than 40% of the greenhouse gas emissions reductions needed by industry to help reach the UK's net zero target. With the UK's 2030 Clean Power mission, the UK will have a major competitive advantage for providing industry with clean electricity. A clean power system will also help insulate industry from energy price shocks linked to gas prices and increase energy security. To capture this opportunity, policy is needed to tackle high electricity costs and encourage investment.

Industrial businesses face challenges accessing the electricity grid due to constrained capacity and slow connection processes. The government must thoroughly assess the pattern of future industrial electricity demand to inform distribution network strengthening and to enable anticipatory investment in networks.<sup>19</sup>

The National Infrastructure Commission has set out recommendations to create capacity for the future in electricity distribution networks.<sup>20</sup> These include improving the connections process and customer service, as well as speeding up the delivery of distribution infrastructure.

**11. Does the current number of regulators and bodies involved in managing, overseeing and operating energy networks make it difficult to deliver at the necessary pace? How can these bodies work together efficiently, and with the Government, to deliver network infrastructure?**

The UK has set high ambitions for tackling climate change and restoring the natural environment. The coming years provide an opportunity to achieve these ambitions while also growing the economy, creating jobs and increasing investment. Well-designed, implemented and enforced regulation can be a powerful policy tool to accelerate emissions reductions, and protect and restore nature, while also driving economic growth. We found that businesses are supportive and encourage regulation that they trust will be clearly defined and executed, which provides a level playing field that incentivises innovation and best practice.<sup>21</sup>

Effective coordination between the different bodies in the energy system will be crucial to success. The government should ensure that roles and responsibilities are clear, including following the creation of the new National Energy System Operator (NESO), and collaboration is incentivised across the system.

**12. Is there sufficient coordination between Government policy and the regulatory processes and frameworks for energy networks? Should the Government provide greater strategic guidance to the sector on how to drive growth and grid**

---

<sup>19</sup> Ahmed Gailani, Peter Taylor (2024) [Assessing Electricity Network Capacity Requirements for Industrial Decarbonisation in Great Britain](#).

<sup>20</sup> National Infrastructure Commission (2025), [Electricity Distribution Networks](#).

<sup>21</sup> Aldersgate Group, Frontier Economics (2024), [The Role of Regulation in Restoring Nature and Delivering Net Zero](#)

## **expansion, for instance by providing greater clarity on trade-offs through its Strategy and Policy Statement for energy policy?**

Our work on the planning system highlighted a lack of strategic planning and policy as a key challenge impeding progress towards a clean energy system. Taking a more holistic approach to infrastructure development would help increase efficiency and certainty. This requires effective coordination and collaboration between the government, regulators, local authorities and other relevant bodies.

Greater policy clarity is also welcome. Uncertainty on how to best navigate trade-offs is viewed by stakeholders in the planning system as contributing to delays. In the NSIP system, managing trade-offs is recognised as complex, and in some cases, policy is not viewed as sufficiently clear to support decision-making. Design choices have different location-specific implications for environmental, landscape or community impact, as well as cost. Regulation and land leases can also shape design choices and introduce limitations.

The government and NESO must urgently deliver the SSEP, Centralised Strategic Network Plan and RESP, setting out both interim measures and a longer-term plan which ensures the incorporation of strategic planning into decision-making and alignment with other spatial planning, including the LUF, marine plans and local plans. Particular challenges to resolve include the lack of coordination and, in some cases, avoidable clustering of projects in one area, which contribute to cumulative impacts. The Strategic Environmental Assessment for the SSEP must genuinely inform decision-making to front-load the consideration of nature and landscapes. Alongside strategic spatial planning, the government should act on the Energy System Commissioner's recommendation and formulate the Electricity Transmission Design Principles, with the engagement of key stakeholders. The National Policy Statements have a crucial role in bringing these spatial policies together, giving them weight to effectively inform decisions and clarify policy on how to manage trade-offs where necessary.

A more strategic approach is necessary to accelerate progress and deliver better outcomes. However, strategic planning has not been enacted in England for some time. It will be important to learn from existing initiatives in the UK and internationally. Lessons can be learnt from The Crown Estate's whole of seabed approach and route map for offshore planning.

Another present challenge will be the ever-growing demand for skills and supply chains as the energy industry accelerates its growth. In some locations, this will pose great opportunities for transitioning skills and expertise across from the existing fossil fuel industry and wider opportunities for communities hosting new infrastructure – new jobs in the development, operation, and maintenance of new renewable energy and grid infrastructure. A more strategic approach across government must include coordination with the Office for Clean Energy Skills, Skills England, the Department for Education and devolved authorities to ensure training pathways are available.

Skills shortages also extend to ecology and planning skills, which were highlighted as particular areas of concern across interviews with energy developers, local authorities and environmental NGOs.