



The
Wildlife
Trusts

A Vision for Energy

What does good offshore wind and
a nimble grid look like?



Introduction

From increased wildfires and flooding, to record ocean temperatures, the events we have seen in the past year have made it clearer than ever the threat the climate crisis poses to our wildlife, our health, our homes and our communities. The UK needs to make the transition to a low carbon economy, and quickly.

This will not be an easy feat. In order to reach the UK's legal net zero target by 2050, it has been estimated that we need to build more than one wind turbine every day for the next decade¹. We will also need to radically transform the way we distribute energy via the UK grid, moving from fossil fuels to a predominantly electricity-based system.

But we are currently in a biodiversity crisis – the UK is one of the most nature-depleted countries in the world with nearly 1 in 6 species (16.1%) now threatened with extinction². Action to tackle climate change and nature's recovery must be one of the top priorities and any future energy system must work in harmony with nature. The consequences of ignoring these issues are not just problems of the future, they are challenges that are being felt by communities right now.

Our vision

The Wildlife Trusts vision is for offshore wind and grid infrastructure to be delivered in tandem with nature's recovery.

Our solutions to deliver this vision will increase speed of delivery of both offshore wind and grid infrastructure projects whilst reducing both consenting and environmental risk. The UK will be seen as a world leader in delivering innovative and cost-effective solutions to address the energy, climate, and nature crises together.

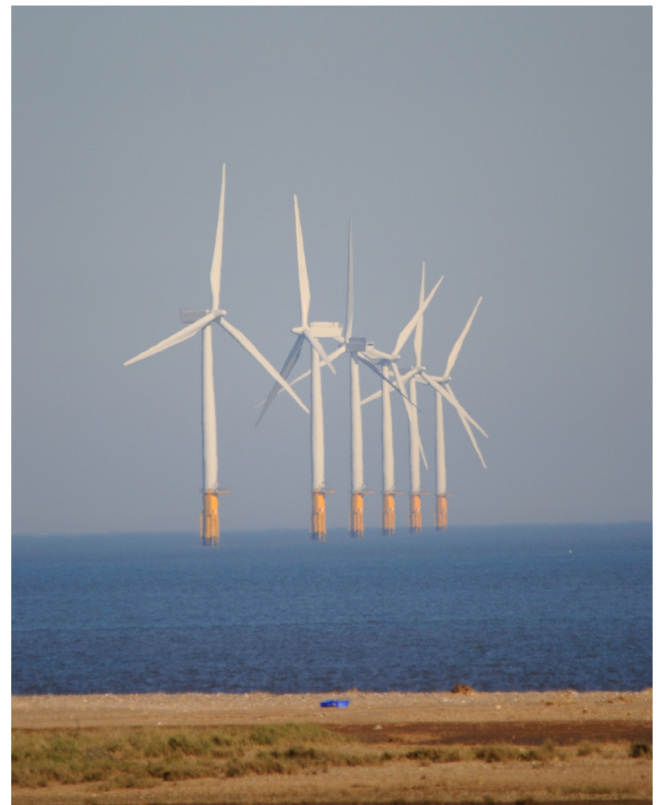
The Wildlife Trusts Solutions for Sustainable Energy

Despite the challenge, the pursuit of net zero provides the UK with the chance to become a world leader in sustainable energy, with a local energy network that is both more equitable and more secure from global shocks and conflict. Addressing the current barriers to reaching net zero would also:

- Allow local communities to have more agency over the energy they use.
- Promote nature's recovery both on land and at sea, so that we can leave a positive environmental legacy for our children and adapt to the impacts of climate change.
- Create high quality jobs in former industrial and coastal communities that have traditionally missed out on investment, including the development of a sustainable UK supply chain.
- Reduce energy bills over the long term, helping to address the cost-of-living crisis.

In order to fulfil this vision of delivering a sustainable world-leading energy system at pace, The Wildlife Trusts recommend 6 solutions to tackle the real barriers to achieving net zero.

These solutions will help set the UK up to be a world leader in sustainable development of energy infrastructure, cutting energy bills whilst supporting the recovery of our precious environment.



OFFSHORE WIND FARM © AMYLEWIS

¹ <https://oeuk.org.uk/product/economic-report-2023/>

² State of Nature 2023 – report on the UK's current biodiversity.

1. Production of an overarching prioritised marine spatial plan with nature at its heart which will guide development at sea, reducing conflict and competition for space

Challenge: Sea users are in constant conflict due to a lack of clarity around priorities or around how different plans interact. This causes poor siting decisions, increases expense and risks delaying net-zero targets.

Solution: Offshore wind, grid and other users of the sea need to be strategically planned and prioritised under one overarching plan that has nature recovery at its heart. It is critical that all spatial plans are aligned and speak to one another, with prioritised investment, to ensure a holistic approach that reduces costs and delays.

2. Implement 'quick wins' within the planning system that don't require lengthy reform

Challenge: Constant planning reforms, whilst well-intentioned, usually increase uncertainty for industry and investors, leading to unnecessary costs and risky delays.

Solution: There are many simple improvements to the planning system that can be done straight away to dramatically improve delivery without spending yet more time on scrapping existing systems. These include:

- The requirement to address environmental issues and solutions at the earliest stage of the planning process, preventing delay in later stages. Early engagement with stakeholders is critical to identify and find solutions to address key concerns.
- All offshore wind farm applications must be complete at the point of entry, including all needed plans for construction, monitoring and if required, compensation.
- The Planning Inspectorate should play an important role through independent facilitation to progress difficult issues at the early stages of project development. To implement this, new powers and guidance are required.

3. Improve efficiency through local energy generation and energy efficiency measures to ensure a reliable, secure and affordable energy supply for the UK

Challenge: While policy has historically been focused on energy supply, managing energy demand will be crucial for the sustainability of our future energy system. Vital opportunities have been missed to improve energy efficiency; there has been no significant change in the number of low-income households living in a household with an Energy Performance Certificate Level of D or below since 2019³.

Solution: The greenest energy is the energy we are not wasting. The simplest, most cost-effective route to reducing our reliance on global gas markets and increase energy security, would be to embark upon a nationally funded locally led programme to insulate every home in the UK, lifting millions of people out of fuel poverty. A new programme for home insulation must also include:

- A minimum standard of energy efficiency for homes being sold or rented
- Funding for low-income households
- Technical and practical support for those improving their home's efficiency
- A bold government-backed communication campaign to get public buy-in
- Loans and other financial provisions for homeowners and landlords to make improvements, as recommended by the Green Finance Institute.

Policies supporting community energy generation should be adopted, unlocking the power for local energy markets to support communities to build onshore wind and solar. By empowering communities to generate their own energy, we can help local people transition to cheaper, climate-friendly power, whilst also increasing energy efficiency – as energy which is generated close to where it is used means less is lost in transit.



4. Invest in new jobs that create a UK supply chain for energy infrastructure and technology that reduces environmental impacts

Challenge: There are growing fears that offshore wind could become a victim of its own success by outpacing growth in installation vessels, research/survey vessels and critical environmental mitigation technology. Offshore wind industry commentators have warned that global vessel demand will outstrip supply as soon as 2024⁴. This could see offshore construction grinding to a halt whilst developers fight over technology, increasing delays and costs of delivery, and ultimately increasing costs for the UK energy consumer.

Solution: We need to invest now in the installation infrastructure required to deliver our future energy system, addressing the current limitations of the UK supply chain. This onshoring of jobs and industry includes tackling the shortage of environmental mitigation technology and data on the state of our most vulnerable and beloved species and habitats. We need to grow the UK supply chain for mitigation technology which could place us as the world leader in nature-friendly technology of the future.

5. Incentivise innovation across the UK offshore wind and grid industry to drive nature friendly installation, faster delivery and reduced costs

Challenge: There is currently a lack of incentive to create innovative and original solutions to offshore wind and the electricity grid, including an absence of out of the box solutions to minimise environmental impacts. Whilst the competitive nature of the offshore wind industry has been successful in reducing costs, reticence over collecting and sharing data has held the industry back, making it difficult to learn lessons across projects.

Solution: We must incentivise UK innovation, ensuring that the necessary investment and policy drivers are in place. This will create UK technical jobs and a home-

grown R&D industry sensitive to nature's recovery. Innovation must take place across all levels from engineers working on the infrastructure design and installation methods, to the tendering stage.

To deliver grid projects at sea, The Wildlife Trusts has been promoting marine energy cable corridors that would double as nature recovery highways, where cables are surface laid and protected through an anchoring and fishing exclusion zone. Cable corridors would both minimise the demand for compensation, due the reduced need for protection when cables cannot be buried and allow the seabed to recover from past trawling activity.

6. Deliver a positive legacy of nature recovery, net-zero and just transition for fisheries

Challenge: Development and nature recovery are needlessly perceived to be incompatible. Current evidence already shows that under this competitive approach we have seen decline in many of our marine protected areas (MPAs) in the North Sea due to human activities and development⁵.

Solution: As the past few years have shown, building in less environmentally sensitive areas is cheaper and quicker, due to not needing expensive, and likely ineffective, environmental compensation for the next 30 years. There needs to be a stronger presumption against development of infrastructure projects in MPAs.

Biodiversity Net Gain must become mandatory for marine developments and Nationally Significant Infrastructure Projects as soon as possible to leave a positive biodiversity legacy for future societal health and protection against the intensifying impacts of climate change.

We must reduce impacts of damaging activities on the seabed such as trawling which will allow space for nature to recover alongside space for energy infrastructure. A just transition for the fishing industry must be developed to ensure future jobs in our changing seascape.

4 <https://www.rechargenews.com/wind/shortage-of-turbine-installation-vessels-will-soon-restrict-global-offshore-wind-build-out/2-1-860374>

5 Natural England's pilot Conservation Advice for Inner Dowsing, Race Bank and North Ridge SAC.

The Wildlife Trusts are a federated movement of 46 charities, supported by a central charity, the Royal Society of Wildlife Trusts. Together we have more than 900,000 members, 35,000 volunteers and 3,000 staff across the UK. We share a vision of nature in recovery, with abundant, diverse wildlife and natural processes creating wilder landscapes where people and nature thrive.



Wildlife Trusts care for – and have restored – some of the most special places for wildlife in the UK. Collectively we manage more than 2,300 nature reserves, operate 123 visitor and education centres and own 29 working farms. We undertake research, we stand up for wildlife and wild places under threat, and we help people access nature.

We work with businesses who are committed to being nature positive and take action to help restore 30% of land and seas for nature by 2030.

The Wildlife Trusts

 enquiry@wildlifetrusts.org

 wildlifetrusts.org

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