

Industrial Strategy Team  
Department of Business, Energy & Industrial Strategy  
1 Victoria Street  
London SW1H 0ET

19 April 2017

Dear Sir/Madam

## Response to Industrial Strategy Green Paper

Scottish Renewables welcomes the inclusion in the Industrial Strategy Green Paper of delivery of affordable energy and clean growth as central pillars, and we support its overall objective of improving living standards and economic growth by increasing productivity across the whole country.

We recognise and support the challenges the Green Paper sets out for the energy sector:

- To ensure the shift to a low-carbon economy is done in a way that minimises the cost to UK businesses, taxpayers and consumers
- For the Government – working with the energy industries and regulators – to manage the changes to energy networks required in the transition to a low-carbon economy
- To make sure that the UK capitalises on its strengths in the energy industries to win a substantial share of global markets

Technological advances and rapid cost reductions are demonstrating that a modern, low-carbon energy system offers increasing potential to improve the competitiveness of our economy while delivering investment and employment across the UK. Scotland's towns, cities, islands and rural areas are at the heart of much of this activity<sup>1</sup>.

Scottish Renewables is the representative body of Scotland's renewable energy industry, and this response has been informed by our membership<sup>2</sup> of 270 organisations. The firms we represent are involved in the research, development, generation, supply, storage and use of renewable heat, power and transport from across the full range of renewable energy technologies.

Our membership demonstrates the depth and breadth of Scotland's renewable energy sector, from technology developers, manufacturers, fabricators and installers to project developers and advisers, construction and civil engineering firms, operations and maintenance service providers, asset owners, operators and investors. These businesses range from small, family-owned firms, community organisations and university spin-offs to international utilities and original equipment manufacturers (OEMs).

<sup>1</sup> See Annex - Industrial Impact: The Power of Scotland's Renewables Sector [www.scottishrenewables.com/publications/](http://www.scottishrenewables.com/publications/)

<sup>2</sup> <https://www.scottishrenewables.com/directory/members/>

## **Driving clean growth across the whole country and cultivating world-leading sectors**

Scotland continues to be the UK's renewable powerhouse, generating a quarter of its green electricity despite having less than 10% of its population. Hosting a quarter of Europe's wind and tidal resource and 10% of the continent's wave energy<sup>3</sup> – a vast resource that can help reduce the UK's exposure to volatile global markets – Scotland has a self-evident competitive advantage in the global clean energy market. Couple this resource with our top-class universities, industrial heritage and global oil and gas prowess and it's clear that Scotland is ideally placed to cultivate and build on the many world-leading aspects of our renewable energy industry.

Scotland's renewable energy capacity made up approximately 24%<sup>4</sup> of total UK renewable power generation in 2016, and renewables now produce more electricity in Scotland (around 53%<sup>5</sup>) than any other source. Building on this success, we believe Scotland can meet 50% of its whole energy demand – for heat, power and transport – by 2030; an ambition that has cross-party support<sup>6</sup> in the Scottish Parliament and is now included in the Scottish Government's draft Energy Strategy<sup>7</sup>. Decarbonisation at this scale will be necessary to meet Scottish and UK emission reduction targets and, with the right backing from government at all levels, could deliver enormous economic benefit to communities and businesses across Scotland and throughout the UK supply chain.

The renewable and low-carbon energy sectors supported 58,500 jobs (direct and indirect) in Scotland in 2015 with a turnover of £5.5bn, according to the latest ONS figures. Across the UK the renewables sector alone generated £14.9bn in turnover in 2015<sup>8</sup>. Our industry employs people across Scotland, from Orkney, Shetland and the Isle of Lewis to Dumfriesshire and the Mull of Kintyre, as well as important hubs of employment in Glasgow, Edinburgh and Aberdeen. Backing the growth of the renewable energy sector can therefore help ensure that every place meets its potential by closing the gap between the best performing places and those which have historically been less productive.

The attached Annex to this response outlines a snapshot of case studies which illustrate the spread of industrial activity located across the length and breadth of Scotland. These businesses are working hard to capitalise on our country's strengths in the energy industries and are already winning a share of global markets, with potential for this to grow substantially. Recent research by Scottish Renewables<sup>9</sup> showed renewable energy businesses based in Scotland are actively exporting their skills, services and solutions around the globe. Respondents to our survey have been involved in projects worth £125m in 43 countries in every continent bar Antarctica, and employ staff in 22 of those countries.

## **Delivering affordable, clean energy**

Global renewable energy technology costs across the industry are falling rapidly, so we welcome the commitment in the Green Paper to “set out in 2017 a long-term road map to minimise business energy costs” and “commission a review of the opportunities to reduce the cost of achieving our decarbonisation goals in the power and industrial sectors”. We also recognise the drive to “move towards a position in which energy is supplied by competitive markets without the requirement for ongoing subsidy”.

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<sup>3</sup> <http://www.gov.scot/Publications/2011/08/04110353/3>

<sup>4</sup> <https://www.gov.uk/government/statistics/energy-trends-section-6-renewables>

<sup>5</sup> <http://www.gov.scot/Resource/0051/00516517.pdf>

<sup>6</sup> <http://www.parliament.scot/parliamentarybusiness/report.aspx?r=10747&i=98595#ScotParlOR>

<sup>7</sup> <http://www.gov.scot/Publications/2017/01/3414>

<sup>8</sup> <https://www.ons.gov.uk/economy/environmentalaccounts/bulletins/finalestimates/2015results>

<sup>9</sup> <https://www.scottishrenewables.com/news/global-reach-scot-renewables-revealed/>

The most established renewables, like onshore wind and solar PV, are now among the lowest-cost forms of new power generation, as evidenced in UK Government research<sup>10</sup>, and less-established technologies like offshore wind are cutting costs fast to become increasingly competitive.

It's now clear that onshore wind is cheaper than any other clean source of new power, and could be making a vital contribution to delivering the lowest cost energy ambitions of the Industrial Strategy. A new report<sup>11</sup> from independent analysts Baringa Partners shows that the most competitive projects could now be built without the need for any subsidy. If allowed to compete in auctions to win contracts to generate electricity, these projects would provide a net financial benefit to consumers and prove that onshore wind offers best value to bill payers. The report highlights the falling costs of onshore wind and solar PV internationally as a result of innovation, decreasing turbine prices and the use of auctions to ensure competition.

### **Scottish Renewables' recommendations**

To maximise the value of these technological advances to the UK economy and realise the vision of an energy sector in which smart management, innovation and competition deliver growth, consumer savings and clean power, we believe the Industrial Strategy should:

- Provide a robust assessment of our future energy needs and a plan to meet them. This plan must be consistent with our carbon objectives and should offer clear, long-term investment signals, particularly to domestic supply chain companies. It should take a 'whole system' approach and be closely coordinated with the ambitions set out in the draft Scottish Energy Strategy, which has been informed and shaped by Scotland's energy industries.
- Ensure that the energy market is competitive and can deliver low-cost, clean energy supplies to replace retiring capacity and upgrade our infrastructure to meet future demand from the increased electrification of heat and transport systems and production of alternative fuels (e.g. hydrogen). In order to achieve this, the UK Government should:
  - Based on cost reductions among established technologies, run a new Pot 1 CfD auction for established renewable technologies in 2018/19, which could deliver around 1GW of capacity at no extra cost to consumers above the wholesale market price for power – and could even pay back more to the public purse
  - Maintain the announced budget of £730m in this Parliament for Pot 2 CfD auctions and, based on recent accelerated cost reduction<sup>12</sup> in the sector, commit to a greater role for offshore wind in power sector decarbonisation from the mid-2020s
  - Continue investment to decarbonise heat supply to homes and businesses, currently supported through the Renewable Heat Incentive, beyond 2020/21 in order to stabilise energy bills and bring costs down in the longer term. This is particularly important for off-gas grid properties in rural areas where energy bills are especially high
  - Commit to supporting homes, businesses and communities to take control of their own energy supplies beyond 2018/19 following the planned closure of the Feed-in Tariff scheme for small-scale renewables, reducing exposure to energy imports with volatile prices
- Ensure the lowest cost energy is delivered to businesses, factories and households by opening up markets for smart technology to develop the most efficient and cost-effective power network.

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<sup>10</sup>

[https://www.gov.uk/government/uploads/system/uploads/attachment\\_data/file/566567/BEIS\\_Electricity\\_Generation\\_Cost\\_Report.pdf](https://www.gov.uk/government/uploads/system/uploads/attachment_data/file/566567/BEIS_Electricity_Generation_Cost_Report.pdf)

<sup>11</sup> <https://www.scottishrenewables.com/news/most-competitive-onshore-wind-projects-baringa/>

<sup>12</sup> <https://ore.catapult.org.uk/our-knowledge-areas/knowledge-standards/knowledge-standards-projects/cost-reduction-monitoring-framework/>

- Progress regulatory and market reform to encourage energy storage, including defining how storage should be treated. As with interconnection, this should include a ‘cap and floor’ mechanism for large-scale, high capex technologies like pumped storage hydro.
- Invest in science, research and innovation in Scotland, and across the UK, so that new and emerging technologies (such as floating wind, tidal, wave and low-carbon heat solutions) continue to move down the cost curve and into commercial competitiveness.

Scottish Renewables and our members are committed to working constructively with the UK Government, in coordination with the Scottish Government and local authorities, on these priorities to develop a modern, clean energy system at lowest cost to Britain’s businesses, industry and households.

We would also draw your attention to the responses to the Green Paper from RenewableUK<sup>13</sup>, CBI<sup>14</sup> and other industry trade bodies<sup>15</sup> representing renewable energy businesses for further detail on many of the points raised in our response.

The Industrial Strategy Green Paper seeks to identify areas of British excellence, drive regional productivity, enable technology innovation (rather than supporting incumbents) and deliver value-for-money against investment. It is increasingly clear that Scotland’s vibrant, ambitious renewable energy sector can deliver all these, and more.

Yours sincerely

Jenny Hogan  
**Director of Policy**

**N.B.**

Please note Annex attached separately to this response:

**Industrial Impact - The Power of Scotland’s Renewables Sector**

Document available online from 20 April 2017 at:

[www.scottishrenewables.com/publications](http://www.scottishrenewables.com/publications)

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<sup>13</sup> <http://www.renewableuk.com/news/340926/RenewableUK-Consultation-Response---Building-Our-Industrial-Strategy.htm>

<sup>14</sup> <http://www.cbi.org.uk/news/uk2030-make-uk-most-competitive-economy-in-the-world/>

<sup>15</sup> <http://www.renewableuk.com/news/340928/Joint-Letter-to-Business-Secretary-Greg-Clark-MP-on-the-Industrial-Strategy.htm>

