

# Make UK and UK Steel Submission to House of Lords EU Energy and Environment Sub-Committee Enquiry on Energy Security



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## ENQUIRY RESPONSE

### 1. What are the implications of the UK's withdrawal from the EU for the UK's energy security?

For manufacturers, the priority is achieving access to secure energy supplies at internationally competitive prices, particularly for those businesses most exposed to international competition. The key security of supply issues that need to be considered are:

- interconnection with European neighbours and the commercial, policy and regulatory arrangements to support efficient cross-border trading of energy (gas and electricity);
- the future relationship of the UK with the Internal Energy Market, and whether it maintains tariff-free access and access to/relationship with relevant authorities and regional markets that support cross-border trading;
- the uncertainty for investors created by Brexit around the UK's future goals and regulatory environment, such as the UK's future approach to carbon pricing and participation in the EU Emissions Trading Scheme; and
- the ability of the UK to develop or influence the rules for cross-border energy trading, and its impacts on energy security and costs for business.

Although the price of electricity is not directly a security of supply concern, withdrawal from the EU and the issues outlined above present a risk for businesses should they result in industrial consumers paying a higher cost to achieve the current (or any given) level of security of supply. Where such risks would become evident would be through, for example, higher risk premiums faced by businesses due to the threat of disruption in supply caused by uncertainty in the terms of the UK's withdrawal, limitations to efficient trade across borders, or the UK's access lower cost energy.

The UK has increased its energy dependency since 2003/4, and in 2014 almost half of UK energy supply was made up of net imports<sup>1</sup>. Given that electricity capacity margins have decreased from a peak of 44% in 2013/14 to 29% in 2016, the lowest since 2009/10<sup>2</sup>, and concerns about gas storage and declining domestic gas reserves in the North Sea<sup>3</sup>, it is

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<sup>1</sup> Office for National Statistics, UK energy, how much, what type and where from?, 15 August 2016 <http://visual.ons.gov.uk/uk-energy-how-much-what-type-and-where-from/>

<sup>2</sup> Department for Business, Energy & Industrial Strategy, UK Energy in Brief 2017, July 2017 <https://www.gov.uk/government/statistics/uk-energy-in-brief-2017>

<sup>3</sup> Financial Times, Centrica to close UK's largest gas storage site: Shutdown set to leave Britain more dependent on imports and exposed to price shocks, June 2017 <https://www.ft.com/content/68fa2c3e-55ad-11e7-80b6-9bfa4c1f83d2>

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important that regardless of EU withdrawal, the UK has access to a secure, diversified energy mix to maintain supplies. It also needs a pipeline of investments to deliver new energy capacity.

## Maintaining Cooperation

Minimising potential energy supply disruptions and having clear procedures in place in case of possible interruptions will be of the highest priority. This is particularly the case for those industries that run uninterruptable processes, such as the steel sector, which could otherwise face substantial damage (such as to product and equipment) if energy supplies are disrupted unexpectedly. This means that cooperation must be maintained with the countries that the UK is interconnected with, particularly through the Transmission System Operators (e.g. National Grid) and regulators (Ofgem, neighbouring energy regulators, and the Agency for the Cooperation of Energy Regulators). These issues, and how the EU more generally cooperates with non-EU Countries, are currently being debated by EU Member States in discussions about the EU's Clean Energy Package.

## Addressing Investor Uncertainty

Withdrawing from the EU also raises questions about how the UK will address and balance the 'energy trilemma' of decarbonisation, security of supply and affordability.

The decarbonisation agenda and the need to replace a significant amount of UK energy generation as plant is retired or phased out requires significant investment in the energy sector and associated infrastructure, with a current pipeline of energy-related projects estimated to be in the region of £116 billion to 2021.<sup>4</sup>

Exit from the EU may impact these and other potential future investments, and ultimately security of supply and cost to consumers, through the investor uncertainty it could create. Given that a number of policy tools from the EU are factored into decision making, the UK will need to set out its approach to policy and regulatory frameworks, and support mechanisms, to deliver new energy infrastructure. As an example, according to the Energy Institute, EU funds and European Investment Bank loans account for around £2.5bn per year of the UK's energy-related infrastructure, climate change mitigation and R&D funding.<sup>5</sup> The UK would need to consider how it replaces or replicates this type of funding to support investments.

The themes set out in the Industrial Strategy (IS) green paper from early 2017 become all the more significant given that the policy tools and support mechanisms derived from the EU may not be applicable in the future. The focus on

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<sup>4</sup> £79 billion by 2021 in energy, of which electricity generation accounts for around half of the investment, and a further £37 billion for electricity and gas networks. (Infrastructure and Projects Authority, National Infrastructure and Construction Pipeline Autumn 2016 Update, <https://www.gov.uk/government/publications/national-infrastructure-and-construction-pipeline-2016>)

<sup>5</sup> theENDSreport, Ministers must act to attract energy investment, 11 August 2017 <http://www.endsreport.com/article/57086/ministers-must-act-to-attract-energy-investment>

'affordable energy and clean growth' in the green paper must continue to be a priority as the IS develops, and metrics developed to monitor its delivery.

### **Maintaining Cross-Border Trade**

Maintaining a diverse energy mix, including gas and electricity interconnections with the continent, will be key to ensuring the energy resilience of the UK. Some of the biggest questions in this will be whether the UK continues to have access to the Internal Energy Market (IEM), tariff-free trade, and whether and how changes to access will affect construction of new interconnectors, and the effectiveness of existing interconnectors.

Access to interconnection will also impact affordability as the UK's interconnectors allow us to access lower cost supplies. In a 2016 study for the National Infrastructure Commission<sup>6</sup>, it was highlighted that there is a strong consensus on the socio-economic welfare value of interconnectors, including in lowering the cost of meeting demand and improving security of supply. This is important for industrial firms, as the UK has amongst the highest industrial electricity prices in the EU and internationally. For example, a recent study for the Belgian regulator highlighted that UK industrial electricity prices have been the highest for the past two years when compared to Belgium, Holland, Germany and France<sup>7</sup>. Should tariffs be imposed post-Brexit, this would result in a lower benefit to UK consumers, impacting the cost of achieving an equivalent level of security of supply.

## **2. Could, or should, the UK stay in the Internal Energy Market (IEM) post-Brexit? If not, what should be the priorities for continued co-operation with the EU?**

It is clear that there are pros and cons to maintaining our close links to the EU energy market, and the adherence with EU rules that it may require.

The IEM has allowed the liberalised energy market to be developed across European borders, delivering increased competition to try and reduce bills, and is an area that the UK has been a key driver for in the EU. The significant harmonisation to facilitate ease of energy flows across borders through the Third Energy Package (2009) has also

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<sup>6</sup> A Pöyry report to the National Infrastructure Commission, Costs and Benefits of GB Interconnection, February 2016 [https://www.gov.uk/government/uploads/system/uploads/attachment\\_data/file/505222/080\\_Poyry\\_CostsAndBenefitsOfGBInterconnection\\_v500.pdf](https://www.gov.uk/government/uploads/system/uploads/attachment_data/file/505222/080_Poyry_CostsAndBenefitsOfGBInterconnection_v500.pdf)

<sup>7</sup> PWC for CREG, A European comparison of electricity and gas prices for large industrial consumers, Final Report, 2017 Update, 29 March 2017 [http://www.creg.be/sites/default/files/assets/Publications/Studies/2017-PwC\\_Report\\_A\\_European\\_comparison\\_of\\_electricity\\_and\\_gas\\_for\\_large\\_industrial\\_consumers\\_0.pdf](http://www.creg.be/sites/default/files/assets/Publications/Studies/2017-PwC_Report_A_European_comparison_of_electricity_and_gas_for_large_industrial_consumers_0.pdf)

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published in December 2015, it is estimated that losing access to the IEM could cost UK energy consumers up to £500 million a year by the early 2020s<sup>8,9</sup>

However, there have also been drawbacks to full adherence with EU energy rules, such as the imposition of renewable energy and energy efficiency targets that leave Member States with less flexibility to choose how to decarbonise, and may not necessarily have helped to deliver the least cost path to decarbonising the power sector in the UK. Future EU rules should ideally not limit the UK's abilities to choose its future energy mix and energy resources.

Remaining in the IEM without due UK representation to ensure that future rules are developed in the most appropriate way for the UK, especially given the UK's unique position as a Direct Current (DC)-connected island, would also be a concern. If we are to remain in the IEM, the UK must have a route to influence and inform the future rules that govern it.

## Tariff-Free Access and Duty to Consult

Ultimately, both security of supply and affordability will be subject to the ease and cost-effectiveness of trading with EU counterparts, whether through the IEM or not. Tariff-free access to the European energy market and minimising non-tariff barriers<sup>10</sup> to cross-border trading (to make trading across the UK's interconnectors as simple as possible), therefore need to be prioritised for continued cooperation with the EU should the UK not remain within the IEM. In this case, there should be, at a minimum, a duty to consult the UK on issues of EU energy policy and regulation that could impact UK consumers.

## Transition/Implementation Period

It is also worth considering the changes to the UK arrangements currently in progress to improve harmonisation and cooperation of cross-border energy trading through the implementation of the Third Energy Package. For example, the UK is on track to implement initiatives under the Third Energy Package that require investment in areas such as new trading platforms and improved regional cooperation. This would be a wasted investment should the UK not participate in the IEM post-Brexit and instead revert to current trading forms. This approach needs to be considered further to ensure cost-effectiveness of current implementation of EU law, now and over the transition period. There is clearly a

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<sup>8</sup> National Grid written evidence to Energy and Climate Change Committee, Leaving the EU: implications for UK energy policy enquiry, September 2016 (<http://data.parliament.uk/writtenevidence/committeeevidence.svc/evidencedocument/energy-and-climate-change-committee/leaving-the-eu-implications-for-uk-energy-policy/written/39921.pdf>)

<sup>9</sup> Vivid Economics, The impact of Brexit on the UK energy sector, November 2015 and March 2016 <http://www.vivideconomics.com/publications/the-impact-of-brexit-on-the-uk-energy-sector>

<sup>10</sup> Non-tariff barriers could include the regulatory requirements set out in EU Energy Packages, such as the harmonisation of capacity trading on interconnectors

need to avoid this type of cliff-edge, and appropriate participation in the IEM over any transitional or implementation period must be a priority, as EEF has set out for the wider Single Market and Customs Union.

### **3. What will be the effect of Brexit on UK-EU energy interconnection?**

Electricity interconnectors are expected to increase dramatically in the coming years, from the four interconnectors providing 4GW of capacity today, to a potential further nine connectors, delivering a total forecast UK interconnector capacity of 14GW by 2030<sup>11</sup>. However the effectiveness of interconnectors, which as discussed earlier allow greater access to lower cost energy supplies, may be adversely impacted under some possible future trading relationships with the EU. Uncertainty over this and other issues may impact how many of the projected interconnectors are actually built.

### **4. What are the implications of the UK's withdrawal from Euratom? Will it affect the UK's security of supply?**

Euratom currently governs nuclear security and safety in the civil nuclear industry, and a range of related issues including the movement of nuclear material, goods, professionals and services across the economy. This means it also affects sectors beyond power, such as medical applications, manufacturing, and treatment of landfill and waste.

The outcome on the UK's future relationship with Euratom and with international regulators must ensure the UK maintains a strong regulatory regime for the civil nuclear industry and access to the nuclear material needed for many civil applications. This could be through continued participation in Euratom or directly with the International Atomic Energy Agency through a negotiated form of arrangement. Not being able to participate in the international civil nuclear market would clearly impact the UK civil nuclear industry, which is why firm proposals must be developed as quickly as possible and, if necessary, a transition/implementation period agreed to provide more time.

### **What can the UK learn from other non-EU countries' experience of trading energy with the EU?**

There are three issues to consider in examining the experience of non-EU countries (i.e. 'Third Countries') trading energy with the EU and trying to draw lessons from them. The first is the strategy of the country to influence, and extent to which it harmonises with, EU rules. The second is the extent to which the country has efficient cross-border market trading (to deliver lower costs to end consumers). The third is the role of the country - as an energy producer, market or transit country - and to what extent Third Countries cooperate with the EU as a result of their role.

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<sup>11</sup> Baringa, Brexit: Impact on Interconnectors, Imposition of tariffs to reduce benefits to consumers, <https://www.baringa.com/industries/energy-water-and-commodities/energy-networks/>

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No Third Country is directly analogous to the UK<sup>12</sup>. However, various examples do show the pros and cons of different levels of integration.

Norway is a member of the IEM and European Economic Area, adheres with EU rules and cooperates with the IEM on security of supply (although not implementing all legislation, such as for security of supply). Norway also publishes a strategy<sup>13</sup> for energy cooperation with the EU to try and ensure a harmonised approach. The UK may wish to consider developing a similar strategy to set out its approach to cooperation with the EU in the future.

This still does not confer Norway with as strong an influence on the regulatory environment as the UK. For example, the UK currently co-chairs the Agency for the Cooperation of Energy Regulators (ACER), whereas Norway is an observer and doesn't have voting rights within the ACER Board.<sup>14</sup> Its influence has to be sought through less direct, and therefore less reliable, means.

Switzerland meanwhile does trade energy with the EU, and is a key transit country. However, it is not currently an IEM member, as it does not participate in full market coupling (a way to efficiently allocate cross-border grid capacity), and the regulatory systems are not fully harmonised. The net result is higher costs for consumers both sides of the Swiss borders than if efficient cross-border market trading took place. Although Switzerland has tried to implement market coupling<sup>15</sup> and better harmonisation with the EU, it has faced political issues with the EU in doing so, due to non-energy issues.

Where the UK differs from either of these examples is in the scale of the market it offers (as an export country for EU energy firms), its role as a transit country for electricity and gas, and the fact that it has already implemented EU legislation, including on Security of Supply (although it has not currently met the interconnector target of at least 10% of installed electricity production capacity by 2020). In theory, this should all give it greater weight in negotiations with the EU on the future relationship.

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<sup>12</sup> European Parliament, Directorate-General for Internal Policies, ITRE committee, Review of EU-Third Country Cooperation on Policies Falling within the ITRE Domain in Relation to Brexit, June 2017 [http://www.europarl.europa.eu/RegData/etudes/STUD/2017/602057/IPOL\\_STU\(2017\)602057\\_EN.pdf](http://www.europarl.europa.eu/RegData/etudes/STUD/2017/602057/IPOL_STU(2017)602057_EN.pdf)

<sup>13</sup> UTENRIKSDEPARTEMENTET, Norway in Europe, The Norwegian Government's Strategy for Cooperation with the EU, 2014 - 2017 [https://www.regjeringen.no/globalassets/upload/ud/vedlegg/europa/norway\\_in\\_europe.pdf](https://www.regjeringen.no/globalassets/upload/ud/vedlegg/europa/norway_in_europe.pdf)

<sup>14</sup> Agency for the Cooperation of Energy Regulators, Members of the Board of Regulators. [Accessed 24 August 2017] [http://www.acer.europa.eu/en/The\\_agency/Organisation/Board\\_of\\_Regulators/Pages/BoR-Members.aspx](http://www.acer.europa.eu/en/The_agency/Organisation/Board_of_Regulators/Pages/BoR-Members.aspx)

<sup>15</sup> SwissGrid, Market Coupling: Technical conditions for coupling have been created. [Accessed 23 August 2017]

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## **Make UK**

Make UK champions British manufacturing. We are a powerful voice at local, national and international level for small and medium sized businesses and corporates in the manufacturing and engineering sectors.

We're determined to create the most supportive environment for UK manufacturing growth and success, and we present the issues that are most important to our members, working hard to ensure UK Manufacturing remains in the government and media spotlight.

Together, we build a platform for the evolution of UK manufacturing.

## **UK STEEL**

UK Steel champions and celebrates the UK's steel manufacturers. We represent the sector's interests to government and champion our innovative, vibrant and dynamic industry to the public.

Together, we build the future of the UK steel industry