

Penalty notice

NOTICE OF DECISION TO IMPOSE A FINANCIAL PENALTY PURSUANT TO SECTION 27A(5) OF THE ELECTRICITY ACT 1989

Date: 25 JULY 2023

Decision of the Gas and Electricity Markets Authority to impose a financial penalty, following an investigation into SSE Generation Limited ("SSE") and its compliance with its obligations under the electricity generation licence (Standard Licence Condition 20A, known as the Transmission Constraint Licence Condition, or "TCLC").

1. SUMMARY

- 1.1 With this document, we the Authority¹ are giving notice under S27A(5) of the Electricity Act 1989 of our decision to impose a penalty on SSE, in relation to a breach of the TCLC. In it, we have set out the acts or omissions which constitute the relevant contraventions and the other facts which justify the imposition of a penalty on SSE and the amount of the penalty chosen.
- 1.2 Our investigation was opened in October 2021, and concerns the bid prices submitted by SSE in the Balancing Mechanism ("BM") for Foyers pumped storage power station ("Foyers"). It focused on a decision taken by SSE in May 2020 to make the price that it required the system operator to pay in order to reduce Foyers' output significantly more expensive so as to bring Foyers in line with what SSE believed was the market practice of other pumped storage operators and generate more profit. This included in periods of transmission constraint, where the system operator had limited options available other than bidding Foyers down.
- 1.3 Following our investigation, we have concluded that the bids submitted in accordance with the revised pricing policy resulted in SSE obtaining a profit which was significantly greater than that which it would have obtained absent the transmission constraint, and so was in breach of the TCLC.

¹ In this Notice we use interchangeably "the Authority", "Ofgem" and "we" to refer to the Gas and Electricity Markets Authority.

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- 1.4 SSE has admitted that it breached the TCLC, and indicated its desire to settle the investigation, in line with the process described in our enforcement guidelines.²
- 1.5 As set out in section 4 of this Notice, we consider that the imposition of a penalty for the contraventions is justified in this case. Among other reasons, this is because the breach caused damage to the interests of consumers, and a penalty is necessary to deliver credible deterrence and visible and meaningful consequences for breaching the TCLC.
- 1.6 In determining the amount of the penalty we have taken into consideration the factors set out in the relevant penalty statement, including the serious nature of the breach, the financial harm suffered by customers as a result of the contravention, and the existence of aggravating factors. We have also considered representations received in response to the notice of our proposal to impose a penalty on SSE. We consider the penalty to be reasonable in all of the circumstances of this case.
- 1.7 Having considered all of the circumstances, we consider that a payment into the consumer redress fund³ is of greater benefit to energy consumers than if a significant financial penalty were to be imposed. Accordingly, we consider it reasonable to impose a financial penalty of £1, provided SSE pays the sum of £9,780,000.00 (less £1) in redress.
- 1.8 In these circumstances and mindful of our principal objective to protect the interests of existing and future consumers, we hereby give notice under section 27A(5) of the Electricity Act 1989 of our decision to impose a penalty of £1 in respect of the contraventions set out above. This is subject to SSE paying £9,780,000.00 (less £1) into Ofgem's consumer redress fund. The payment of the amounts must be made by 5 September 2023.

² <https://www.ofgem.gov.uk/publications/enforcement-guidelines>

³ We have appointed an expert independent third party to manage the allocation of voluntary redress payments from licensees to charitable organisations.
<https://www.ofgem.gov.uk/publications-and-updates/authority-guidance-allocation-redress-funds>

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2 BACKGROUND

The Balancing Mechanism

- 2.1 The BM is the primary tool used by the Electricity System Operator (“ESO”) to co-ordinate and direct the flow of electricity onto and over the electricity transmission network. Over £2bn was spent by the ESO on balancing in the BM in the year to March 2023,⁴ with the costs eventually recovered from consumers via balancing charges.
- 2.2 In the BM, parties to the Balancing and Settlement Code – including all large electricity generators – submit one or more pairs of bids and offers. Bids represent the price at which the party would be willing to decrease its generation or increase its consumption of electricity for a given unit in a given half-hourly delivery period, while offers represent the price at which the party would be willing to increase its generation or decrease its consumption of electricity. Bid and offer prices are specified in £ per megawatt hour (£/MWh) of reduced or additional output or consumption that the ESO requires that a unit deliver (relative to the unit’s expected output or consumption prior to the action being taken).
- 2.3 A unit’s expected level of output or consumption in each half-hourly settlement period – prior to any actions taken in the BM – is indicated through parties’ submissions of Physical Notifications (“PNs”), made in accordance with the Grid Code. The prevailing PNs at the point which is one hour prior to delivery (referred to as gate closure) are confirmed by the ESO as Final Physical Notifications (“FPNs”), and used for the purposes of taking any required balancing actions in the BM. For each half-hourly settlement period, the ESO may accept various sets of bids and offers, making payments to (or receiving payments from) different parties in exchange for them agreeing to alter their generation or consumption as compared to their FPNs.

⁴ Source: ESO monthly balancing services summary, February 2023. The amount spent in the BM in the year to March 2021 (the period on which our investigation has centred) was over £1bn.

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The TCLC

- 2.4 The ESO uses the BM, amongst other balancing markets, to address any expected energy imbalances over the transmission system as well as to manage any transmission constraints which may arise on the network.
- 2.5 Transmission constraints as defined in the TCLC are any limits on the ability of the transmission system (or any part of it) to transmit power from where it is supplied to where it is needed, arising as a result of factors such as (but not limited to) the thermal rating of assets forming part of the transmission network, or the need to maintain voltage on the system, or the need to maintain the transient and dynamic stability of plant and equipment connected to the system.
- 2.6 Transmission constraints may occur because of design limitations of the transmission network or because of outage patterns, including the need to deal with credible failures of parts of the system or equipment connected to it and to ensure that they do not have serious consequences for safety or security and quality of supply. The ESO will often accept bids and offers in the BM to help resolve transmission constraints, and ensure that power flows across the transmission system remain within the necessary bounds to ensure the security and quality of supply and safe operation of the system.
- 2.7 The TCLC requires that generation licensees must not obtain or seek to obtain an excessive benefit from a reduction in electricity generation in relation to a transmission constraint period. In practice, this means that – where a transmission constraint as defined in the TCLC occurs, and where the generator intends to export power – generators must not submit bid prices in the BM at a level which would result in them obtaining an excessive benefit, were that bid subsequently accepted by the ESO.
- 2.8 The TCLC applies to reductions in electricity generation only. Therefore it would not apply in situations where a generator was not due to export any power to the NETS in a given settlement period (ie its FPN was zero) or was due to import power from the transmission system (ie its FPN had a negative value), as in those cases a bid in the BM to (further) import power would not constitute a "... reduction in generation".
- 2.9 The objective of the TCLC is to protect against the exploitation of market power by generators operating in the presence of transmission constraints. Transmission constraints routinely lead to either individual generators or groups of generators in

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particular areas holding a position of market power in one or more settlement periods, with the ESO having limited options to manage the constraint other than reaching an agreement with the owners of those specific units to reduce their planned output in those periods. If generators were free to take advantage of this market power in their agreements with the ESO, this would increase balancing costs (which are ultimately passed onto consumers) and create harmful incentives – encouraging further generation in those same areas or by generators with the same characteristics, exacerbating the constraints, and increasing system costs further.

Foyers pumped storage power station

- 2.10 Foyers is a pumped storage power station in Northern Scotland, operating under the generation licence of SSE Generation Limited (company number 02310571). It has two 150MW reversible pumping turbines, providing a total capacity of 300MW. In periods of high demand (and so high prices), water is released from the upper reservoir (Loch Mhor) and the units export power to the transmission system, generating revenue for SSE. The upper reservoir is then refilled either by rainfall, or by SSE paying (or being paid) to consume power in order to pump water to the upper reservoir.

Figure 1: **Image of Foyers pumped storage power station**



Source: [Foyers hydro scheme | SSE Renewables](#)

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2.11 One implication of the transmission constraints created by the thermal limits of the transmission system is to give rise to restrictions on the amount of power which can be transferred between different areas of the network, creating what are known as “constraint boundaries”, each with a particular transfer limit. Foyers is located behind a number of key thermal constraint boundaries between the North and South of Great Britain, including:

- The SHARN3 boundary (B7) in Northern England;
- The SCOTEX or ‘Cheviot’ boundary (B6) between Scotland and England;
- The SSE-GRMO and NKILGRMO boundaries (B5) between Central and Southern Scotland
- The SSE-SP2 boundary (B4) between the SSEN Transmission and SP transmission networks
- The SSEN-S North to South SSEN Transmission boundary (B2); and
- The SSENWEX boundary (B1a) in North West Scotland.

2.12 It is common for anticipated power flows as reflected in FPNs to exceed the transfer limits of the boundaries that Foyers is situated behind and for the ESO to therefore need to instruct SSE to reduce Foyers’ generation (or instruct it to pump) to ensure that the equipment carrying power from Northern Scotland to demand centres further south is not overloaded. This is particularly the case in periods of high wind generation in Scotland. Foyers was the generator in Great Britain with the 9th greatest number of

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system flagged bid acceptances in the year to March 2021, with a total volume of 219GWh.⁵

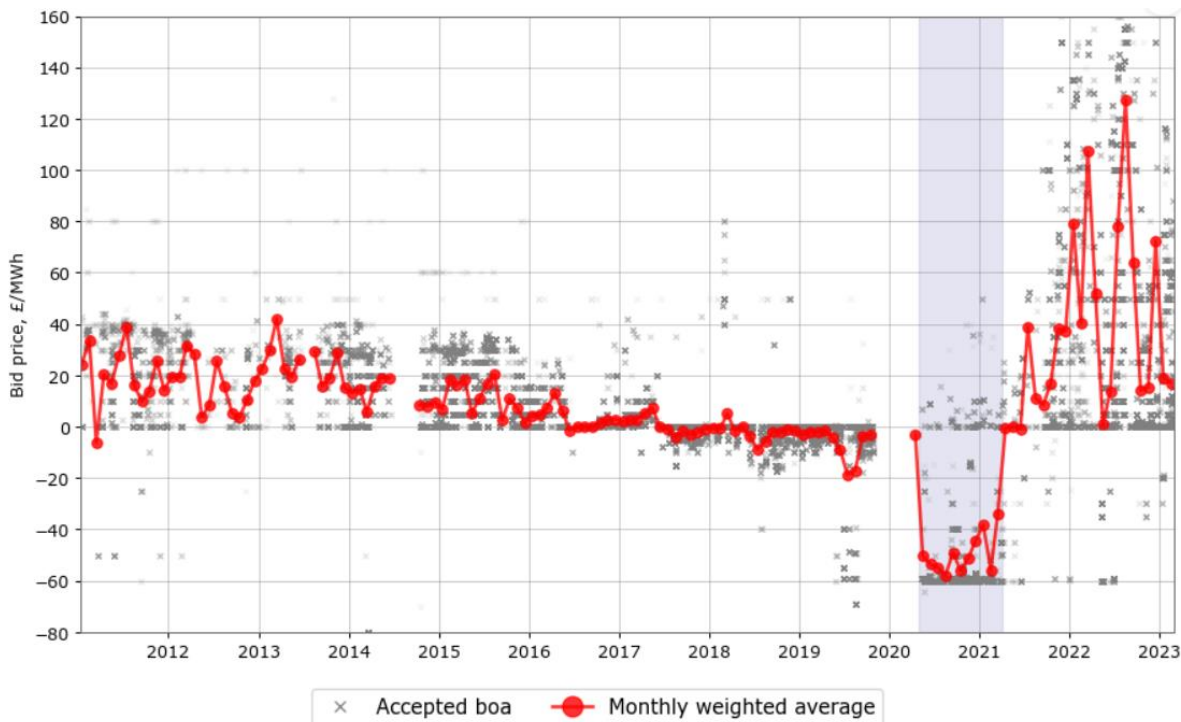
Our investigation

- 2.13 In Winter 2019/20, Foyers was taken offline for maintenance. In May 2020, when it returned to (partial) operation, SSE changed its approach to setting bid prices for Foyers in the BM. This change was made in order to bring Foyers in line with what SSE believed was the market practice of other pumped storage operators, and to generate more profit. In making the change, SSE was aware of the transmission constraint regularly affecting Foyers, and so the relevance of the TCLC to how it set its bid prices.
- 2.14 Under the new pricing policy, SSE commonly submitted bids at a price point close to minus £60/MWh – ie requiring the ESO to pay it around £60 for each MWh by which it was asked to reduce its output. As shown in Figure 2, the prices in this period were substantially more expensive than the bid prices SSE had typically submitted previously. This approach to pricing continued up to the end of March 2021, subsequent to which SSE's bid prices became less expensive (as wholesale prices rose) and negative prices less common.

⁵ Where the ESO takes actions in the BM to manage certain transmission constraints (including thermal limits), these are "system flagged", allowing such actions to be identified in publicly available balancing data.

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Figure 2: **The average price of Foyers' accepted bids, 1 Jan 2011 – 31 March 2023**



Source: Ofgem analysis of BMRS data.

Notes:

1. The grey shaded area shows the period from May 2020 to March 2021 that our investigation has focused on.
2. The monthly weighted average bid price is calculated by taking the price of each bid acceptance for either Foyers unit in £/MWh, and then weighting by the accepted bid volume in MWh, before averaging over the month.
3. Individual bid acceptances are plotted as crosses for each day. Price points with more bid acceptances are darker.
4. A small minority of bid acceptances occurred in the period outside of the axis range – these are not shown

2.15 In April 2021 we contacted SSE asking for an explanation of the change to its bid prices starting May 2020, given its position behind a transmission constraint and its obligations under the TCLC. On 4 October 2021, we opened a formal investigation into whether SSE had failed to comply with the requirements of the TCLC.

2.16 In the period from October 2021 to June 2022 we issued a number of notices to SSE requiring it to provide information to allow us to assess whether there had been a breach of the TCLC. In August 2022, we issued to SSE a summary statement of initial findings setting out that we had reached the provisional conclusion that it had breached

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the TCLC in relation to the bid prices submitted for Foyers in respect of the period from May 2020 to March 2021, and may have continued to breach the TCLC from April 2021 onwards.

- 2.17 In October 2022, SSE submitted its response to the summary statement. In March 2023, SSE contacted Ofgem to note that it was willing to admit a breach, make a payment to offset the associated consumer detriment, and pay a penalty. On 6 June 2023 we published details of our findings and notice of our intention to impose a penalty on SSE, and invited any representations on that proposal.

3 THE BREACH

- 3.1 Following our investigation, we have concluded that SSE's revised pricing policy was such that, in the period from May 2020 to March 2021, SSE obtained an excessive benefit during periods in which a transmission constraint occurred, in breach of the TCLC. Additionally, although it was much less common for SSE to submit negative bid prices after March 2021, the nature of its pricing policy was such that SSE may have continued to breach the TCLC even after this date.

Description of the breach

- 3.2 In order to assess the excessiveness (or otherwise) of the bid prices submitted by SSE for Foyers, we considered whether those prices were set at a level which meant that the benefit that SSE obtained or sought to obtain in relation to transmission constraint periods was significantly greater than the benefit it would have obtained in the absence of any transmission constraint, and therefore whether those bid prices were excessive.
- 3.3 The benefit that SSE obtained or sought to obtain through its bid prices for Foyers is the profit associated with those bids (or the implied profit, had those bids been accepted). We are unable to directly observe what bids the ESO would have accepted in the BM absent any transmission constraint, and the prices that it would have paid for those reductions in generation. However, we are able to use a number of different benchmarks to form a view on what benefit SSE would have been likely to be able to obtain absent the constraint.
- 3.4 In our assessment, we placed particular weight on the fact that from May 2020, SSE's bid prices for Foyers were primarily set with reference to the bid prices of selected

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other generators, rather than the costs and benefits of being bid down. This included in periods in which a transmission constraint existed.

- 3.5 By linking its bid prices for Foyers to those of selected other generators (in this instance, Cruachan – another pumped storage power station in Northern Scotland, itself frequently bid down due to constraints – and SSE group’s own wind generation units), without regard to the costs and benefits it itself incurred when being bid down, SSE’s policy failed to put any controls on the level of benefit it would obtain on bids in transmission constraint periods. This approach by its nature created an intrinsic risk of breaching the TCLC.
- 3.6 The revised pricing strategy was particularly likely to breach the TCLC because the generators most commonly referenced by SSE when setting its prices were themselves regularly bid down due to transmission constraints, as would have been apparent to SSE given the significant proportion of those generators’ bids that were system flagged. In January 2023, Drax Pumped Storage Limited (“Drax”) agreed to pay an amount of £6.12m into the consumer redress fund to reflect its admission that it had submitted excessively expensive bid prices for Cruachan in the period from 1 January 2019 to 31 July 2022. In contrast to SSE, a formal investigation into Drax’s compliance with the TCLC was not active at the time – the payment was made in lieu of a formal investigation being opened.
- 3.7 SSE’s approach to pricing contrasted to that which had been used at the start of 2017 – and that which is used for wind generation assets in the wider SSE group portfolio – according to which bid prices should take into account the costs and benefits of providing the reduction in generation.
- 3.8 Our analysis showed that the bid prices that SSE submitted allowed it to generate a profit on its bids in periods in which transmission constraints occurred which appeared significant when compared to a number of possible benchmarks (including SSE’s revenue; historic profit levels; and the profit earned on bids for other units operated by SSE group). SSE itself noted in its annual reporting for 2020/21 that Foyers had “achieved exceptional performance” in the period of concern.
- 3.9 We also placed weight in our assessment on evidence that SSE’s prices were significantly more expensive both than they had been in previous periods; and

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significantly more expensive than those of the two Welsh pumped storage units in GB which – unlike Foyers – were not routinely bid down to manage a transmission constraint in the period. Its prices in transmission constraint periods were also significantly more expensive than the prices at which it had bids accepted when a transmission constraint did not occur. Crucially, none of these price differentials appeared to be explained by differences or changes in the costs and benefits to Foyers of being bid down.

- 3.10 While its average bid price became less expensive from April 2021 onwards as wholesale power prices rose, SSE told us that it continued to take the same broad approach to setting its bid prices for Foyers in transmission constraint periods – ie it set these prices with reference to those of selected other generators frequently bid down due to a transmission constraint, and particularly Cruachan. Given this, we consider there to be a risk that SSE continued to be in breach of the TCLC even after May 2020 to March 2021 (the period on which our investigation has centred), due to the lack of controls in its pricing policy to ensure that its bids in transmission constraint periods in which it intended to generate were set at a level that ensured that the benefit to SSE did not exceed what would be expected in the absence of a transmission constraint.

Consumer impact

- 3.11 We considered the impact of SSE's excessive pricing, and particularly what SSE gained as a result of the breach and, related, any detriment suffered by consumers and other market participants.
- 3.12 The most direct impact of the breach is the cost to the ESO – and ultimately consumers – arising from SSE having a higher volume of bids accepted at more expensive prices than would have been expected absent any transmission constraint. This is distinct from any indirect effects of the breach via, for example, the potential impact on other generators' bid prices. The impact is equivalent to the gain earned by SSE in relation to its excessive bids.
- 3.13 To assess this direct impact, we considered what SSE's prices might have been, had those prices properly reflected the costs and benefits of being bid down (and a reasonable level of profit), and not been excessive. As set out above, SSE itself did not set its bid prices for Foyers in individual settlement periods with reference to its

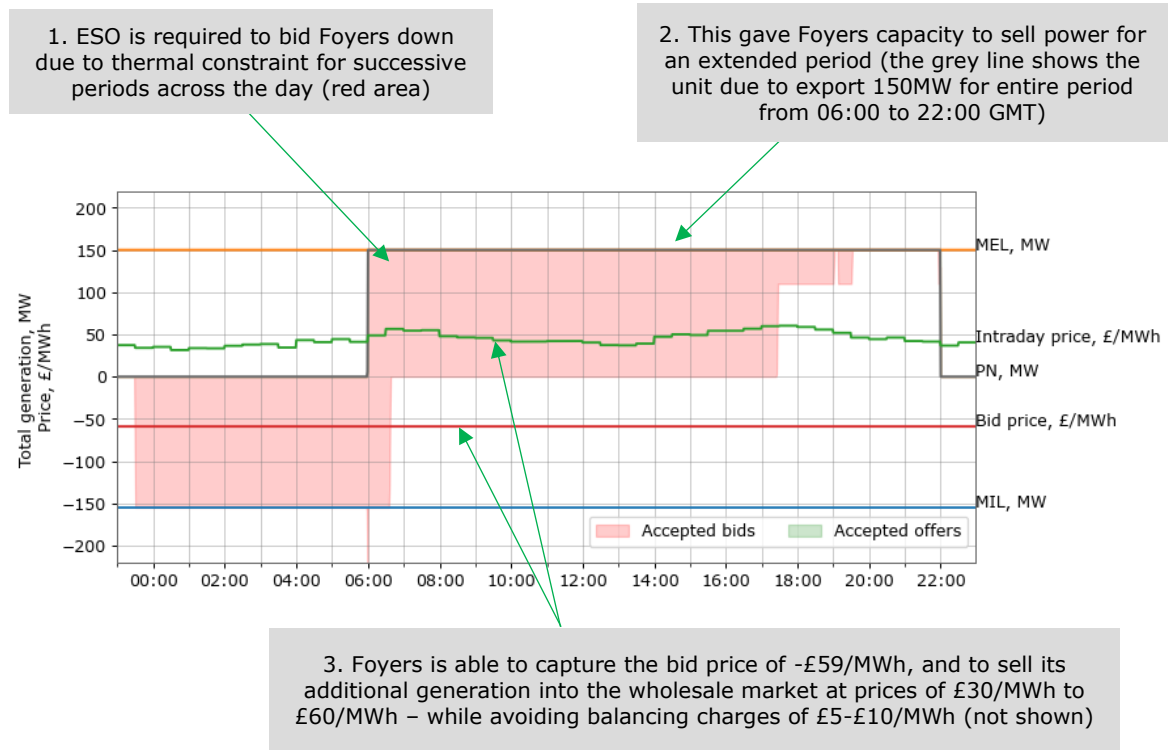
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expectations of the incurred costs, opportunity costs or avoided costs associated with reductions in generation in those periods, and so was unable to produce systematic estimate of these costs and benefits which could be used for this analysis. Therefore, we estimated these costs and benefits ourselves.

- 3.14 Where Foyers had a bid accepted in the period in question it would have enjoyed significant benefits. These would primarily have comprised:
- (a) any bid revenues received from the ESO (driven by its bid prices which – as set out above – were commonly close to minus £60/MWh);
 - (b) avoided balancing charges (which in the period of concern were levied on metered output – and so were “avoided” where SSE had a bid accepted reducing generation at Foyers); and
 - (c) the value associated with additional water in the upper reservoir (which would allow SSE to sell power in subsequent periods without any further requirement to pump).
- 3.15 The box below shows an example of the benefits to SSE of Foyers being bid down due to a transmission constraint on a day in September 2020.

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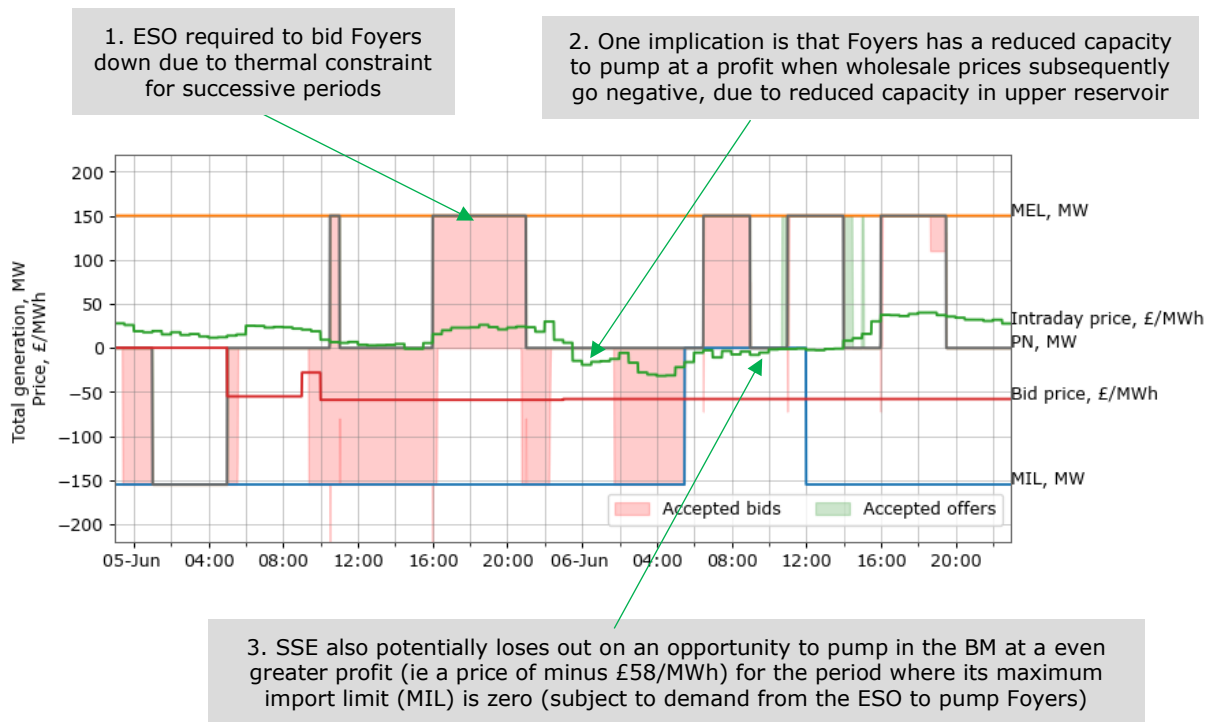
Example 1: 2 September 2020, Foyers unit 1



3.16 A bid acceptance may also have resulted in certain costs. Likely to be most significant is the potential opportunity cost to SSE associated with a reduced ability to pump in subsequent periods (where profitable opportunities to pump either in the BM or wholesale markets existed), due to reduced capacity in the upper reservoir compared to the situation absent the bid having been accepted. This opportunity cost is illustrated in the box below for two days in June 2020. At times, the opportunity cost could materialise in the form of SSE choosing to sell power in periods with negative wholesale prices in order to keep the water level in the upper reservoir at the optimal level.

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Example 2: 5 and 6 June 2020, Foyers unit 2



Note: The Maximum Import Limit denotes the maximum amount of power that a generated is able to import from the transmission system. Where Foyers has capacity to pump in the BM, the MIL will be set below zero, indicating its availability. Where Foyers is unable to pump, the MIL will be set at zero.

3.17 By comparing an estimate of the scale of these different costs and benefits in each settlement period in which Foyers had a bid accepted between May 2020 and March 2021, we estimated a total excess of £5.58m (after deducting an amount to reflect what we considered to be a reasonable contribution to indirect costs and a reasonable profit). This estimate was subject to uncertainty, due (among other things) to the uncertainty as to the volume of bids that Foyers would have had accepted absent the transmission constraint, and the prices at which those bids would have been accepted, as well as the simplifications and assumptions used when estimating the costs and benefits to SSE of being bid down.

3.18 In addition to this direct detriment, we considered that the excess pricing was also likely to have led to other market distortions. For example, this included the risk that as a result of SSE submitting expensive prices in the period of concern, other

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generators may have on occasion also submitted more expensive prices than they otherwise would have, pushing up balancing costs for consumers.

4 PENALTY

Whether a financial penalty should be imposed in this case

- 4.1 In deciding whether it is appropriate to impose a financial penalty on SSE, and the amount of any penalty, we have had regard to the Statement of Policy with respect to Financial Penalties and Consumer Redress published in 2014 (the “2014 Penalty Policy”).⁶
- 4.2 We are required to carry out our functions under Part 1 of the Electricity Act 1989, including the taking of any decision as to the imposition of a penalty, in the manner that we consider best calculated to further our principal objective set out in section 3A of the Electricity Act 1989, having regard to our other duties. In formulating our decision as to whether it is appropriate to impose a financial penalty, we have considered all the circumstances of the case presently known including, but not limited to, SSE’s representations, the representations received in response to the notice of our intention to impose a penalty on SSE, and the specific matters set out in the 2014 Penalty Policy.
- 4.3 In this case we have decided that a financial penalty is appropriate. This is because:
- As set out above, the breach caused significant damage to the interests of consumers, including (but not limited to) by increasing balancing charges and so ultimately increasing costs for consumers. Consumer redress will help obtain a fair outcome for consumers;
 - The breach did or could have damaged consumer and market participants’ confidence in the market, given the crucial role that the TCLC plays in protecting against the inherent market power that is enjoyed by generators situated behind a constraint;

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https://www.ofgem.gov.uk/sites/default/files/docs/2014/03/penalties_and_redress_policy_statement_31_march_2014.pdf

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- We consider that a penalty is necessary to deliver credible deterrence and visible and meaningful consequences for breaching the TCLC. This includes the need to ensure that the amount paid by SSE significantly exceeds the gain it derived;
- The chosen pricing strategy which gave rise to the breach was wholly within the control of SSE;
- It should have been clear to SSE that its revised approach carried a significant risk of breaching the TCLC;
- Even after becoming aware of Ofgem's investigation, we understand that SSE continued to take broadly the same approach to setting its bid prices for Foyers in transmission constraint periods; and
- SSE has breached the TCLC previously.

4.4 These factors are discussed in further detail below where we describe the level of the penalty.

Level of penalty

4.5 Having considered the circumstances of the case we have required SSE to pay:

- An amount of £5.58m to reflect quantified consumer detriment relating to the breach
- A penal amount of £6m, discountable to £4.2m due to settlement being agreed within the 28 day early discount window.

4.6 In what follows we work through each of the steps set out in the 2014 Penalty Policy, and discuss how they apply to this case.

Step 1: Calculate detriment and gain

4.7 It is inherently difficult to estimate the direct detriment and gain from the breach. Among other reasons, this is because we do not know how SSE would have priced its bids absent any transmission constraint; nor the volume of bids that the ESO would have accepted for Foyers absent any transmission constraint. There are also various unknowns attached to our estimates of the costs and benefits of reductions in generation for Foyers.

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4.8 Notwithstanding this, we set out at 3.17 above our estimate of the “direct” impact of the breach of £5.58m. This is an estimate of the cost to the ESO – and ultimately consumers – directly arising from SSE having a higher volume of bids accepted at more expensive prices than would have been expected absent any transmission constraint. It is distinct from any indirect effect of the breach via, for example, a potential impact on other generators’ bid prices. It is equivalent to the gain earned by SSE in relation to its excessive bids.

Step 2: Assess seriousness

4.9 As per sections 5.10 to 5.14 of the 2014 Penalty Policy, the seriousness of a breach depends on the nature and impact of the breach and whether or not the contravention was deliberate or reckless.

4.10 As set out in the previous section, it is our view that the breach is likely to have resulted in significant consumer detriment, by increasing balancing charges in the period in question. It is also likely to have had further impacts on the market – and ultimately consumers – that have not been quantified. This includes both distorting pricing in the BM more widely; and distorting investment incentives – particularly for network reinforcement in Scotland.

4.11 The breach also has the potential to damage consumer and market participants’ confidence in the market. This is because the TCLC plays a crucial role in protecting against the inherent market power that is enjoyed by generators situated behind a constraint.

4.12 We have not seen any evidence which suggests that the breach was deliberate, ie that SSE changed its pricing strategy for Foyers knowing that the revised strategy would breach the TCLC. SSE itself has told us that the decisions it took around pricing for Foyers were made in good faith, and that it did not set out to deliberately breach the TCLC.

4.13 At the same time, the evidence we have collected makes clear that:

- in May 2020 SSE’s senior management amended its pricing policy to bring Foyers in line with what SSE believed was the market practice of Drax in relation to Cruachan

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pumped storage power station, rather than reflecting any particular change in market conditions or the costs or benefits to it of having bids accepted in the BM;

- this had the result of making Foyers' bid prices significantly more expensive than the prices it had submitted previously;
- the primary driver for doing so was to generate more profit;
- in making the change, SSE was aware of the transmission constraint regularly affecting Foyers, and so its obligation to set its prices in a way that ensured it did not obtain an excessive benefit; and
- despite this, the effect of the revised pricing policy was to link bid prices for Foyers directly to those of Cruachan and SSE's own wind generation units. In both cases, the generators in question were frequently bid down due to transmission constraints.

4.14 Given this we consider that it should have been clear to SSE (including senior management) that its revised approach carried a significant risk of breaching the TCLC.

4.15 The approach to pricing contrasted to that which had been used by SSE for Foyers at the start of 2017 – and that which was used for wind generation assets in SSE group's portfolio – according to which bid prices should take into account the costs and benefits of providing the reduction in generation. While precisely estimating the opportunity costs of having a bid accepted for a pumped storage unit is complex, we considered that it would have been possible for SSE to form an approximate view of these costs, and so to set bid prices which were broadly reflective of the estimated costs and benefits of being bid down.

4.16 Taking into account the nature of the breach, its impact and the context surrounding the introduction of SSE's revised pricing policy, we consider the breach to have been serious.

Step 3: consider aggravating or mitigating factors

4.17 We consider that in this case, a number of aggravating factors may apply:

- (a) SSE has breached the TCLC previously: in 2015 SSE made a payment to Energy Action Scotland of £100,000 after its bid prices for its Scottish hydro

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cascade units resulted in it receiving excessive payments in the BM, in breach of the TCLC;⁷

- (b) SSE's senior management was directly involved in the revision to the pricing policy which led to the breach, and – as set out above – the risks of breaching the TCLC given the nature of the policy should have been clear;
- (c) Even after becoming aware of Ofgem's investigation, SSE continued to take the same broad approach to setting its bid prices for Foyers in transmission constraint periods – ie setting these with reference to those of selected other generators frequently bid down due to a transmission constraint, and particularly Cruachan.

4.18 On the basis of the above, we consider that there are likely to be a number of aggravating factors in this case. Taken together, we have therefore decided to recommend a higher level of penalty than might otherwise have been considered suitable.

Step 4: consider whether the penal element ensures deterrence

4.19 As per sections 5.21 to 5.22 of the 2014 Penalty Policy, we next consider what level of penalty would be required to ensure that the penalty has sufficient deterrent effect.

4.20 In light of the need to ensure a credible deterrent, the indirect detriment described above (which has not been quantified), the seriousness of the breach and the aggravating factors described above, we consider that a further payment of £6m is reasonable in all of the circumstances, after having regard to the level of consumer redress that is to be paid.

4.21 We note that this amounts to only a small share of SSE's total revenue (and operating profit) for the period in question. Nevertheless, we consider that a penalty of £6m is sufficiently material to provide a credible deterrent signal to the market.

⁷ <https://www.ofgem.gov.uk/publications/sse-pay-ps100000-energy-action-scotland-over-constraint-payments>

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Step 5: Apply any settlement discount to the penal element

4.22 SSE has engaged constructively and has agreed to settle the investigation within the 28 day settlement window, and therefore has benefitted from a 30% discount. This reduced the penal element from £6m to £4.2m.

Step 6: Establish the total financial liability

4.23 Having considered all of the above matters, we have required SSE to pay a total amount of £9.78 million, comprising £5.58m to reflect the consumer detriment we have quantified, and further penal element of £4.2m.

4.24 We have imposed a financial penalty of £1 on the condition that SSE pays the balance of the £9.78 million to Ofgem's consumer redress fund. This approach is preferred because we consider that a payment into the consumer redress fund is of greater benefit to energy consumers than if a significant financial penalty were to be imposed. We consider the penalty to be reasonable in all of the circumstance of the case.

5 REPRESENTATIONS RECEIVED IN RESPONSE TO THE NOTICE OF 6 JUNE 2023

5.1 On 6 June 2023, the Authority published notice of its intention to impose a financial penalty on SSE pursuant to s27A(3) of the Electricity Act 1989, and invited any representations on that proposal. We received one response.

5.2 That response (published on our website) did not comment on the specifics of the SSE investigation or the penalty proposed. However, it did raise various concerns with the approach Ofgem had taken to assessing the excessiveness of SSE's bids, including:

- That given the design of the BM and the lack of foreseeability of application of the TCLC, it seemed both entirely reasonable and rational for a generator to price its bids with reference to competitor bids which it expects will be accepted by the ESO, rather than the costs and benefits of its own asset being bid down as per Ofgem's assessment;
- That the price of rival generators is explicitly included in the list of benchmarks included in the TCLC guidance – in contrast to the inference from Ofgem's notice of 6 June 2023 which implied that a generator can only ensure compliance if it bids purely by reference to its own costs and benefits of being bid down;

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- That requiring generators to price their bids with reference to the costs and benefits of being bid down would make the TCLC a blanket restriction on bid pricing in the BM rather than a control on market power in specific circumstances, interfering with the efficient operation of the market;
- That if licensees were required to place controls on the overall level of benefit obtained during transmission constraint periods rather than bid prices (which would not be in line with the TCLC or the TCLC guidance), then the only way it would be possible to achieve compliance would be to set bid prices without any profit margin – which would place them at a disadvantage to generators the other side of the constraint; and
- That Ofgem should reconsider what it is asking of licensees, and whether a clearer definition of ‘excessive benefit’ is required; as well as further transparency around the occurrence of constraints.

5.3 We have considered this response carefully, and remain of the view that our approach to assessing the excessiveness of SSE’s bid prices is correct, and that a breach of the TCLC has occurred. Far from undermining competition in the BM or interfering with the efficient operation of the market, the TCLC both supports competition and ensures that the BM works in the best interests of consumers. Were generators subject to a transmission constraint free to take an approach to bid pricing along the lines set out in the response, it would result in those generators being able to take advantage of their market power - directly undermining the purpose of the TCLC, pushing up costs to consumers, and giving those generators a significant advantage relative to their rivals. We address the points raised in the response more fully below.

5.4 We agree with the respondent that in the BM generators have an incentive to submit prices close to the expected ‘marginal’ level – ie at a level reflecting the most expensive bid price that the ESO is expected to accept, given its likely requirements and the expected price of the next best alternative. However, the fact that generators have an incentive to price at this profit-maximising level does not mean that a licensee submitting bids at this level cannot be in breach of the TCLC. In fact, depending on the circumstances, the opposite may be true – ie in certain situations, pricing at this level may directly result in a breach of the TCLC.

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- 5.5 It is important to note here that there will generally not be a single 'marginal' bid price in any given settlement period. Instead, in any given period the ESO will typically need to accept bids from certain groups of generators in order to balance the system, with the result that it will have different sets of alternatives available to it at different prices depending on the specific balancing requirement being addressed.
- 5.6 In the case of Foyers, the bids which SSE submitted were priced relative to selected alternatives which might have been available to the ESO specifically to manage thermal constraints in Scotland and/or Northern England (ie Cruachan and wind units). Therefore, those bid prices could be argued to reflect the 'marginal' price of managing the constraint(s), and the price at which SSE was incentivised to submit bids in order to maximise profit given the design of the BM. However the ESO's willingness to accept bids at this level was a direct consequence of the existence of the transmission constraint, and particularly the lack of economic alternatives available to it to resolve that constraint. The TCLC is specifically intended to protect against generators taking advantage of the market power arising in such situations. By submitting bid prices at this level, SSE's pricing policy by its nature carried a significant risk of giving rise to an excessive benefit, in breach of the TCLC.
- 5.7 An alternative 'marginal' price that generators might in principle seek to set their prices with reference to would be an estimate of the most expensive bid that the ESO would be likely to accept in a given period from generators that are *not* subject to a transmission constraint (eg based on observations of patterns in historic accepted bid prices which were not system flagged). While such an approach would have been expected to result in less expensive prices than those submitted by SSE for Foyers in the period in question, it is important to note that a benchmark of this type could also result in bid prices which are not compliant with the TCLC, where used by a generator that is subject to a transmission constraint. This is because such a bid price is not necessarily likely to be reflective of the benefit that the generator would have obtained absent the transmission constraint.
- 5.8 One reason for this is that – given the significant uncertainty around the ESO's requirements and the prices of their rivals in any given period – generators that are not subject to a transmission constraint typically face a trade-off. On the one hand, they can choose to submit more expensive prices, increasing their profit if the bid is

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accepted, but reducing the probability of the bid being accepted if the ESO's requirements are less than anticipated or rivals submit cheaper prices than expected. On the other hand, they can submit less expensive bid prices, increasing their chance of having a bid accepted, but sacrificing some profit in the process.

- 5.9 The effect of this trade-off is that in practice we see significant variation in the bid prices submitted by different generators in any given settlement period, with most submitting bids that are less expensive than what ultimately turns out to be the marginal level. A generator which sought to maximise profit by setting its bid prices at the very top of the expected acceptance range in every settlement period would frequently not have a bid accepted at all.
- 5.10 In contrast, a generator behind a transmission constraint does not face the same trade-off. This is because the existence of the transmission constraint has the effect that even where the licensee submits relatively expensive bid prices, the ESO will have few economic alternatives available to it other than accepting the bid of that generator.
- 5.11 The result is that, were a constrained generator to use an estimate of the most expensive bid price that will be accepted among generators not subject to a transmission constraint as a benchmark when setting its own prices, then this would likely result in that generator earning on average a level of profit significantly greater than generators not subject to a constraint. Allowing constrained generators to submit bid prices at this level could therefore give generators subject to a transmission constraint a very significant advantage compared to unconstrained generators, allowing them to obtain a profit far in excess of that which would be achievable absent the constraint, and undermining the purpose of the TCLC.
- 5.12 This is not to say that the prices of rival generators can never provide a useful benchmark when considering the excessiveness or otherwise of a licensee's bid prices. This is reflected in the TCLC guidance, which refers to such benchmarks as indicators which may be considered when determining whether an excessive benefit has been obtained. In fact, as described in section 3 of this notice, we have carried out and placed weight on comparisons with benchmarks of this type in the context of this investigation. Rather than the marginal price, we would generally expect *average* prices or profit margins of groups of comparable generators to be a more useful guide

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to what would be a 'reasonable' level of profit for a generator operating in transmission constraint periods to price into its bids.

- 5.13 Related, where a generator fails to have any regard to its costs and benefits of being bid down, and instead relies wholly on comparator generator benchmarks to set its bid prices in transmission constraint periods, that does not mean that its bid prices will necessarily be excessive. Rather, this will depend on the specific comparator chosen, and whether the prices of that comparator provide a useful guide to the benefit that the generator would obtain absent the transmission constraint. However, such a pricing policy does create an intrinsic risk of breaching the TCLC, as the generator has essentially delegated responsibility for its bid prices, without any controls in place on the level of benefit received and in turn, the risk of breaching the TCLC.
- 5.14 With respect to a generator's ability to know when it submits a bid whether that will bid will, if accepted, be used to manage a transmission constraint, we agree that in general generators have limited visibility of the ESO's rationale for accepting specific bids and offers, and the existence of transmission constraints more generally. This has been the case since the TCLC was first introduced. It reflects the fact that, in deciding what information to publish regarding both transmission constraints and bid acceptances, the ESO must take into account both the practical challenges associated with publishing such information (given that actions are being taken in real time, and given the number of actions being taken); and the commercial implications of doing so.
- 5.15 Nevertheless, this does not mean that it is acceptable for generators to submit excessive prices in transmission constraint periods. Nor is this to say that generators will be unable to form any expectation as to whether or not they are operating in a transmission constraint period. Significant information regarding the occurrence of transmission constraints is available to generators. The clearest indicator is the licensee's ability to observe whether or not previous bids have been system flagged, while further information on the presence and nature of constraints is also available to market participants via the ESO's publications (particularly the ESO data portal) and its operational transparency forums. This information allows generators to form a view on the likelihood that they are subject to a transmission constraint, and so whether the TCLC will apply to their bid pricing.

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- 5.16 Finally, we do not agree that requiring licensees to place controls on the overall level of benefit in £ million obtained during transmission constraint periods is inconsistent with the TCLC or the TCLC guidance, nor that this would require generators to set their bid prices to reflect costs and benefits of being bid down, but no more. The TCLC refers directly to 'excessive benefits', and the benefit to a generator of a bid acceptance is the profit it earns. While a generator does not have control over the amount of bid volume which the ESO considers is required to address a transmission constraint, it does have full control over the profit margin in £/MWh it prices into those bids, and in setting this element of bid prices, is able to take into account previous bid acceptances.
- 5.17 The requirement that generators do not obtain an excessive benefit in transmission constraint periods does not mean that no profit margin can be priced into bids. The TCLC requires only that the profit earned is not significantly greater than would have been obtained absent the transmission constraint. Exactly what level of profit margin in £/MWh would not amount to an benefit that is excessive will in part depend on the volume of bids accepted, because it is the combination of those margins and exogenous bid acceptance volumes which will determine the overall profit (and contribution to indirect costs) that is obtained by the business.

6 THE AUTHORITY'S DECISION

- 6.1 We have found that SSE has breached the TCLC as set out in section 3 of this Notice. Having considered all of the relevant facts and circumstances in our possession and having regard to the 2014 Penalty Policy, we therefore have decided to impose a penalty of £1 on SSE which we consider to be an amount which is reasonable in all the circumstances of the case for the reasons set out in section 4 of this Notice. We have considered the representations received in response to the notice of our proposal to impose a penalty on SSE, but do not consider that any changes are required to the penalty compared to the level described in that notice, for the reasons set out in section 5.
- 6.2 The penalty takes into account that SSE will pay £9,780,000.00 (less £1 penalty), into the consumer redress fund. The payment of the amounts will be made by 5 September 2023 (ie 42 days of the date of service of this notice).

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- 6.3 In reaching this decision, we have taken the relevant factors under the 2014 Penalty Policy into account, including:
- The serious nature of the breach
 - The financial harm suffered by customers as a result of the contravention
 - The aggravating factors described above.
- 6.4 We hereby give notice under section 27A(5) of the Electricity Act 1989 of our decision to impose a penalty of £1 on SSE in respect of the contraventions set out above.
- 6.5 SSE has agreed to settle the investigation on the basis of paying a financial penalty of £1 and the pay the sum of £9,780,000.00 (less £1 penalty) by way of consumer redress.

Gas and Electricity Markets Authority Date: 25 July 2023