Amendment proposal:	**Connection and Use of System Code (CUSC) Amendment Proposal CAP149: Transmission Entry Capacity with Restricted Rights**		
Decision:	The Authority[1] directs that the Consultation Alternative Amendment 2 (CAA2) for CAP149 be made and implemented[2]		
Target audience:	National Grid Electricity Transmission PLC (NGET), Parties to the CUSC and other interested parties		
Date of publication:	23 April 2008	Implementation Date:	24 May 2008 (1 month after an Authority decision)

Background to the amendment proposal

CAP149 ("Transmission Entry Capacity with Restricted Rights") proposes to formalise the transmission access arrangements for generators who have a design variation connection. Generators with this type of connection are subject to access restrictions which currently sit outside the CUSC within the Bilateral Connection Agreement (BCA) or Bilateral Embedded Generation Agreement (BEGA) held between the generator and National Grid Electricity Transmission (NGET) as the GB System Operator (GBSO).

A generator's right to export power onto the transmission system is defined in its BCA or BEGA as the Transmission Entry Capacity (TEC), which is the maximum contractual right in MW it can flow power onto the transmission system.

The transmission licensees accommodate such rights by providing connections to the transmission network as well as the deeper transmission infrastructure itself. These are carried out in accordance with the planning criteria for the design of generation connections and the design of the main interconnected transmission system (MITS) as set out in the GB Security and Quality of Supply Standard (GBSQSS). The generation connection criteria include a set of deterministic requirements which would lead to standard connection designs with a certain level of asset redundancy. However, the generation connection criteria also allow variations to such standard connection design to be requested by the generator, provided that the variations do not result in reducing the MITS security to below the minimum planning criteria, or other specified adverse impacts on other generators in terms of increased costs or reduced security and quality.

All generators with TEC have an obligation to pay the Transmission Network Use of System (TNUoS) charges. Under the current transmission charging methodologies, TNUoS charges cover the costs associated with all transmission infrastructure assets (whose design is subject to the MITS criteria) as well as local assets (whose design can be varied under the generation connection criteria) connecting a user to the transmission network that are or could be shared with another user. In return for paying TNUoS charges, generators have the right to export power onto the system up to the value of their TEC which is financially firm.

In terms of the firmness of the access rights relating to the local assets with standard design, when the generator is de-energised due to the unavailability of such assets (termed as a "Relevant Interruption" in CUSC), it is entitled to financial compensation via

[1] The terms 'the Authority', 'Ofgem' and 'we' are used interchangeably in this document. Ofgem is the Office of the Gas and Electricity Markets Authority.
[2] This document is notice of the reasons for this decision as required by section 49A of the Electricity Act 1989.

the Interruption Payment as defined in the CUSC. This payment consists of an element based on market price up to 24 hours, followed by a further element based on an administered price linked to TNUoS tariff if access has not been restored within 24 hours. However, if a generator chooses a connection design that is less secure than the standard design under the GBSQSS, its access will be restricted without compensation in the event of interruption due to the unavailability of the relevant connection assets. Such an event is defined as "Allowed Interruption" in CUSC and is listed in the generator's BCA or BEGA with the GBSO to be excluded from the Interruption Payment.

In terms of the firmness of the access rights relating to the wider transmission infrastructure, however, it is important to note that this is not affected by the type of local connection design chosen by the generator. In other words, the choice of a less secure local connection design does not alter a generator's entitlement to compensation under the BSC when the wider network is congested. All BSC parties are eligible for compensation in the form of constraint payments if they are constrained off the system by National Grid as GBSO through the Balancing Mechanism. The Balancing Mechanism enables BSC parties to price their output at a level they decide, and should this output be curtailed by the GBSO, the generator is remunerated on a "pay-as-bid" approach.

CAP149 only relates to the variation of the local connection design and the associated compensation in terms of Interruption Payment. It does not impinge upon a generator's ability to receive compensation for the lack of capacity in the wider transmission infrastructure via the Balancing Mechanism as currently provided.

The amendment proposal

CUSC Amendment Proposal (CAP) 149: 'Transmission Entry Capacity with Restricted Rights' was raised by Scottish and Southern Energy (SSE) Generation Ltd on 29th June 2007. The proposal seeks to formalise certain existing transmission access arrangements for generators who do not hold a standard connection agreement. More specifically, the proposal seeks to formalise the access restrictions for generators with this type of connection into the CUSC.

The original proposal contends that whilst generators of the transmission system pay the same amount for access (zonally) in TNUoS, generators receive different financial access rights depending on connection design and not all generators are entitled to the same level of compensation payments when the generator is disconnected. The original proposal seeks to address this disparity by introducing a new access product to be termed TEC-Lite, for new and existing generators. TEC-Lite would be the same as TEC, with the exception that the associated access restrictions would be formalised in the CUSC instead of in the relevant BCA or BEGA. At the same time, the proposer expects that this CUSC amendment would have an impact on NGET's Use of System Charging methodology, in that a new TNUoS charge (or charges) would be developed for this new type of access rights, which would be less than the full TNUoS that is currently charged for TEC, to reflect the associated lower level of investment.

In justifying the original proposal, SSE argued that where it is more efficient for a generator to be connected with a less secure design, at present there is no incentive for it to request this design as there is no financial advantage to the generator of doing so. SSE also argued that for existing generators with different access rights to be subject to the same charges implied that there might be discrimination between generators. SSE believed that the introduction of a new access product would help address these issues

and better facilitate the efficient discharge by the licensee of its licence and statutory obligations and better facilitate effective competition.

In addition to the original proposal, a further three alternatives have been raised, one Working Group Alternative Amendment (WGAA) and two Consultation Alternative Amendments (CAA1 and CAA2).

WGAA

WGAA was raised by the working group and differs from the original proposal in that it does not seek to introduce a new access product. Instead, WGAA proposes to make changes to the Connection Offer Form to allow a new generator to obtain information on both standard connection and a design variation non-firm connection. The generator would then be able to make an informed decision on the time and cost implications of their choice of connection as well as the probability of restrictions to access.

To simplify the implementation of the proposal, the working group agreed that the new arrangements should primarily apply to generators seeking new connections. Existing generators could opt for a Modification Application to convert to the new form of connection agreement.

CAA1

CAA1 was raised by SSE in addition to the original proposal in response to the National Grid consultation of 19th October 2007.

CAA1 differs from the original proposal in that it proposes to apply the Interruption Payment compensation arrangements to generators with non-standard connection designs, in the event that a charging modification to reduce TNUoS for non-standard connections is not implemented.

The proposer argued that if a generator does not receive the charging discount for its non-standard design, i.e. pays for the full access product, then it should be entitled to equal access rights in the form of Interruption Payments for loss of access. SSE believed that this would not impose any additional cost to other generators overall as the additional compensation payments would be more than offset by the savings of transmission investment and operational costs due to the choice of less secure connection design. SSE argued that this was because the GBSQSS would not have allowed for design variation if it resulted in higher investment or operational costs on other generators, and also because historically the design variation must have been chosen on the basis of lowest overall costs including network costs and value of lost energy.

CAA2

CAA2 was raised by National Grid in response to its consultation and was based on WGAA with several changes to the legal drafting.

The first change provides that in the event that changes to the transmission system result in a design variation connection no longer being compliant with the GBSQSS, CAA2 gives National Grid the right to update the relevant clauses of the BCA where the output restrictions are contained. If a generator does not agree with the National Grid

amendments the generator may refer the disputed provisions to the Authority for determination.

The second change is to introduce an intermediate step before the initiation of an Event of Default in the event that a generator does not comply with the access restrictions that are contained in their BCA for their type of connection. Failure of the generator to justify breach on their part would allow National Grid to reduce the generator's TEC in order to prevent any further impact on the transmission system or other generators.

The final change is to avoid cross governance and duplication between the Grid Code and the CUSC in the exchange of operational information. More specifically, CAA2 removes the requirement for the duplicated, additional processing and issuing of:

- 'Notification of Circuit Outage';
- 'Notification of Circuit restriction'; and
- 'Notification of Revocation of Outage Conditions';

within the legal text of the CUSC.

CUSC Panel[3] recommendation

The CUSC panel considered that both the WGAA and CAA2 better facilitated the CUSC objectives, but WGAA best facilitated the applicable objectives.

The Panel did not consider that the original or CAA1 better facilitated the CUSC objectives.

The Authority's decision

The Authority has considered the issues raised by the amendment proposal and the Final Amendment Report (AR) dated 17th March 2008. The Authority has considered and taken into account the responses to NGET's consultation on the amendment proposal which are attached to the AR[4]. The Authority has concluded that:

1. **implementation of the amendment proposal CAA2 will best facilitate the achievement of the applicable objectives of the CUSC[5]; and**

2. **directing that the amendment CAA2 be made is consistent with the Authority's principal objective and statutory duties[6].**

Reasons for the Authority's decision

Ofgem has considered the views of the CUSC panel and those of respondents to NGET's consultation and does not agree with the Panel recommendation that WGAA best

[3] The CUSC Panel is established and constituted from time to time pursuant to and in accordance with the section 8 of the CUSC.
[4] CUSC amendment proposals, amendment reports and representations can be viewed on NGET's website at http://www.nationalgrid.com/uk/Electricity/Codes/systemcode/amendments/
[5] As set out in Standard Condition C10(1) of NGET's Transmission Licence, see: http://epr.ofgem.gov.uk/document_fetch.php?documentid=5327
[6] The Authority's statutory duties are wider than matters which the Panel must take into consideration and are detailed mainly in the Electricity Act 1989.

facilitates the applicable CUSC objectives over CAA2. Ofgem also considers that approving CAA2 is consistent with our wider statutory duties.

Having carefully considered the justifications from the proposer and the views of respondents, Ofgem does not consider that the original amendment would better facilitate the applicable CUSC objectives.

We recognise the benefit of generators exercising choice in their connection design and the need to improve the corresponding process and arrangements. In addition, we also agree in principle that the charges paid by generators receiving less secure connections should be cost reflective. However we do not agree that the introduction of a new enduring access product is the most appropriate solution. We consider that if a new access product TEC-Lite were to be introduced, it is not clear what the relationship would be between TEC and TEC-Lite, in particular, whether and how a TEC-Lite product could be converted to TEC in the event the transmission network around the generator changes.

Further we would note that cost reflective charging for generators with design variation connections is still under development and that such development is not dependent on the existence of a new type of access product.

WGAA

WGAA formalises the arrangements for new generators to choose between standard and less secure connection designs. To the extent that this would provide a more transparent process and allow more informed decisions by generators for more efficient connection design, it would better facilitate applicable objective (a).

However, there was concern that the benefits of WGAA were undermined by potential duplication of notification procedures in OC2 of the Grid Code. A number of respondents suggested that these were not specific to design variation connections and welcomed the review of the OC2 proposed by National Grid. One respondent went further to add that OC2 provisions did not allow for instructions to generators to reduce exports onto the transmission system when certain circuits were on outage. Therefore this respondent supported the changes under WGAA to include these provisions in the BCA to make the procedure more transparent. Ofgem recognises that the OC2 provisions are not specific to the type of connection designs and that more targeted notification from National Grid would be helpful to the generators with design variation connections. However, Ofgem also recognises the problem of duplication between provisions in the BCA and under OC2 of Grid Code and notes that such duplication introduced under WGAA has the potential to raise cross governance issues which would not better facilitate objective (a).

CAA1

Ofgem does not agree that CAA1 better facilitates applicable objective (a). The introduction of Interruption Payments in the event that no charging reduction is obtained creates a risk that more Interruption Payments may occur as more generators would qualify for compensation. We note SSE's argument that there would be no additional cost as these costs would be offset by the savings in network investment and operational costs due to the design variation connections and that if additional costs were forecast then the design variation connection would not be granted. However, Ofgem notes that existing connection design variations were justified on the basis of interruption costs forecast at the time, together with other potential benefits of the variation such as more timely connection. Interruption Payments contain a substantial unpredictable element

which in reality could be greater than the savings to the network costs. Compared to the current situation where individual generators manage the risk of costs of interruption arising from their choice of connection designs, Ofgem does not consider that CAA1 better facilitates applicable objective (a).

Ofgem notes SSE's argument that the provision of Interruption Payments ensures that all generators of the transmission system that have the same access products have the same access rights and this in itself would help promote competition in generation and facilitate objective (b). However, as noted above, that charging implications for design variation connections are rightly being progressed separately by NGET with the industry and expects this to reach a conclusion soon.

CAA2

The Authority considers that CAA2 better facilitates the applicable objectives over and above WGAA by providing a number of improvements.

In terms of the provision for NGET to revise relevant agreements to ensure compliance with the GBSQSS, we recognise the importance of this. In particular, we recognise the undesirability of NGET having to apply for a derogation in the event that changes in the transmission system makes the connection design variation no longer compliant with GBSQSS. We note the argument by one respondent that there are already provisions under the CUSC 6.9.3 to enable National Grid to revise the agreements, but understand that these only refer to changes to Connection Site assets and therefore do not apply to many of the assets that are part of the connection design variation.

Ofgem also recognises the benefit of introducing intermediate step before the initiation of the Event of Default.

As referred to in the discussion of WGAA, we also note that provisions under OC2 of the Grid Code are not specific to design variation connections, and that more targeted notification from National Grid would be helpful to the generators with design variation connections. We agree that the form of the notifications provided for design variation connections under OC2 of the Grid Code may warrant further consideration and potential changes. However, we recognise the problem of duplication between provisions in the BCA and under OC2 of Grid Code, including in particular the potential to introduce cross governance issues.

Based on the above considerations, Ofgem considers that CAA2 better facilitates objective (a) relating to the efficient discharge of the licensee's statutory duties and licence obligations.

In addition Ofgem agrees that the increased transparency in connections as a result of standardising BCAs may also facilitate connections more swiftly, thereby promoting competition in generation, facilitating objective (b). This is also consistent with the Authority's principal objective with regard to promoting effective competition. Given that a large number of the generators awaiting connection are renewable, more timely connection will help contribute to government targets and may therefore have a positive effect on the environment, and the Authority's wider duties with regard to sustainability. Ofgem recognises that to achieve the full benefit of efficient choice by the generators for their connection designs, there need to be more cost-reflective charging arrangements for connection design variations. Ofgem notes that relevant work is being progressed by NGET with the industry to develop modifications to the TNUoS charging methodology.

On balance the Authority considers that CAA2 best facilitates the applicable CUSC objectives, Ofgem's statutory and wider duties and should be implemented one month after the decision.

In making this decision, however, the Authority notes that NGET should have identified the issues relating to WGAA at an earlier stage to allow these to be understood and discussed fully within the industry. Although the Authority has reached the decision on the basis of all the materials contained in the Final Amendment Report, the Authority considers that the report should describe the differences between all alternative options much more clearly and explain and address the specific issues raised in the industry consultation process in a more comprehensive and coherent manner. We encourage NGET to take these comments into account in their ongoing work managing the industry code modification processes.

Decision notice

In accordance with Standard Condition C10 of NGET's Transmission Licence, the Authority, hereby directs that Consultation Alternative Amendment 2 (CAA2) of the CUSC amendment proposal CAP149: Transmission Entry Capacity with Restricted Rights be made and implemented.

Steve Smith
Managing Director, Networks

Signed on behalf of the Authority and authorised for that purpose.