

Impact assessment on CMP201 - proposal to remove balancing charges from generators

Consultation

Publication date: 8 November 2013

Response deadline: 16 January 2014

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Overview:

National Grid Electricity Transmission plc (NGET) is the System Operator of the GB electricity transmission system. NGET currently recovers the cost of carrying out these balancing activities through Balancing Services Use of System (BSUoS) charges from generators and suppliers, in equal share.

In our European trading partner countries the equivalent charges are typically charged to suppliers only, which means that the wholesale price of electricity generated in the EU does not include a BSUoS-equivalent cost.

This impact assessment considers a proposal (CMP201) from industry to remove BSUoS charges from generators and recover all balancing costs from suppliers.

This document assesses the likely impacts of the proposed change and sets out our current **"minded to reject"** position. We are seeking views from stakeholders and other interested parties to further inform our thinking. Following the consultation and our consideration of responses, we intend to make our final decision on whether to approve or reject the proposal early next year.

Context

The National Electricity Transmission System (NETS) is the high-voltage network carrying electricity from generation sources (eg power stations, wind farms) to the lower voltage distribution network, which then distributes the energy to consumers.

National Grid Electricity Transmission plc (NGET) is the licensed System Operator for the transmission system. One of its key responsibilities is to ensure that electricity supply and demand stay in balance, so that the system remains within safe technical and operating limits. NGET recovers the cost of carrying out these balancing activities through Balancing Services Use of System (BSUoS) charges from generators and suppliers, in equal share. In our European trading partner countries the equivalent charges are typically charged to suppliers only.

NGET considers that the balancing charges applied to generators in GB distort trade between Member States. NGET therefore raised a modification proposal to the Connection and Use of System Code¹ (known as CMP201²) to change the existing arrangements for BSUoS charges³. Specifically, NGET propose to move away from splitting the charge 50:50 between generators and suppliers such that suppliers would pay all charges. This is intended to align aspects of the charging methodology in GB with the prevalent approach in the rest of the EU.

Associated documents

CMP201 Final CUSC Modification Report, 9 May 2013

Volume 1 <http://www.nationalgrid.com/NR/rdonlyres/A9603AAA-F513-416F-8DC0-6608546B3DC1/60434/CMP201SecondFMR30forAuthority.pdf>

Volume 2 <http://www.nationalgrid.com/NR/rdonlyres/6155878F-570A-436E-82B6-606A0D69B5E6/60435/CMP201FinalFMR40Volume2Responses.pdf>

CUSC CMP202: Revised treatment of BSUoS charges for lead parties of Interconnector BM Units, 15 August 2012

<http://www.ofgem.gov.uk/Licensing/ElecCodes/CUSC/Amend/Documents1/CMP202%20Decision%20Letter.pdf>

Authority decision to 'send back' CUSC modification proposal CMP201

<http://www.ofgem.gov.uk/Pages/MoreInformation.aspx?docid=85&refer=Licensing/ElecCodes/CUSC/Amend>

¹ The Connection and Use of System Code (CUSC) is an industry code that sets out the contractual framework for connecting to, and use of, the transmission system

² This is a proposal to change the CUSC, which is assessed by industry and then voted on by the CUSC Panel before being sent to Ofgem for decision.

³ All parties would still be liable for charges relating to their own imbalance.

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Executive Summary

Under current arrangements, the costs incurred by National Grid Electricity Transmission plc (NGET) in balancing the GB transmission system are recovered through Balancing Services Use of System (BSUoS) Charges. These costs are shared equally between generators and suppliers.

In other EU countries, the BSUoS-equivalent charges are generally paid by suppliers only. GB generators are concerned this disparity in charging arrangements is putting them at a competitive disadvantage relative to other EU generators. That is, there is a disparity in what is included in the wholesale electricity price offered to the market by generators based in GB and those based in the EU. The wholesale price offered by GB generators will include their share (50%) of the balancing costs incurred by the SO. However, a European-based generator does not pay balancing charges and would be able to offer a price that does not reflect those costs.

NGET raised a code modification proposal (CMP201) to remove BSUoS charges from generators, leaving suppliers paying the whole charge. The proposal is intended to level the playing field between generators based in GB and elsewhere in Europe. All parties would still be liable for charges relating to their own imbalance⁴.

Under the proposal, suppliers would pay the full BSUoS charge and generators would then be able to offer a lower, more competitive wholesale price to the market. Since BSUoS charges are ultimately passed through⁵ to the consumer (whether suppliers or generators pay them), this change of itself *should* have no impact on consumers. However, the consumers *are* affected. Due to effects on the supply of electricity in GB, the decrease in GB wholesale price is not equivalent to the reduction in generators' costs associated with the removal of BSUoS charges. Specifically, the reduction in a generators wholesale price increases demand from Europe and this in turn increases net export from GB to Europe across the interconnectors. In response to the increased demand for GB generation, more expensive marginal (carbon) generators will switch on to meet total demand – ultimately increasing the GB wholesale price.

As a result, while GB consumers see no change from different supplier/generator split arrangements, they are negatively affected by the effects on the GB wholesale price discussed above. NGET's modelling shows that this could result in costs to consumers in the region of £200m to £250m. This amounts to an estimated increase of between £2 and £2.50 on the average annual domestic consumer bill. Consumers in the rest of Europe may, on the other hand, benefit from lower wholesale prices as they will be able to switch to importing cheaper electricity from GB.

In the longer term, if investment responds to market signals, it is expected that the negative impact on consumers will reduce. This is because greater investment in GB generation will in time increase production, exerting a downward pressure on the wholesale price. However, the Final Modification Report does not provide sufficient quantitative evidence to substantiate this expectation. Without adequate offsetting investment, domestic consumer bills would remain £2 to £2.50 higher in each year following the implementation of the proposal.

⁴ Imbalance is the difference between contracted generation or consumption and the amount that was actually generated or consumed in each half hour trading period. Imbalances impose system operation costs.

⁵ Both generators and suppliers fully factor these volume-based charges into their market prices, so that ultimately they are paid by the consumer.

We are fully committed to an integrated European electricity market. We recognise that when considered in isolation, removing BSUoS charges from generators should promote more efficient trade between GB and European interconnected markets. However, there are significant uncertainties in the European market that could affect the benefits of this proposal, such as the outcome of a decision on market splitting⁶ and the future progression of the EU tarification⁷ workstream. Further, it is not proposed in the context of a holistic appraisal of issues impacting efficient trade between EU member states. For example, the impact of BSUoS charges on European trade may be overshadowed by other factors such as the carbon floor price and/or other country-specific taxes and levies on generation. Making this change will also result in the significant cost to all GB consumers noted above. In light of this, on balance, we consider that it is not appropriate to remove BSUoS charges from generators at this time. Hence the Authority is currently **minded to reject** the proposal.

This document marks the start of an eight week consultation period (with an allowance for the Christmas period) during which respondents are invited to provide feedback on our impact assessment and minded to position. The consultation ends on 16 January 2014. Details on how to respond to this consultation, including contact details for any queries can be found in Appendix 1. It also gives a complete list of the questions which we are specifically seeking respondents' views on, although we welcome respondents' views on any aspect of this document.

The Authority will consider the responses to this consultation before reaching its final decision on whether to accept or reject the proposal. The Authority expects to reach a final decision in the first quarter of 2014.

⁶ European Target Model requires each country to make a decision as to whether to introduce market splitting. A nodal pricing version of market splitting for example would remove the need for some aspects of BSUoS.
(https://www.entsoe.eu/fileadmin/user_upload/library/resources/CACM/120927_CACM_Network_Code_FINAL.pdf)

⁷For further detail on tarification, please see *Commission Regulation (EU) No 838/2010 on laying down guidelines relating to the inter-transmission system operator compensation mechanism and a common regulatory approach to transmission charging* and THINK report on *EU Involvement in Electricity and Natural Gas Transmission Grid Tarification*.

The links, respectively, are:

- <http://eurlex.europa.eu/LexUriServ/LexUriServ.do?uri=OJ:L:2010:250:0005:0011:EN:PDF>
- <http://www.eui.eu/Projects/THINK/Documents/Thinktopic/ThinkTopic6.pdf>

1. Introduction and background

Chapter Summary

In this chapter we set out the background to the proposal and outline the legal and assessment frameworks which will underpin our decision. We also outline the structure of the rest of the document.

Introduction and background

1.1. This document sets out the impacts of a proposal to amend the Use of System charging methodology set out in the Connection and Use of System Code (CUSC). The proposal (CMP201) relates to the methodology used to calculate Balancing Services Use of System charges (BSUoS). Specifically, a change to who pays for BSUoS charges between generators and suppliers is proposed. This impact assessment⁸ has been carried out in line with the requirements under section 5A of the Utilities Act.

1.2. Alongside our assessment of impacts, we include our “minded to” position. This document marks the start of an eight-week consultation period (ending 16 January 2014) during which **respondents are invited to provide feedback on our impact assessment and minded to reject position.**

1.3. Following the consultation and our consideration of responses, we plan to make our final decision on whether to approve or reject the proposal early next year.

Balancing the GB Transmission System

1.4. As System Operator (SO), National Grid Electricity Transmission plc (NGET) is required to ensure that electricity supply and demand stay in balance, so that the transmission system remains within safe technical and operating limits. To do this, NGET takes action to balance the system in real time⁹, and carries out the procurement and utilisation of Balancing Services¹⁰.

1.5. Under the terms of its electricity transmission licence¹¹ (the Licence), NGET is allowed to recover the costs associated with its SO balancing activities through the BSUoS charge. BSUoS charges are calculated ex-post, based on the volume of energy a user takes from, or supplies to, the transmission system during each half-hour Settlement Period. That is, users can not accurately forecast the BSUoS charges they would face. Currently, BSUoS charges are split between generators and suppliers on a 50:50 basis. Parties are also liable for charges relating to their own imbalances.

1.6. BSUoS charges cover the following SO costs:

- the total costs of the Balancing Mechanism

⁸ This Impact Assessment has been carried out in line with Ofgem’s new Impact Assessment Guidance, published 1 October 2013. More detail on our website: <https://www.ofgem.gov.uk/publications-and-updates/impact-assessment-guidance>

⁹ Real time system balancing actions involve coordinating and directing the flow of electricity onto and over the National Electricity Transmission System (NETS).

¹⁰ See Appendix 4 for detailed explanation of Balancing Services

¹¹ <https://epr.ofgem.gov.uk/Content/Documents/National%20Grid%20Electricity%20Transmission%20Plc%20-%20Special%20Conditions%20-%20Current%20Version.pdf>

- total Balancing Services Contract costs
- payments/receipts from National Grid incentive schemes
- internal costs of operating the system
- costs associated with contracting for and developing Balancing Services
- any adjustments required
- costs invoiced to NGET associated with manifest errors and special provisions.

Balancing charges at Interconnectors: CMP202

1.7. Until recently, BSUoS charges were also levied on interconnector flows – import flows were charged as generators, and export flows as suppliers. In December 2011, NGET raised a CUSC modification proposal to remove BSUoS charges from interconnector flows (CMP202).

1.8. The modification was raised due to the Third Package Electricity Regulation 714/2009¹², which defines an interconnector as a transmission line, part of the overall transmission infrastructure facilitating the wider market, and therefore not an entity that can be subject to BSUoS charges.

1.9. On 15 August 2012 the Authority approved the proposal¹³.

Perceived deficiencies in CUSC balancing arrangements

1.10. In our European trading partner countries, it is more common for the equivalent balancing costs (covered by BSUoS in GB) to be paid largely by suppliers rather than generators.

1.11. This leads to a disparity in what is included in the wholesale electricity price (ie reflecting the costs associated with producing electricity offered to the market by generators based in GB and those based in the EU. The wholesale price offered by GB generators will include their share (50%) of the balancing costs incurred by the SO. However, a European-based generator that does not pay balancing charges would be able to offer a price that does not reflect those costs in the same way.

1.12. Figure 1 below illustrates the potential wholesale price distortion, all other things being equal, due to the different BSUoS charging arrangements in GB and the EU.

1.13. It represents three competing generators, one of which is based in GB and therefore subject to the BSUoS charges and the other two are based in the EU - where they do not face these charges.

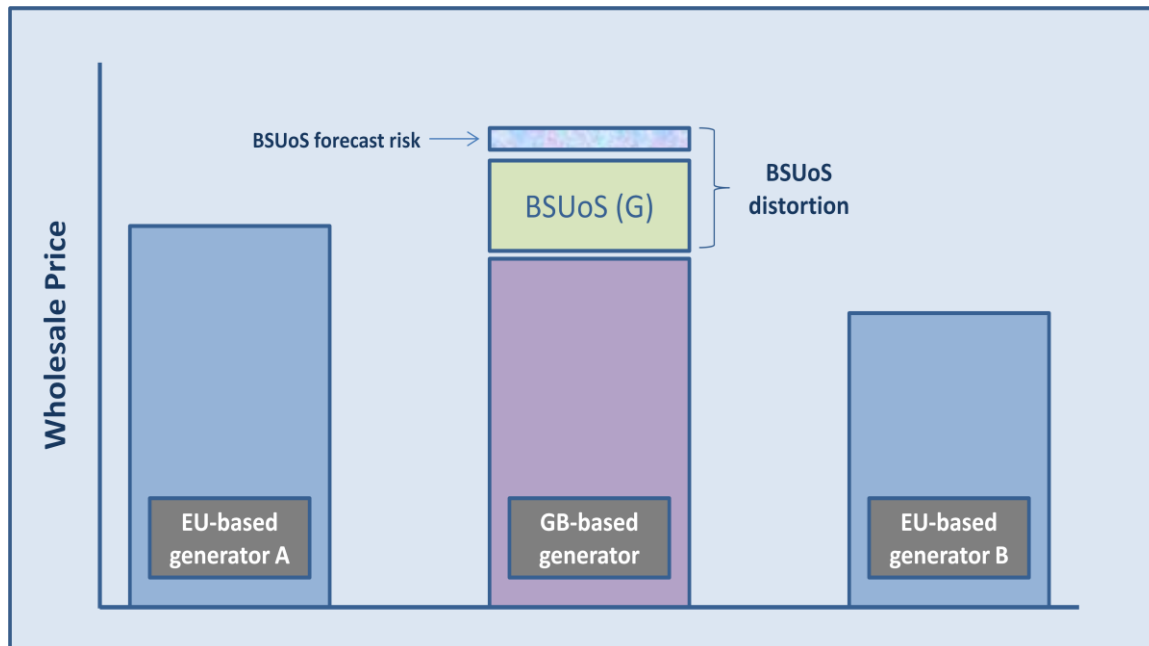
1.14. This simplified illustration demonstrates a situation where a GB generator is placed at a competitive disadvantage by the application of BSUoS charges. Without BSUoS, the GB-based generator would be the second most competitive producer; but once the BSUoS cost is factored into its wholesale price, the GB generator becomes the least competitive. As BSUoS is an ex-post charge, the wholesale price reflects an element of forecast risk, exacerbating the disparity.

¹² Electricity Regulation (EC) No 714/2009 of the European Parliament and of the Council of 13 July 2009 on conditions for access to the network for cross-border exchanges in electricity and repealing Regulation (EC) No 1228/2003 are available at:

<http://eur-lex.europa.eu/LexUriServ/LexUriServ.do?uri=OJ:L:2009:211:0015:0035:EN:PDF>

¹³ <http://www.ofgem.gov.uk/Licensing/ElecCodes/CUSC/Amend/Documents1/CMP202%20Decision%20Letter.pdf>

Figure 1: Impact of BSUoS on electricity wholesale price



Note: not to scale, for illustration purposes only

The proposal

1.15. GB generators are concerned that the GB approach to the recovery of BSUoS-equivalent costs through BSUoS charges is putting them at a competitive disadvantage relative to EU-based generators. This concern intensified following the removal of balancing charges from interconnector users in line with European Third Package requirements (as discussed in paragraph 1.7 to 1.9 above).

1.16. NGET raised CMP201 as a means of aligning this particular aspect of the GB charging methodology with the arrangements prevalent in other EU countries. The proposer (NGET) considered that the removal of balancing charges from GB generators would address this inconsistency and create a more level playing field for competition between GB and European generators¹⁴.

Legal and Assessment framework

1.17. The Authority must assess the proposal against the relevant **objectives set out in the CUSC** Standard Condition C5 paragraph 5 of NGET's Licence. In particular, the Authority must consider whether the proposal better facilitates the achievement of these objectives compared to the current methodology. The relevant objectives are:

- a) That compliance with the use of system charging methodology **facilitates effective competition** in the generation and supply of electricity and (so far as is consistent therewith) facilitates competition in the sale, distribution and purchase of electricity.
- b) That compliance with the use of system charging methodology results in **charges which reflect costs**, as far as is reasonably practicable (excluding any payments between transmission licensees which are made under and in

¹⁴ All parties would still be liable for charges relating to their own imbalance (see glossary).

accordance with the SO-TO Code) incurred by transmission licensees in their transmission businesses and which are compatible with standard condition C26 (Requirements of a connect and manage connection).

- c) That, so far as is consistent with sub-paragraphs (a) and (b), the use of system charging methodology, as far as is reasonably practicable, properly **takes account of the developments** in transmission licensees' transmission businesses.

1.18. The Authority must also consider whether the proposal is consistent with its **principal objective** (protecting the interests of future and existing consumers) **and statutory duties**, including those arising under European law, and having regard to our Social and Environmental Guidance¹⁵.

Impact Assessment

1.19. This impact assessment has been carried out in line with the requirements under section 5A of the Utilities Act.

1.20. We consider CMP201 to be "important" for the purposes of Section 5A of the Utilities Act 2000, on the grounds that the changes proposed represent a considerable change to the structure of NGET's use of system charging methodology and has a significant impact on electricity market participants, including GB electricity consumers.

Progress to Date

1.21. CMP201 was raised at the CUSC Panel (The Panel) on 8 December 2011. The Panel set up a CUSC Workgroup to consider the proposal. Following two rounds of industry consultation, and a Panel discussion on 28 September 2012, the Final Modification Report (FMR) was submitted to the Authority on 10 October 2012¹⁶.

1.22. We reviewed the FMR, and decided that we could not properly consult, or form an opinion on, the proposal as submitted. In particular, we identified deficiencies in the analysis, and the way the results of that analysis were used in the assessment of the proposal. The proposal was sent back to the industry for further work¹⁷.

1.23. The CUSC CMP201 Workgroup reconvened to address the issues raised, and consulted again. Following consideration by the Panel on 26 April 2013, the revised Final Modification Report (FMR) was submitted to the Authority on 9 May 2013.

1.24. This impact assessment consultation considers CMP201 as set out in the latest FMR.

Structure of the document

1.25. The remainder of the document is structured as follows:

- Chapter 2 sets out in more detail the change proposed under CMP201
- Chapter 3 outlines our assessment of the impact of the proposals

¹⁵<http://www.ofgem.gov.uk/About%20us/Documents1/file37517.pdf>

¹⁶<http://www.nationalgrid.com/NR/rdonlyres/9A121AED-841E-49CF-92D8-F112E30143B0/56922/Final10.pdf>

¹⁷<http://www.ofgem.gov.uk/Licensing/ElecCodes/CUSC/Amend/Documents1/Send%20-back%20letter.pdf>

- Chapter 4 contains our assessment of the Original proposal and Workgroup Alternative CUSC Modification proposals against the Relevant charging objectives and our statutory objectives and sets out our minded to position
- Chapter 5 outlines the next steps in the process.

2. The proposal

Chapter Summary

In this chapter we describe the CMP201 proposal and the two alternatives submitted to the Authority for a decision.

The proposal(s)

2.1. Currently, all CUSC parties acting as generators and/or suppliers are liable for BSUoS charges. The amount they pay is calculated ex-post, based on their share of the total amount of energy taken from, or supplied to, the transmission system in each half hour Settlement Period. That is, users can not accurately forecast the BSUoS charges they would face. The cost of balancing the system is recovered from generators and suppliers in equal share.

2.2. The CMP201 proposal would change the arrangements for BSUoS charges: generators would become exempt from such charges, and NGET would seek to recover the costs associated with its SO balancing activities from suppliers only. This is intended to align the GB arrangements with the prevalent approach in the rest of Europe, where generation is generally not liable for balancing charges. All parties would still be liable for charges relating to their own imbalance.

Implementation period and CUSC Alternatives

2.3. CMP201 will transfer BSUoS charges from generators to suppliers. Under current arrangements, generators pass on their share of BSUoS charge to suppliers (through the wholesale price); suppliers then pass the cost to the consumer (through the retail price).

2.4. Existing contracts between generators and suppliers are commonly based on a forward wholesale electricity price, which reflects a forecast of BSUoS charges.

2.5. If CMP201 is implemented, some of these contracts will not be adjusted immediately to reflect changes in BSUoS charges – the generator's BSUoS forecast will still be priced into the contract. This leads to creation of winners (generators) and losers (suppliers) in the transition period, before contracts can adjust. Similarly, it is not clear how much of this increase in cost the supplier can pass on to the consumer in the short run.

2.6. CMP201 implementation options were chosen to ensure that the transfer of 50% of the BSUoS charges from generators to suppliers was adequately reflected in pricing structures and contractual arrangements of both generators and suppliers. These were developed by the Workgroup (WG) to minimise the potential for windfall gains and losses amongst the industry participants affected by the change.

2.7. The three implementation periods selected (2016/2017/2019) take into account the time it would take for long term contracts without pass-throughs or re-openers to be amended to reflect the new BSUoS arrangements. Given the typical length of contracts of one to two years¹⁸, the lower bound on implementation was set at two years. CMP201 proposes that the implementation of new arrangements coincides with the start of the charging year on 1 April.

2.8. CMP201 Original states that implementation should take place:

¹⁸ According to the Final Modification Report

- Two full charging years after a decision is made (ie if a decision is made before 31 March 2014 implementation would take place on 1 April 2016.)

2.9. A number of alternatives were discussed by the WG (including phased implementation). Two alternatives to the 'Original' (Workgroup Alternative CUSC Modifications or WACMs) were progressed:

- WACM1 (3 year implementation period): The change would be implemented three full charging years after a decision is made.
- WACM2 (5 year implementation period): The change would be implemented five full charging years after a decision is made.

2.10. Table 1 below provides a summary of the implementation periods under the original proposal and the alternatives. *(Note – these dates are illustrative and are not intended to suggest a particular timeframe for a decision).*

Table 1: Indicative implementation dates

	Implementation date		
	Original proposal	WACM1	WACM2
If a decision is made on or before 31 March 2014	1 April 2016	1 April 2017	1 April 2019

The Panel's view

2.11. At the CUSC Panel meeting on 26 April 2013 a vote was taken on the CMP201 proposal and its alternatives. The Panel voted by majority that CMP201 (both the original and the alternatives) better met the Relevant objectives and that CMP201 should be implemented. A majority of the Panel expressed a preference for the original proposal (ie with the 2 year implementation period). The Panel vote is summarised in Table 2.

Table 2: Summary of CUSC Panel vote on CMP201

	Does the proposal better meet the Relevant Objective?				Which option best meets these objectives?
	(a)	(b)	(c)	Overall	
Baseline (ie no change)					2
Original	Yes = 7 No = 2	Neutral = 9	Yes = 5 Neutral = 4	Yes = 7 No = 2	7
WACM1	Yes = 7 No = 2	Neutral = 9	Yes = 5 Neutral = 4	Yes = 7 No = 2	0
WACM2	Yes = 5 No = 3 Neutral = 1	Neutral = 9	Yes = 3 Neutral = 6	Yes = 5 No = 3 Neutral = 1	0

Key: CUSC objectives: (a) – competition, (b) – cost reflectivity, (c) – business development. See paragraph 1.12 for full a list of CUSC objectives

3. Impact of CMP201

Chapter Summary

In this chapter we set out the possible impacts of the proposal to remove BSUoS from generators. We focus on the impact on consumers, competition and sustainable development.

Question box

Question 1: Do respondents consider that we have identified the relevant impacts of the CMP201 proposal?

Question 2: Do respondents have any quantitative or qualitative evidence on the likelihood of additional investment in generation that would offset the relative increase in wholesale prices?

Question 3: Do respondents have any further evidence on the effect of CMP201 on supplier credit risk.

Introduction

3.1. This section sets out the *impacts* of the proposal to remove BSUoS charges from generators. The first section considers the impacts qualitatively; the second considers them quantitatively. The last section addresses the impacts of CMP201 taking into account the interdependency between BSUoS charges and the Residual Cashflow Reallocation Cashflow (RCRC) arrangements.

3.2. The quantitative effects of the proposal have been modelled by NGET. We have reviewed the model and underlying assumptions, which we consider reasonable. The modelling is limited to providing an indication of the likely effects, rather than a precise numerical impact.

3.3. We discuss *our assessment* of the impacts of CMP201 (based on NGET's analysis) in the "Initial Assessment" section of this document, in Chapter 4.

Qualitative impacts

3.4. We have considered the near and longer term qualitative impacts of the proposal.

Near term impacts

3.5. The impacts of the proposal (from a GB perspective) on GB generators, GB consumers, GB suppliers and European Trade are discussed below. It is important to note at the outset that BSUoS charges fall into the category of "pass-through" costs. That is, both generators and suppliers fully factor these volume-based charges into their prices, so that ultimately they are paid by the consumer.

The impact of CMP201 on **GB generators** is largely positive. Their profit margins would increase as a result of the combined effect of the following:

- Generators should reflect the BSUoS cost reduction in their price structure, and will then be able to offer a lower, more competitive wholesale price to the market. The lower wholesale price will boost demand from Europe (via interconnectors) – ie GB generators will export higher volumes of energy they produce.

- Since there is an increase in net exports and GB demand for energy remains the same, (effectively meaning increased demand in GB) more expensive marginal (carbon) generators¹⁹ come on line, increasing the supply to meet the demand, increasing the wholesale price. Therefore, whilst the removal of BSUoS charges from generators exerts a downward pressure on the GB wholesale price, the demand for marginal generation offsets that effect to some extent.

3.6. Under the proposal, **GB suppliers** would pay all BSUoS charges. Potential consequences for suppliers are summarised below.

- Suppliers may be locked into existing contractual arrangements, preventing them from passing through the BSUoS cost to consumers.
- Suppliers and generators may face different risks from BSUoS volatility. This is based on the proposition that some generators benefit from payments that make up the BSUoS via constraint revenues and so their risk premium may be lower; by transferring BSUoS costs to suppliers, who are less able to access constraint revenues, the overall risk premium may increase.

3.7. The near term impact of the proposal on **GB consumers** is negative. GB consumers see no change from the change in supplier/generator split, but are negatively affected by that fact that the GB wholesale price does not decrease by as much as expected, due to increased net exports. See the quantitative section below for the effect on bills.

3.8. Removing BSUoS costs from GB generators should improve the efficiency of trade in the EU as a whole; GB generators would be able to compete on a more level playing field relative to generators based in mainland Europe. However, as we discuss in more detail in Section 4, we have concerns that uncertainties and distortions could impact on this benefit being realised.

Longer term impacts

3.9. As a result of the impact of removing BSUoS costs from GB generators, we would expect there to be additional impacts on GB generators and GB consumers *in the longer term*:

- GB generators: Subsequent *higher returns* (profit margins) on GB generation should encourage greater investment in GB generation – either in the form of new plant build (longer time lag), or delayed closure/refurbishment of the existing infrastructure (shorter time lag).
- GB consumers: The increased investment would augment the GB generation base, exerting competitive pressure on GB wholesale electricity price to mitigate some of the detrimental effect on GB consumers. However, if, in the worst case scenario, no such offsetting investment occurs, consumers' bills would remain higher in each and every year following the implementation of this proposal.

Quantitative impacts

3.10. Additional detail on the quantitative analysis carried out by NGET can be found in the Final Modification Report (FMR), in particular at Annex 13.

¹⁹ The cheapest available stations are assumed to meet demand. Increasing demand will mean that more expensive plant is required to meet demand. The most expensive / marginal generator used to meet demand is the plant setting the wholesale price for the GB system

3.11. NGET's modelling aimed to estimate the scale of the impact of CMP201 on the costs and benefits to generators and consumers. This modelling looked at three markets (GB, France and the Netherlands²⁰) and was based on 2010/11 and 2011/12 data. NGET also performed some calculations outside the model, in particular on increased investment – this is discussed later in this Section.

Figure 2: NGET model at a glance

Short-term impact	<p>3 interconnected markets: GB, France, Netherlands. Static optimisation – i.e. modelling Year 1 impact only</p> <p><u>Data:</u> time series, 2010/11, 2011/12</p> <p><u>Variables:</u></p> <ul style="list-style-type: none"> • Generation price stack • Demand data • Different levels of BSUoS <p><u>Output:</u> Excel/"Solver" model determines optimal market positions given the constraints on interconnectors. MW optimised amount of generation in each market such that it meets each country's demand.</p> <p><u>Assumptions:</u></p> <ul style="list-style-type: none"> • Only 1 variable – BSUoS changes; all other factors constant • Interconnectors are available all the time, capacities the same in both directions, there is no cost in using interconnectors (no losses/ capacity prices charges)
Longer term modelling	<p>"Longer term" effect of new generation entering the market modelled by introducing additional 500 MW and 1000 MW of generation.</p> <p><u>Assumptions:</u></p> <ul style="list-style-type: none"> • base-load generation price/mid-merit generation plant price • 2012 Electricity Ten Year Statement <ul style="list-style-type: none"> • Demand flat/marginally declining • 40% of consented plant progressing to construction • Decrease in coal generation amounting to 5.5 GW over the period 2012-2032, reflecting known Large Combustion Plant Directive (LCPD) closures
Impact of Coal and Gas prices	<p>Historic gas and coal prices (2010/11, 2011/12) were examined to determine impact from merit order changes between two types of plant.</p>

3.12. The analysis looked at the immediate, short term impacts of removing BSUoS charges from generators - subsequent dynamic impacts in terms of new generation entry or plant life extensions, or changes in the generation mix, were not modelled. The purpose was to give a better indication of the direction and scale of the potential impact, rather than to dynamically model the impact on the market over time. For this proposal, the latter was seen as too complex, relied on too many uncertain assumptions and it was unclear it would have additional benefits.

²⁰ The countries with which GB currently has its most significant interconnection links and ones for which more data exists

*Impact on generators and consumers***Table 3: Summary of one year impact of CMP201 for a pre-modification BSUoS charge of £1.50/MWh²¹ on generators**

	Consumers	Generators
GB	(£237m)	£242m
Other EU	£249m	(£257m)
Total EU	£12m	(£15m)

Note: Adding together the two calculations does not provide an overall GB/EU market benefit/cost value²².

3.13. NGET showed that the results of the model are sensitive to changes in the assumptions of the merit order²³. That is, impacts will differ depending on reducing the price of coal relative to gas. NGET ran the model for 2011/12 with a £1.53/MWh²⁴ BSUoS charge and where, on average, coal and gas prices favoured running coal plant 5% more than the previous year. The change to fuel costs has a large impact, due to the interaction of its impact on the GB merit order relative to those in France and Netherlands – the latter are more coal dominated.

Table 4: Summary of one year impact of CMP201 for a pre-modification BSUoS charge of £1.53/MWh on generators, coal running 5% more than gas

	Consumers	Generators
GB	(£178m)	£186m

3.14. NGET also modelled different values of pre-modification generator BSUoS charges ranging from £1.1/MWh to £1.75/MWh. Increases in consumer costs and increases in generator profit margins as a result of CMP201 changed in proportion with changing BSUoS.

3.15. As can be seen, the modelled Year 1 negative impact on consumers from the two scenarios²⁵ in the tables above ranges from £178m to £237m. Therefore, we consider that consumer impact in the region of £200m to £250m is a reasonable approximation. This is equivalent to a price increase for consumers in the range of £0.6/MWh - £0.8/MWh. For domestic consumers this would mean facing an increase in their average annual household bill in the region of £2-£2.50²⁶.

²¹ £1.50/MWh was the average BSUoS charge for generators in 2010/11.

²² In the FMR, NGET explain why the generator surplus and consumer cost calculations are not directly comparable, and the totals cannot be summed by row. The generator surplus is a proxy for profit – ie the price a commodity is sold at minus cost. The consumer cost is a measure of consumer surplus in the Marshallian sense – ie the difference between what a consumer is willing to pay for a commodity and what he/she actually pays. Adding together the two calculations does not provide an overall GB/EU market benefit/cost value.

²³ Merit order is a method of modelling the electricity market by ranking power stations in order of increasing variable cost. The cheapest available stations are selected to meet demand

²⁴ Actual BSUoS level was £1.50 in 2010/11, £1.53 in 2011/12.

²⁵ These scenarios are based on the average BSUoS charges of ~£1.50/MWh.

²⁶ This is based on 317,575 GWh 2012 electricity consumption and an average domestic consumption of 3,200 kWh.

3.16. As noted above, the model is static. If the impact of CMP201 is limited to the short-term effects described above, consumer bills will remain £2-£2.50 higher in every year following the implementation of the proposal.

3.17. However, in reality, the consumer bills are also influenced by dynamic developments, such as new investment. NGET performed some calculations outside the model to estimate this potential impact, as discussed below.

Impact on new investment

3.18. As noted in 3.9 to the extent that the implementation of CMP201 would result in increased GB generator returns (profit margins) as indicated by NGET's model, new investment should arise.

3.19. The Workgroup estimated that between 500MW and 1GW of additional *mid-ranking*²⁷ capacity would need to become available, following the implementation of CMP201, in order for the short term negative impact on consumers to be offset. This additional generation could come from delays in plant closure, the refurbishment of existing plant to increase capacity and/or new generation sited in GB. The length of time that it might take for this additional capacity to materialise would vary – delayed closure could be almost immediate but new generation could take more than five years to be realised.

3.20. The Workgroup (WG) believe that, assuming the incentives work as expected, this level of additional generation is technically achievable within the timescales for the implementation of this proposal. Their view is based on NGET's recently published 2012 Electricity Ten Year Statement (ETYS)²⁸. ETYS forecasts show demand as relatively flat/declining up to 2017, whilst the forecasts of consented plant levels increase significantly in 2013 and beyond. However, the WG also noted that other factors, such as Government policies, market arrangements on both sides of interconnectors and investor sentiment, will influence investment decisions. Ultimately, this means that the scale of investment likely to be realised is uncertain.

3.21. However, our view is that the FMR does not provide sufficient quantitative evidence to substantiate this expectation

3.22. It should be also noted that, by extension of the principle, if other EU states adopted the GB position (ie charging BSUoS to both generators and suppliers), the impact on GB consumers would be broadly similar. That is, if BSUoS is imposed on EU generators currently exporting to GB, they will pass that additional cost to GB consumers through higher wholesale import prices (unless they choose to absorb the cost, rather than pass it on).

Supplier credit risk

3.23. Under the current CUSC arrangements, generators and suppliers are required to provide credit cover for one month of BSUoS charges.

3.24. A direct consequence of CMP201 is increased BSUoS charges for suppliers. Increased financial payments may require suppliers to raise their credit holdings respectively. Smaller suppliers may find it more difficult to change their credit arrangements compared to larger ones – which may result in a negative impact on competition, owing to reduced competitiveness of the smaller suppliers.

²⁷Cheaper than expensive marginal carbon generators that would initially come online in response to increased wholesale prices caused by increased GB exports

²⁸ http://www.nationalgrid.com/NR/rdonlyres/DF56DC3B-13D7-4B19-9DFB-6E1B971C43F6/57770/10761_NG_ElectricityTenYearStatement_LR.pdf

3.25. NGET reviewed the current holding of credit cover to quantify the extent of any credit cover changes. The results of this are summarised in Annex 10 of the FMR.

3.26. Based on current levels of credit only four parties would be adversely affected; none was a small supplier. Of those four suppliers, one may acquire sufficient additional cover through the payment history mechanism in a few months. The four affected parties identified all related to companies of significant size, two of which provide Parent Company Guarantees leaving potentially only one supplier required to increase their credit cover with NGET (noting it may reduce in other areas).

3.27. Furthermore, if CMP201 were implemented within proposed implementation timescales, any affected party would have sufficient time to arrange for adequate credit cover.

3.28. Our initial view is therefore that CMP201 is likely to have a neutral impact on supplier credit risk however ***we request parties to provide further evidence on this matter.***

CMP201 impact in the context of interaction with RCRC:

3.29. As described earlier, BSUoS charges are used to recover the costs incurred by the SO in balancing the system. These costs include energy balancing costs (i.e. from resolving imbalances created by Parties not balancing their positions) and system balancing costs (incurred through other activities). Under the Balancing and Settlement Code (BSC) arrangements Parties are charged for any imbalance they create (by buying/selling more/less energy than they are contracted to). The BSC requires that the net position of these payments across the system is zero, therefore any residual or shortfall is settled through the Residual Cashflow Reallocation Cashflow (RCRC) arrangements.

3.30. Both RCRC charges/payments and BSUoS charges relate to imbalances on the system and, as such, are closely linked. Under the current market arrangements Parties who pay BSUoS charges are also subject to arrangements in the BSC.

3.31. Some parties were of the view that, if BSUoS charges are removed from generators, this would raise inconsistencies with the treatment of RCRC, which would not be appropriate.

3.32. In recognition of this issue, NGET raised a BSC modification proposal, P286²⁹ to address the possible interaction with the RCRC arrangements under the BSC. P286 proposes that generation BM Units should no longer be subject to RCRC charges/payments, if CMP201 is approved.

3.33. We recognise the interdependency of policy decisions on CMP201 and P286. The remainder of this section considers the net impact of approving both proposals, CMP201 and P286.

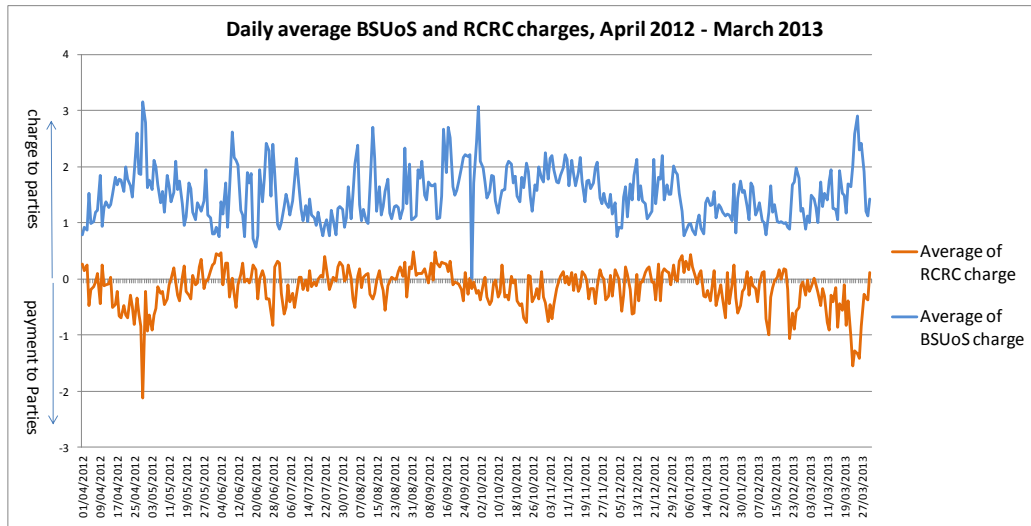
3.34. On occasions, when RCRC is in the opposite direction to BSUoS (ie a payment to parties) the impact of the two proposals on consumers would be less than the impact of CMP201 alone. However, in recent years, RCRC has been increasingly negative, possibly as a consequence of wind “spilling” causing more generation relative to demand than on average. When RCRC is a charge, ie negative in the same direction as BSUoS, the impact of the two proposals on consumers would be more than the impact of CMP201 alone.

²⁹ <http://www.elexon.co.uk/change/modifications/>

3.35. As described above, RCRC can be considered as related to the imbalance cost element recovered within BSUoS charges, and currently all Parties are exposed to both. As such, we have also considered the impact of accepting P286 and CMP201, moving both BSUoS and RCRC from generators to suppliers.

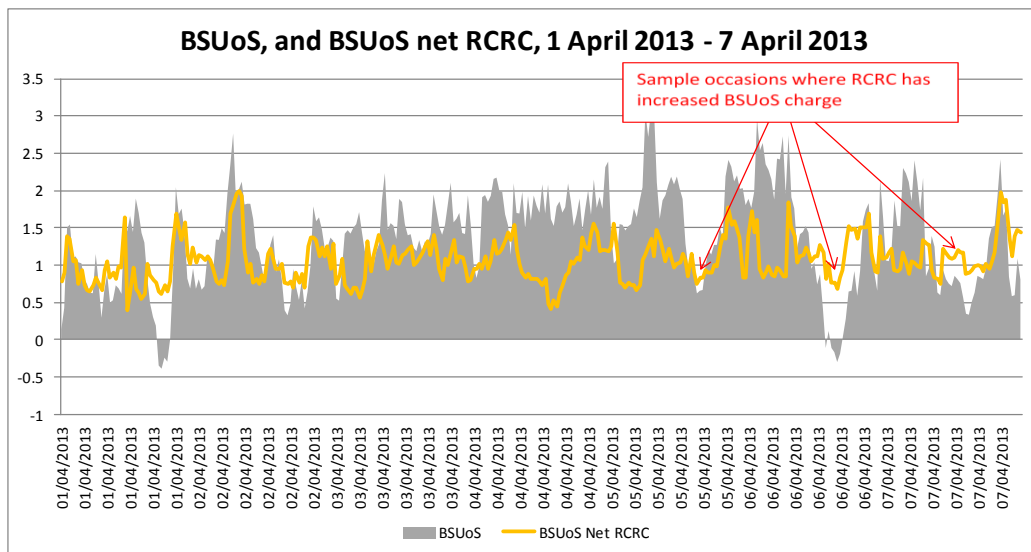
3.36. Figure below shows average daily RCRC and BSUoS for 2012/13. As can be seen, in general, BSUoS and RCRC follow a similar pattern and are in opposite directions. However, there are many instances where RCRC is no longer paid to parties but is a charge and hence in the same direction as BSUoS.

Figure 3: Daily average BSUoS and RCRC in 2012/13



3.37. Figure below shows BSUoS and BSUoS net of RCRC for a week in April 2013. As can be seen RCRC tends to reduce the level of BSUoS and hence would reduce the impact of CMP201 on consumers. However, as explained above, there are occasions where RCRC would increase the BSUoS charge seen by parties.

Figure 4: BSUoS and BSUoS net RCRC from 1-7 April 2013



3.38. The table below shows the maximum, minimum and average BSUoS and RCRC over the period. RCRC is negative when BSUoS is positive (approximately 49% of the time). However, when RCRC is a charge, it tends to be smaller in magnitude than when it is a payment to parties, as can be seen from figures 3 and 4 above.

Table 5: Maximum, minimum and average BSUoS and RCRC over the period

	BSUoS (+ve = charge)	RCRC (+ve = charge)
Maximum	£8.56/MWh	£1.45/MWh
Minimum	-£0.22/MWh	-£8.68/MWh
Average	£1.51/MWh	-£0.16/MWh

3.39. Our initial view is that our decision on BSC Modification P286 is contingent on our decision on CMP201. If we were to approve CMP201 we would also likely approve P286.

4. Initial assessment

Chapter Summary

In this chapter we set out our initial assessment of the proposal against the relevant charging objectives and our statutory duties.

Question box

Question 4: Do respondents agree with our initial assessment of the proposal?

Question 5: Are there other relevant factors that respondents consider we should take into account?

Introduction

4.1. We must consider the merit of any proposed changes to charging methodologies against the Relevant Objectives set out at Standard Condition C5 paragraph 5 of the Electricity Transmission Licence (the Licence). The impact of approving or rejecting CMP201 is considered against the existing regulatory arrangements (the current code baseline). Our assessment is set out against the Authority's principal objective and statutory duties.

4.2. Our assessment includes consideration of the relevant modelling results, the views of the Panel, the views of respondents to the CUSC Workgroup (WG) consultation and CUSC code administrator's consultation and the Final Modification Report (FMR).

4.3. We have assessed the impacts of CMP201 using the quantitative analysis and additional qualitative analysis carried out by NGET (see previous Chapter: Impact of CMP201).

Our Assessment

4.4. Bearing in mind the quantitative analysis, we have assessed CMP201 qualitatively against the relevant code objectives, the Authority's principal objective and statutory duties. Please note that we have incorporated long term strategic and sustainability considerations into our assessment.

Relevant Objectives

4.5. The Relevant Objectives for changes to the Use of System charging methodology are set out in standard condition C5 of the Licence. These are:

- a) that compliance with the Use of System charging methodology facilitates effective **competition** in the generation and supply of electricity and (so far as is consistent therewith) facilitates **competition** in the sale, distribution and purchase of electricity;
- b) that compliance with the Use of System charging methodology results in charges which **reflect, as far as is reasonably practicable, the costs** (excluding any payments between transmission licensees which are made under and in accordance with the STC) incurred by transmission licensees in their transmission businesses and which are compatible with standard condition C26 (Requirements of a connect and manage connection);

- c) that, so far as is consistent with sub-paragraphs (a) and (b), the Use of System charging methodology, as far as is reasonably practicable, properly takes account of the **developments** in transmission licensees' transmission businesses.

4.6. The assessment against these objectives is set out in subsequent sections.

Competition – Relevant Objective (a)

4.7. Removing BSUoS costs from GB generators should improve the efficiency of trade in the EU, as import/export interconnector flows would closer reflect true differences in generation costs (since these are now on a more level playing field). In an open market, competition is increased if parties are able to trade on an equal basis, and higher profit margins should attract additional investment (provided no other barriers to entry exist). This proposal should therefore increase effective competition in generation.

4.8. Our assessment of CMP201 in relation to competition has included consideration of the following areas:

- Discrimination;
- Distributional impacts;
- Impact on generator siting (entry and exit decisions);
- Impact on the stability, complexity and predictability of the commercial and regulatory arrangements; and
- Existing market distortions.

Levelling the playing field with EU generators

4.9. Our initial view is that the removal of the BSUoS charges from generation allows GB generators to compete on a more equal footing with European generators. This is because the prevalent approach in the rest of Europe is that generation is generally not liable for the recovery of BSUoS-equivalent costs through a specific charge. However, we have concerns that the benefits of levelling the playing field will not be achieved due to existing market distortions (see later sections).

4.10. The WG also considered the impact of CMP201 on pumped storage, which uses more energy to pump (demand), than it generates. The conclusion was that, due to higher BSUoS in those periods it could be expected to generate, the avoided generation BSUoS charge is sufficiently high compared with the additional BSUoS cost incurred when pumping. Hence the impact should be broadly neutral. We agree with this view.

Distributional impacts

4.11. There is a transfer of costs from GB generators to suppliers. Since BSUoS remains a pass through charge, the BSUoS cost will ultimately be paid by consumers. Potential consequences for GB suppliers, GB generators and our views on these impacts are summarised below.

- Suppliers may be locked into existing contractual arrangements, preventing them from passing through the BSUoS cost to consumers. However, our initial view is that all of the proposed implementation timescales are such that any approval decision would permit sufficient time for the changes to be adequately reflected in pricing structures and contractual arrangements.
- Suppliers and generators may face different risks from BSUoS volatility. This is based on the proposition that some generators benefit from payments that make up the BSUoS costs incurred by the SO via constraint revenues and so their risk premium may be lower; by transferring BSUoS costs to

suppliers, who are less able to access constraint revenues, the overall risk premium may increase. Our initial view is that we do not consider there to be enough evidence that suppliers face more risk than generators. **We request additional evidence in relation to this issue. Please mark whether this is confidential.**

- Under the current CUSC arrangements, generators and suppliers have to provide credit cover for one month of BSUoS charges. The potential for increased credit risk required as a result of CMP201 could have a negative impact on smaller suppliers and hence competition. It was noted that overall credit risk to suppliers would include a reduction of credit that they post in wholesales trades³⁰ which could net off. Section 3 shows NGET's review of the extent of any credit cover changes. No small suppliers were affected and only one supplier would have to put up more credit cover. If CMP201 were implemented then, given the likely implementation timescales, any affected party would have sufficient time to arrange for sufficient credit cover. **We request additional evidence in relation to this issue in Chapter 3, Question 3). Please mark whether this is confidential.**
- Counter to this, it was noted that smaller generators would have reduced credit risk and therefore this could benefit competition.

4.12. In light of the above, our initial view is that the impact of redistribution of costs from GB generators to GB suppliers on competition in our domestic electricity market is neutral. **If parties have any additional information that shows this would not be the case we would be interested in this. Please identify whether the information provided is confidential.**

Impact on generator siting (entry and exit decisions)

4.13. Due to the increase in generator profit margins, we would expect there to be increased market entry or reduced closure relative to the current baseline although, as explained in Section 3, we are not certain of the extent of this.

4.14. It has been questioned as to whether suppliers have increased credit risk and increased risk of volatility. Were this to be the case, it would be more difficult for new entrants to the supply market, especially smaller companies.

4.15. As stated above, our initial view is that we do not consider there is enough evidence that suppliers face more volatility than generators who would pass the risk to suppliers in the wholesale market. Further, the requirement for additional credit cover does not appear to affect suppliers to a great extent.

As such, unless we receive further evidence we do not consider that this would create a barrier to entry for small suppliers.

Impact on the stability, complexity and predictability of the commercial and regulatory arrangements

4.16. It is our view that *charge volatility, complexity and predictability can affect competition. More stable, predictable charges reduce risk to generators and suppliers. This reduces barriers to entry and makes it easier for smaller generators and suppliers to compete with larger competitors.*

4.17. CMP201 does not change the size or volatility of the BSUoS charge, nor is the new method of distribution adding complexity. As such our view is that this proposal

³⁰ This information is not available as it is largely a bilateral arrangement between suppliers and generators

will not impact the stability, complexity and predictability of the commercial and regulatory arrangements.

Existing market distortions

4.18. There are existing distortions which have the potential to impact the efficient operation of the EU market to a much greater extent than the BSUoS charges, eg:

- Previous analysis has shown that interconnectors can flow against market price for up to 32% of the time. Whilst it is difficult to quantify, the impact of CMP201 may not be of the magnitude that NGET's static model indicates, due to this sub-optimal trading.
- Taxes (rather than SO charges) on generators in many European countries could have the same trade-distorting effect – eg Italy's windfall tax on profits of energy companies; Spain's 7% flat levy on traditional and renewable generation; the "carbon tax" on power generation in the UK and Netherlands' tax on certain generators.

4.19. Considering this context, we have concerns that the benefits of increased competition indicated by NGET's modelling results will not be realised to their full extent. Similarly, the subsequent impact on supplier and consumer costs may be diluted.

4.20. In light of the above, we conclude that CMP201 should better facilitate Relevant objective (a) by facilitating more effective competition in the market. However, we do have concerns as to whether the benefits would be fully realised.

Cost reflectivity – Relevant Objective (b)

4.21. BSUoS is not currently recovered on a locational basis (ie the level of charges does not reflect the SO costs incurred in relation to energy and balancing services procured in specific geographic areas or by specific generators/suppliers), and CMP201 does not affect this.

4.22. However, removing BSUoS from generation may preclude the possibility of making the charge cost reflective in future (ie reduced policy optionality).

4.23. Therefore, our view is that the proposal is neutral when assessed against Relevant objective (b) – ie that charges should reflect, as far as is reasonably practicable, the costs.

Taking account of Developments - Relevant Objective (c)

4.24. Whilst there is not a direct requirement of the Third Package to implement CMP201, it does reflect the changing nature of the generation market and work progressing relative to the increasing interconnection of the GB market.

4.25. Our initial view is that CMP201 marginally better facilitates the development of the transmission businesses across Europe.

Overall Assessment of the Relevant Objectives

4.26. We have assessed CMP201 and the different implementation dates against the relevant objectives of competition, cost reflectivity and reflecting developments in the transmission business. Our initial view is that all three of the options promote more effective competition relative to the status quo; all of them are neutral in relation to cost reflectivity relative to the Status Quo; and all of them to a marginal extent take account of our increasing interconnection and harmonisation with Europe.

4.27. However, we do have concerns that existing market distortions at European level will not allow the benefits of increased competition stemming from the proposals to be fully realised.

4.28. It is our initial view, for the reasons set out in the assessment above, that all CMP201 proposals would better facilitate the achievement of the relevant objectives *as a whole*, relative to the arrangements currently in place.

The Authority's statutory duties

4.29. This section considers whether approving the implementation of CMP201 better facilitates the Authority's principal objective relative to the status quo. The Authority's principal objective is to protect the interests of existing and future consumers, wherever appropriate, through the promotion of effective competition. These include their interests in the reduction of greenhouse gas emissions, security of supply and the requirements of applicable *European* Law as set out in Article 36(a) to (h) of the Electricity Directive.

4.30. The following sections set out our considerations in analysing the impacts of CMP201 against these duties:

- The reduction of greenhouse gas emissions
- Security of supply
- Furthering competition
- Consumer bill impacts
- Impact on vulnerable and protected customers
- European integration
- Impact on health and safety
- Best regulatory practice
- Risks and unintended consequences

Reduction of greenhouse gas emissions

4.31. The increased exports from GB are likely to be met by carbon generators in the short term, which would lead to an increase in GB greenhouse gas (GHG) emissions (in the short term). However, this increase in GHG emissions would not impact the UK's ability to meet our carbon budgets³¹. The longer term impact on GB carbon emissions depends on the future GB fuel mix, along with the fuel mix of interconnected countries.

Security of supply

4.32. We do not expect the proposal to have a negative impact on security of supply. If anything, an increase in generators' profits margins may attract more investment to GB.

Furthering competition

4.33. The impact of CMP201 on competition is discussed above in this chapter within the discussion on CUSC Relevant Objective (a) at paragraphs 4.7 to 4.20.

³¹ This is because emissions from large electricity generators are covered by the EU Emissions Trading Scheme (ETS). The EU ETS provides a cap on greenhouse gas emission at a Europe wide level. For carbon budget accounting purposes, the contribution of emissions covered by the EU ETS to the net UK carbon account is fixed.

Consumer bill impacts

4.34. When BSUoS is removed from generators and paid fully by suppliers, wholesale electricity prices do not fall by as much as the cost of BSUoS charges, due to increased net exports. The outcome of this is that GB consumers would be adversely affected by higher energy bills.

4.35. The quantitative analysis discussed in Section 3, implies an estimated increase to all consumer bills of £0.6/MWh to £0.8/MWh. This implies an increase of £2 to £2.50 per annum on *domestic* consumers' energy bills.

4.36. Increased investment suggested by NGET's analysis in Section 3, would augment the GB generation base, exerting competitive pressure on GB wholesale price to mitigate some of the detrimental effect on GB consumers. Whilst we consider that new investment is likely to reduce the negative impact on consumer bills, we do not think it likely that this impact would be fully offset (in the short to medium term). This is because it would require low/mid merit investment to fully offset the impact. Further, investment in generation is lumpy and dependent on many other variables, hence may not result in fully offset cost.

4.37. As further explained in Section 3, if P286³² was accepted, on occasions where RCRC is in the opposite direction to BSUoS (ie a payment to parties) the impact of the two proposals on consumers would be less than the impact of CMP201 alone. When RCRC is a charge, ie negative in the same direction as BSUoS, the impact of the two proposals on consumers would be more than the impact of CMP201 alone. This would increase the range of possible impacts on consumers.

4.38. Our initial view is that there is a detrimental effect on GB consumers which, even with increased investment in generation, may not be fully reversed and hence would be enduring. We have reservations about the lack of robust quantitative evidence to substantiate the expectation of additional investment, and recognise the need to acknowledge that other factors, such as Government policies, market arrangements on both sides of interconnectors and investor sentiment, will influence investment decisions. If, in the worst case scenario, no such offsetting investment occurs, consumers' bills would remain £2-£2.50 higher in each and every year following the implementation of this proposal

Impact on vulnerable and protected customers

4.39. The impact on consumer bills is discussed above. Having assessed this evidence, we do not initially consider that the CMP201 will have any additional, material impacts specific to vulnerable customers beyond what is already discussed above.

European integration

4.40. Removing market distortions should facilitate correct signals for efficient investment decisions, which ultimately would be expected to benefit consumers across the EU, by reducing prices.

4.41. Therefore, removing BSUoS from generators to reflect the situation in EU trading partner countries where the equivalent charges are typically levied on suppliers only, should increase integration with the European electricity market and thereby ultimately lead to consumer benefits.

4.42. However, there are uncertainties in the European market that could influence the impacts of this proposal. For example the work being undertaken on future

³² The proposal to mirror CMP201 BSUoS effect such that generators would also not pay/be paid RCRC.

tarification³³ is still progressing and the outcome of a decision on market splitting³⁴ is unknown. Moreover, BSUoS is only one of several existing distortions to European trade such as the carbon floor price or, for example, the Netherlands' tax on some generators. Further, this proposal has not been raised in the context of a holistic appraisal of issues impacting efficient trade between EU member states. All of these could impact on the benefits of greater European integration being realised.

4.43. Our initial view is that whilst on a standalone basis, this proposal looks like it would increase European integration, we are not convinced, nor has any substantiating evidence been provided, that this proposal will actually fully realise the intended benefits of greater EU integration.

Impact on health and safety

4.44. We have not identified any health and safety implications related to CMP201.

Best regulatory practice

4.45. The Authority has a duty to have regard of better regulation principles in its decision making. In our assessment we have considered whether the CMP201 proposal is proportionate.

4.46. In doing so, we have considered the distributional effects of the CMP201 proposals (see paragraphs 4.11 onwards). We do not consider the distributional effect of the transfer between generators and suppliers to be significant. However there is also the transfer between consumers and generators to consider. We recognise that the qualitative and quantitative evidence indicates that there will be detriments to consumers which may persist if investment does not occur.

4.47. We have also discussed how CMP201 fits within the wider context of European developments. Although this proposal would progress along a path to a more integrated European market, it is not put forward in the context of a holistic appraisal of issues impacting efficient trade between EU member states. Making this change will also result in a significant distributional effect from GB consumers to generators.

4.48. As such we have concerns that CMP201 may not be proportionate and hence not in line with best regulatory practice.

Risks and unintended consequences

4.49. Removing BSUoS costs (especially the exposure to charges that reflect constraint payments to generators) from generators who receive constraint revenues, would remove the option for us to make it cost reflective in future – i.e. reduced optionality.

Overall view on Ofgem's statutory duties

4.50. As discussed above, it is our view that approving the implementation of CMP201 does not better facilitate the Authority's statutory duties, as the benefits of

³³ For further detail on tarification, please see Commission Regulation (EU) No 838/2010 on *laying down guidelines relating to the inter-transmission system operator compensation mechanism and a common regulatory approach to transmission charging* and THINK report on *EU Involvement in Electricity and Natural Gas Transmission Grid Tarification*.

The links, respectively, are:

- <http://eurlex.europa.eu/LexUriServ/LexUriServ.do?uri=OJ:L:2010:250:0005:0011:EN:PDF>
- <http://www.eui.eu/Projects/THINK/Documents/Thinktopic/ThinkTopic6.pdf>

³⁴ Market splitting could lead to the inclusion of some aspects of balancing charges in the wholesale price.

increased competition and increased EU integration may not be realised. In addition, there is a risk that the near term adverse impact of the CMP201 on GB consumer prices may never be fully offset by increased investment in GB generation in the longer term.

Our minded to position

4.51. As discussed above, whilst it is our view that CMP201, overall, better meets the Relevant objectives, it does not further the Authority's principal objective and statutory duties.

4.52. Our "minded to position" is therefore to **reject** CMP201 for the reasoning set out above, which we summarise below.

4.53. CMP201 puts forward fundamental economic principles that we agree with. Namely that in an open market, competition is increased if parties trade on an equal basis, and the opportunity of higher profit margins should attract additional investment (provided no other barriers to entry exist). Removing market distortions should facilitate provision of correct signals for efficient investment decisions, which would ultimately be expected to benefit consumers across the EU.

4.54. However, there are uncertainties in the European market that could affect the impacts – both direction and magnitude – of this proposal. For example, the outcome of a decision on market splitting is unknown, which could lead to the inclusion of some aspects of BSUoS in the wholesale price. Moreover, other factors could result in the benefits of this proposal not being realised. In particular:

- There are existing distortions to European trade which are likely to overshadow the impact of BSUoS charges, such as the carbon floor price and/or other country-specific taxes and levies on generation.
- There is no holistic appraisal of issues impacting efficient trade between EU member states.

4.55. There is also a detrimental effect on GB consumers which, even with increased investment in generation, may not be fully reversed and hence would be enduring. We also have reservations about the lack of robust quantitative evidence to substantiate the expectation of additional investment, and recognise the need to acknowledge that other factors, such as Government policies, market arrangements on both sides of interconnectors and investor sentiment, will influence investment decisions. If, in the worst case scenario, no such offsetting investment occurs, consumers' bills would remain £2-£2.50 higher in each and every year following the implementation of this proposal.

4.56. Whilst we are fully supportive of European market integration, taking into account the unresolved issues in the European market, the existence of many other market distortions as well as the potential for a relatively large ongoing impact on consumers, our initial view is in favour of rejecting this proposal.

5. Next steps

5.1. This document marks the start of an eight week consultation period (with an allowance for the Christmas period) during which respondents are invited to provide feedback on our impact assessment and minded to position. The consultation ends on 16 January 2014. Details on how to respond to this consultation, including contact details for any queries can be found in Appendix 1. It also gives a complete list of the questions which we are specifically seeking respondents' views on, although we welcome respondents' views on any aspect of this document.

The Authority will consider any responses to this consultation before reaching its decision on CMP201. We expect to reach a final decision early next year.

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Appendix 1 - Consultation Response and Questions

A3.1 Ofgem would like to hear the views of interested parties in relation to any of the issues set out in this document.

A3.2 We would especially welcome responses to the specific questions which we have set out at the beginning of each chapter heading and which are replicated below.

A3.3 Responses should be received by 16 January and should be sent to:

Alena Aliakseyeva

Smarter Grids and Governance: Transmission
9 Millbank, London, SW1P 3GE
0203 263 2714
Alena.Aliakseyeva@ofgem.gov.uk

A3.4 Unless marked confidential, all responses will be published by placing them in Ofgem's library and on its website www.ofgem.gov.uk. Respondents may request that their response is kept confidential. Ofgem shall respect this request, subject to any obligations to disclose information, for example, under the Freedom of Information Act 2000 or the Environmental Information Regulations 2004.

A3.5 Respondents who wish to have their responses remain confidential should clearly mark the document/s to that effect and include the reasons for confidentiality. It would be helpful if responses could be submitted both electronically and in writing. Respondents are asked to put any confidential material in the appendices to their responses.

A3.6 Next steps: Having considered the responses to this consultation, Ofgem intends to make a decision on whether to approve or reject CMP201. Any questions on this document should, in the first instance, be directed to:

Alena Aliakseyeva

Smarter Grids and Governance: Transmission
9 Millbank, London, SW1P 3GE
0203 263 2714
Alena.Aliakseyeva@ofgem.gov.uk

Consultation Questions

CHAPTER 3: Impact of CMP201

Question 1: Do respondents consider that we have identified the relevant impacts of the CMP201 proposal?

Question 2: Do respondents have any quantitative or qualitative evidence on the likelihood of additional investment in generation that would offset the relative increase in wholesale prices?

Question 3: Do respondents have any further evidence on the effect of CMP201 on supplier credit risk.

CHAPTER 4: Initial Assessment

Question 4: Do respondents agree with our initial assessment of the proposal?

Question 5: Are there other relevant factors that respondents consider we should take into account?

Appendix 2 - Glossary

A

[The Authority](#)

Means the Gas and Electricity Markets Authority (GEMA), established by section 1 of the Utilities Act 2000

B

[BSC](#)

The BSC, Balancing and Settlement Code, is a legal document setting out the rules for the operation and governance of the Balancing Mechanism and Imbalance Settlement. All licensed electricity generators and suppliers must sign up to the BSC and other interested parties may also choose to do so.

[BSUoS](#)

National Grid recovers the costs of balancing the System through BSUoS charges.

[BM Units](#)

Balancing Mechanism Unit (also known as a BM unit) – the point at which power enters or exits the electricity system. A BM unit is the smallest unit for considering system inputs and outputs.

C

[Carbon floor price](#)

The carbon price floor (CPF) is a tax on fossil fuels used to generate electricity. It came into effect on 1 April 2013.

[Connection and Use of System Code \(CUSC\)](#)

A multi-party document creating contractual obligations among and between all users of the transmission system, parties connected to the GB transmission system and National Grid. Persons wishing to use and/or connect to the GB transmission system are required to accede to the CUSC by signing the Framework Agreement and to enter into a Bilateral Agreement with National Grid.

I

[Interconnectors](#)

Equipment used to link electricity systems, in particular between two EU Member States

[Imbalance charges](#)

Charges relating to the difference between contracted generation or consumption and the amount that was actually generated or consumed in each half hour trading period.

N

[National Electricity Transmission System \(NETS\)](#)

The system of high voltage electric lines providing for the bulk transfer of electricity across GB this includes offshore lines.

[National Grid Electricity Transmission plc \(NGET\)](#)

The electricity transmission licensee in England & Wales

R

RCRC

Residual Cashflow Reallocation Cashflow. The Residual Cashflow Reallocation Cashflow is the cashflow to an Energy Account in Settlement Period resulting from the reallocation the Total System Residual Cashflow.

S

Settlement Period

A period of 30 minutes beginning on the hour or the half-hour

System Operator (SO)

NGET is the System Operator for GB, a role which covers on and offshore networks. Key activities undertaken by the System Operator are real time system operation and system balancing.

T

Third Package

The term 'Third Package' refers to Directive 2009/72/EC of the European Parliament and of the Council of 13 July 2009 concerning common rules for the internal market in electricity and repealing Directive 2003/54/EC; Regulation (EC) No 714/2009 of the European Parliament and of the Council of 13 July 2009 on conditions for access to the network for cross-border exchanges in electricity and repealing Regulation (EC) No 1228/2003; and Regulation (EC) No 713/2009 of the European Parliament and of the Council of 13 July 2009 establishing an Agency for the Cooperation of Energy Regulators

TNUoS

Transmission Network Use of System (Charge)

TO(s)

Transmission Owner is used to describe the onshore transmission companies, NGET, Scottish Power Transmission and Scottish Hydro Electric Transmission. The use of the term TO in this document only describes the transmission ownership function; NGET also has a system operator function.

W

WACMs

Workgroup Alternative CUSC Modifications

Appendix 3 - Feedback Questionnaire

A3.1 Ofgem considers that consultation is at the heart of good policy development. We are keen to consider any comments or complaints about the manner in which this consultation has been conducted. In any case we would be keen to get your answers to the following questions:

1. Do you have any comments about the overall process, which was adopted for this consultation?
2. Do you have any comments about the overall tone and content of the report?
3. Was the report easy to read and understand, could it have been better written?
4. To what extent did the report's conclusions provide a balanced view?
5. To what extent did the report make reasoned recommendations for improvement?
6. Please add any further comments?

Please send your comments to:

Andrew MacFaul

Consultation Co-ordinator
Ofgem
9 Millbank
London
SW1P 3GE
andrew.macfaul@ofgem.gov.uk

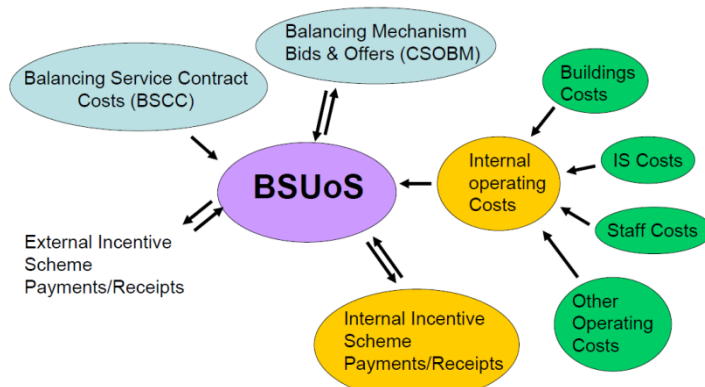
Appendix 4 – Description of BSUoS

A4.1 Balancing Services Use of System (BSUoS) charges comprises:

- The actual costs incurred in balancing and securing the system
- The costs of the System Operator (SO) function

A4.2 There are two main components of BSUoS:

- "Internal" - internal SO costs e.g. staff, buildings, (opex)
- "External" – All costs of the services used to balance the system, ie Electricity related products
- Also includes any Incentive payments/receipts



A4.3 Balancing Mechanism Bids & Offers: The cost incurred by the SO in accepting bids and offers in the Balancing Mechanism calculated in accordance with the Balancing and Settlement Code. Some of these are as a result of constraints.

A4.4 Balancing Services Contract Costs: Some can be allocated to specific Settlement Periods in a Settlement Day. These include; Energy contracts (options & utilisation), Standing Reserve options fees, Regulating Reserve options fees. Some cannot be allocated to each Settlement Period in a Settlement Day. These include; Black Start capability payments, Reactive capability payments, Reactive utilisation payments, Frequency Response holding cost and Warming contracts.

A4.5 BSUoS is paid for by users of the transmission system in each Settlement Period calculated on a half hourly basis. BSUoS is aimed at cost recovery – it is not a fixed price and it does not provide a signal. The proportion of recoverable costs charged to each party is based on their metered usage relative to total use of the system. BSUoS is an ex-post calculation with rolling reconciliation. That is, users can not accurately forecast the BSUoS charges they would face.

A4.6 BSUoS charges are not an isolated cash flow and it can be useful to consider BSUoS in the context of related cash flows in particular imbalance payments and Residual Cashflow Reallocation Cashflow or 'RCRC'³⁵.

A4.7 The external costs that make up BSUoS enable National Grid as the SO to ensure that the market is balanced and frequency maintained such that the consumer would see fewer involuntary disconnections.

³⁵RCRC represents the net money after the settlement of all trading charges – energy imbalances.