

## MODIFICATION REPORT for Modification Proposal P162

### Changes to the definition of Imports and Exports

Prepared by: ELEXON on behalf of the BSC Panel

**Date of issue:** 16 June 2004  
**Reason for issue:** For decision

**Document reference:** P162RR  
**Issue/Version number:** Final/1.0

This document has been distributed in accordance with Section F2.1.10<sup>1</sup> of the Balancing and Settlement Code.

#### RECOMMENDATIONS

Having considered and taken into due account the contents of the draft P162 Modification Report, the Balancing and Settlement Code Panel recommends:

- **that Proposed Modification P162 should be made;**
- **the P162 Implementation Date of 10 Working Days after an Authority decision;**  
**and**
- **the proposed text for modifying the Code, as set out in the draft Modification Report.**

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<sup>1</sup> The current version of the Balancing and Settlement Code (the 'Code') can be found at [www.elexon.co.uk/ta/bsc/el\\_docs/bsc\\_code.html](http://www.elexon.co.uk/ta/bsc/el_docs/bsc_code.html)

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## SUMMARY OF IMPACTED PARTIES AND DOCUMENTS

The following parties/documents have been identified as being potentially impacted by Modification Proposal P162.

Parties	Sections of the BSC	Code Subsidiary Documents
Suppliers <input checked="" type="checkbox"/>	A <input type="checkbox"/>	BSC Procedures <input type="checkbox"/>
Generators <input checked="" type="checkbox"/>	B <input type="checkbox"/>	Codes of Practice <input type="checkbox"/>
Licence Exemptable Generators <input checked="" type="checkbox"/>	C <input type="checkbox"/>	BSC Service Descriptions <input type="checkbox"/>
Transmission Company <input checked="" type="checkbox"/>	D <input type="checkbox"/>	Service Lines <input type="checkbox"/>
Interconnector <input checked="" type="checkbox"/>	E <input type="checkbox"/>	Data Catalogues <input type="checkbox"/>
Distribution System Operators <input checked="" type="checkbox"/>	F <input type="checkbox"/>	Communication Requirements Documents <input type="checkbox"/>
<b>Party Agents</b>	G <input type="checkbox"/>	Reporting Catalogue <input type="checkbox"/>
Data Aggregators <input checked="" type="checkbox"/>	H <input type="checkbox"/>	MIDS <input type="checkbox"/>
Data Collectors <input checked="" type="checkbox"/>	J <input type="checkbox"/>	<b>Core Industry Documents</b>
Meter Operator Agents <input checked="" type="checkbox"/>	K <input checked="" type="checkbox"/>	Grid Code <input type="checkbox"/>
ECVNA <input type="checkbox"/>	L <input type="checkbox"/>	Supplemental Agreements <input type="checkbox"/>
MVRNA <input type="checkbox"/>	M <input type="checkbox"/>	Ancillary Services Agreements <input type="checkbox"/>
<b>BSC Agents</b>	N <input type="checkbox"/>	Master Registration Agreement <input type="checkbox"/>
SAA <input type="checkbox"/>	O <input type="checkbox"/>	Data Transfer Services Agreement <input type="checkbox"/>
FAA <input type="checkbox"/>	P <input type="checkbox"/>	British Grid Systems Agreement <input type="checkbox"/>
BMRA <input type="checkbox"/>	Q <input type="checkbox"/>	Use of Interconnector Agreement <input type="checkbox"/>
ECVAA <input type="checkbox"/>	R <input type="checkbox"/>	Settlement Agreement for Scotland <input type="checkbox"/>
CDCA <input type="checkbox"/>	S <input type="checkbox"/>	Distribution Codes <input type="checkbox"/>
TAA <input type="checkbox"/>	T <input type="checkbox"/>	Distribution Use of System Agreements <input type="checkbox"/>
CRA <input type="checkbox"/>	U <input type="checkbox"/>	Distribution Connection Agreements <input type="checkbox"/>
Teleswitch Agent <input type="checkbox"/>	V <input type="checkbox"/>	<b>BSCCo</b>
SVAA <input type="checkbox"/>	W <input type="checkbox"/>	Internal Working Procedures <input type="checkbox"/>
BSC Auditor <input type="checkbox"/>	X <input type="checkbox"/>	<b>Other Documents</b>
Profile Administrator <input type="checkbox"/>		Transmission Licence <input type="checkbox"/>
Certification Agent <input type="checkbox"/>		
MIDP <input type="checkbox"/>		
TLFA <input type="checkbox"/>		
<b>Other Agents</b>		
SMRA <input type="checkbox"/>		
Data Transmission Provider <input type="checkbox"/>		

X = Identified in Report for last Procedure  
N = Newly identified in this Report

# **1 DESCRIPTION OF PROPOSED MODIFICATION AND ASSESSMENT AGAINST THE APPLICABLE BSC OBJECTIVES**

## **1.1 Modification Proposal**

P162 proposes to clarify the definition of Imports and Exports contained within Section K of the Code to ensure that it is consistent with the intention of its original drafting. P162 also seeks to ensure that Section K is consistent with current operational practice and the Codes of Practice.

Section K of the Code prescribes which Parties should be responsible for Imports and Exports to and from the Total System. It describes what Imports and Exports are: that they exist at a Boundary Point; are per Party concepts; and are direction specific. It further qualifies what Imports and Exports may be by relating such flows to particular items of Plant and Apparatus. In particular, references to Plant and Apparatus (from which flows arise) are taken to include customer's premises, third party generation, generating plant or an Interconnector. Furthermore, Section K also indicates that the net flow from a Generating Unit and its associated unit transformer load should be regarded as a single flow.

There are obligations on the responsible Parties to install metering to measure each of these flows. Subsequent obligations enable BM Units to be constructed applying aggregations where necessary of the resulting Metered Volumes.

Ambiguity in Section K may give rise to differing interpretations of how these rules address a number of particular situations. It could be argued that many existing Metering Systems may not be compliant with one interpretation of the Code despite following the rules defined in the Codes of Practice (CoPs).

The Proposer contends that if the perceived ambiguities were to remain, a number of participants may be faced with obligations to install significantly more Metering Systems than customarily required to enable BM Units to be adequately defined and quantified in Settlement.

The Proposer states that were the Modification to be made, the Code would better reflect the custom and practice for the identification of Imports and Exports and the consequent Metering System requirements. This would enable all Parties to be treated on an equitable basis and the potential need for changes to existing Metering System arrangements would be avoided.

It is argued that this would remove any possible discrimination between Parties and reduce potential barriers to entry, thereby facilitating the better achievement of Applicable Objective (c), 'Promoting effective competition in the generation and supply of electricity and (as far as is consistent therewith) promoting such competition in the sale and purchase of electricity.'

It is further contended that if the current Code drafting were to remain then any resultant additional Metering Systems and increases in the number of BM Units associated with certain sites would result in registration and Settlement processes being more complex without commensurate benefit. By removing this potential increase in complexity (and hence cost and risk), Applicable Objective (d), 'Promoting efficiency in the implementation and administration of the balancing and settlement arrangements' may be better facilitated.

The Proposer suggests that the implementation of this Modification would be expected to involve minimal cost, time and effort.

The Panel considered the Initial Written Assessment regarding P162 at its meeting on 12 February 2004, directing that it should enter a two month Assessment Procedure with an Assessment Report to be prepared for their meeting on 8 April 2004. The Panel further directed that an interim report (reference 4) should be prepared for its consideration at the intermediate Panel meeting, in order that further visibility was afforded with regard to the intent and scope of the Modification Proposal.

The Settlement Standing Modification Group (hereafter referred to as the Group) met three times to discuss P162, on 16 February, 25 February and 12 March 2004, and issued a consultation document for industry feedback on 2 March 2004.

The Group prepared an Assessment Report (v1.0) for the Panel's consideration at its meeting on 8 April 2004. The Panel directed that the Assessment Procedure should be extended by an additional month to further consider Transmission Company concerns regarding the clarity of the draft legal text and to provide assurance that the Group had adequately sense-checked legal text against a variety of example site set-ups. These actions were discharged via correspondence.

A revised Assessment Report (v2.0, reference 6) reflecting the Group's determinations on the P162 Modification Proposal, and additional information prepared in response to the Panel request for further analysis was prepared for the May 2004 Panel meeting. It also contained revised legal text prepared by the Group to address the concerns raised by the Transmission Company.

Version 2.0 of the Assessment Report, and the draft legal text contained within it, form the basis for the findings in this Modification Report.

The Panel considered the P162 draft Modification Report (Reference 7) and the responses to the P162 Report Consultation at its meeting of 10 June 2004, and confirmed that the final Modification Report should contain the recommendation that the Proposed Modification should be made.

## **1.2 Proposed Modification**

The Proposed Modification would result in amendments to the definition of Imports and Exports contained within Section K of the Code. The legal text, incorporating these amendments is appended to this document.

No other documentary or system changes were identified as required by the Proposed Modification.

The full considerations of the Group in deciding upon the changes required are detailed within v2.0 of the Assessment Report.

## **1.3 Issues raised by the Proposed Modification**

The following issues were considered during the assessment of Proposed Modification P162:

- Previous Imbalance Settlement Group (ISG) discussion of this issue;
- The definition of Imports and Exports within the existing Code;
- Agreed metering principles;
- Perceived ambiguous clauses K1.1.4 and K1.2.2;
- Whether per Party netting below the Boundary Point was intended or restricted;
- Treatment of multiple Parties below the Boundary Point;
- Facilitation of competitive supply below the Boundary Point;
- Interaction with P81;
- Logical testing of the draft legal text against example plant configurations;
- The clarity of the proposed legal text;
- Implementation Date; and
- The Terms of Reference

These issues are discussed in the Assessment Report and are not covered further here.

## **1.4 Assessment of how the Proposed Modification better facilitates Applicable BSC Objectives**

The Proposer contended that P162 will better facilitate the following Applicable BSC Objectives:

- (c) Promoting effective competition in the generation and supply of electricity, and (so far as consistent therewith) promoting such competition in the sale and purchase of electricity; and
- (d) Promoting efficiency in the implementation and administration of the balancing and settlement arrangements.

The Group considered whether P162 better facilitates the above, and reached the following conclusions:

### **1.4.1 Applicable BSC Objective (c)**

The Group agreed that the current definition of Imports and Exports is unclear and that this may result in it being interpreted in several different fashions. The Group further agreed that different interpretations of the definition of Imports and Exports would require different levels of Metering Systems to be installed, with associated costs.

The Group considered that the potential that different Parties could incur different costs resulting from different perceptions of Code obligations could not be considered to be in the interests of promoting effective competition in the market.

The Group agreed that where definitions within the Code may be subject to multiple interpretations this increases risks to market participants through uncertainty on what obligations exist. The Group believed increased market certainty in the definition of Imports and Exports would be advisable.

The Group did not perceive any benefits to Settlement integrity from the additional Metering Systems required under the more onerous interpretation of the Code, and that the potential accrual of costs without benefits was also inconsistent with promoting an efficient market.

The Group believed that small scale generation would be particularly badly hit with such costs were the Code to be interpreted as requiring separate metering for all Generating Units below the Boundary Point, regardless of scale. This could undermine the ability of renewable energy sources to participate in the market.

The Group therefore considered that a clear legal baseline that obviated the risk of unnecessary costs being incurred by subsets of the market would result in the better facilitation of Applicable BSC Objective (c).

### **1.4.2 Applicable BSC Objective (d)**

The Group noted that additional Metering System requirements required by the more onerous interpretation of the Code would result in additional Metering System registrations, BM Unit registrations and more complex Aggregation Rules. This would impact upon BSC systems and processes and performance.

The Group also noted that lack of clarity in Code obligations may result in BSCCo inefficiencies resulting from a greater provision of support to Parties seeking advice on what their obligations are.

The Group therefore considered that P162 would result in the better facilitation of Applicable BSC Objective (d).

## 1.5 Modification Group's cost benefit analysis of Proposed Modification

The only costs identified during the Assessment Procedure as resulting from the implementation of P162 would be those associated with modifying the legal text in section K of the Code.

These costs are estimated at 5 man days, equating to £2,000, and are detailed in Section 2 of this document.

The Group considered that these costs are minimal, and that consequently the benefit threshold P162 needs to pass in order to provide value-for-money is also minimal.

The benefits perceived as accruing from P162 are detailed in the Group's assessment against the Applicable BSC Objectives in section 1.4 of this document.

The principle benefit perceived by the Group is removal of the potential that Parties may unnecessarily install additional meters (plus associated voltage or current transformers (CT/VTs) where required) to meet the more onerous interpretation of the current Code that is detailed in section 1.2.6 of the Assessment Report.

It is not known how many additional installations may have been inadvertently installed, or could be additionally required, in order to meet the more onerous interpretation. It is however possible to derive estimates of the typical costs of metering equipment associated with different CoPs.

Table 1 shows BSCCo estimations of approximate costs for implementing one Metering System, plus appropriate CT/VTs (where required), at a single feeder for different types of sites. These are based upon estimations of average costs per type.

Costs indicated for high voltage<sup>2</sup> circuits assume that the existing switch gear can accommodate additional CT/VTs. No installation, maintenance or data communication costs are included.

**Table 1: Estimated cost of metering equipment required to meet different CoPs**

	Code of Practice governance	Cost of Meter(s)	Cost of CTs	Cost of VT	Cost of Integrated CT/VT Unit	Cost of Outstation	Total cost for equipment
Domestic Import (Low voltage <sup>3</sup> )	CoP 8	£6 - 30	-	-	-	-	£6 - 30
Domestic Import / Export (Low voltage)	CoP 9	£20 - 30	-	-	-	-	£20 - 30
Small Industrial / Commercial (Low voltage – 11kV (high voltage))	CoP 5	£120	£25 - 50	£2,000	-	-	£145 - £ 2,170
Medium Industrial / Commercial (high voltage: 11kV –	CoP 3	£240	£25 - 50	£2,000	-	-	£265 – £ 2,290

<sup>2</sup> High voltage is taken to mean a voltage exceeding 1,000 volts AC.

<sup>3</sup> Low voltage is taken to mean a voltage of between 50 and 1,000 volts AC.

33kV)							
Large Industrial / Commercial (high voltage: 33kV – 132kV)	CoP 2	£450	£50 - 100	£2,000	£6,000 – £8,000	£1,200	£2,500 - £9,750
GSP / Power Station (high voltage: 132kV - 400kV)	CoP 1	£1,000	-	-	£12,000	£2,400	£15,400

The cost of implementing P162 would appear to be exceeded by the cost of installing a minimal number of new meters (potentially as few as one, dependent on the nature of the site).

The Group considers it likely that a considerable number of sites would require additional Metering Systems to meet the more onerous interpretation of the current Code that is detailed in section 1.2.6 of the Assessment Report. The Group therefore believes that the benefit of P162 – avoiding these costs potentially being unnecessarily incurred - would be well in excess of the implementation cost.

## 1.6 Alternative Modification

Neither the Group, nor any of the respondents to the Assessment Procedure consultation identified any Alternative Modifications that would, in their opinion, better address the perceived defect.

## 1.7 Governance and regulatory framework assessment

Neither the Group, nor any of the respondents to the Assessment Procedure consultation identified any impact upon the Governance and Regulatory Framework.

## 2 COSTS<sup>4</sup>

### PROGRESSING MODIFICATION PROPOSAL

<b>Demand Led Cost</b>	£ 0
<b>ELEXON Resource</b>	45 Man days (equating to approximately £9,760)

### IMPLEMENTATION COSTS

	Stand Alone Cost	P162 Incremental Cost	Tolerance
<b>Service Provider<sup>5</sup> Cost</b>			

<sup>4</sup> Clarification of the meanings of the cost terms in this section can be found in annex 7 of this report

<sup>5</sup> BSC Agent and non-BSC Agent Service Provider and software Costs



	Change Specific Cost	£ 0	£ 0	+/- 0% (£ 0)
	Release Cost	£ 0		+/- 0% (£0)
	Incremental Release Cost	£ 0	£ 0	+/- 0% (£0)
	Total Service Provider Cost	£ 0	£ 0	+/- 0% (£0)
<b>Implementation Cost</b>				
	External Audit	£ 0	£ 0	+/- 0% (£0)
	Design Clarifications	£ 0	£ 0	+/- 0% (£0)
	Additional Resource Costs	£ 0	£ 0	+/- 0% (£0)
	Additional Testing and Audit Support Costs	£ 0		+/- 0% (£0)
<b>Total Demand Led Implementation Cost</b>		£ 0	£ 0	+/- 0%

<b>ELEXON Implementation Resource Cost</b>		5 Man days £ 2,000	5 Man days £ 2,000	+/- 10% +/- £ 200
<b>Total Implementation Cost</b>		£ 2,000	£ 2,000	+/- 10%

### ONGOING SUPPORT AND MAINTENANCE COSTS

	Stand Alone Cost	P162 Incremental Cost	Tolerance
Service Provider Operation Cost	£ 0 per annum	£ 0 per annum	+/- 0% (£0)
Service Provider Maintenance Cost	£ 0 per annum	£ 0 per annum	+/- 0% (£0)
ELEXON Operational Cost	£ 0 per annum	£ 0 per annum	+/- 0% (£0)

### 3 RATIONALE FOR PANEL'S RECOMMENDATIONS

The Panel concurred with the findings of the Group, that P162 would better facilitate achievement of both Applicable BSC Objective (c) and (d) for the reasons detailed in section 1.4 of this document.

The Panel noted that the Transmission Company analysis suggested that P162 would not impact on its ability to discharge its obligations under the Transmission Licence in the current environment but that

this situation may change in future should levels of embedded/exemptable generation expand, and that any such changes may require additional Code modifications.

The Panel has reached a recommendation that Proposed Modification P162 should be made, with an Implementation Date of 10 Working Days after an Authority decision.

## 4 IMPACT ON BSC SYSTEMS AND PARTIES

An assessment has been undertaken in respect of BSC Systems and Parties and no areas have been identified as potentially being impacted by the Proposed Modification.

## 5 IMPACT ON CODE AND DOCUMENTATION

### 5.1 Balancing and Settlement Code

Section K of the Code will require amendment to reflect the clarified definition of Imports and Exports.

The draft legal text is attached to this document.

### 5.2 Code Subsidiary Documents

No changes to Code Subsidiary Documents have been identified.

### 5.3 BSCCo Memorandum and Articles of Association

No changes to the BSCCo Memorandum and Articles of Association have been identified.

### 5.4 Impact on Core Industry Documents and supporting arrangements

No impact upon Core Industry Documents and supporting arrangements have been identified.

## 6 SUMMARY OF CONSULTATIONS

Consultation question	Respondent agrees	Respondent disagrees	Opinion unexpressed
Do you agree with the Panel's views on P162 and the provisional recommendation to the Authority contained in the draft Modification Report that P162 should be made?	7 (37 Parties and 1 non-Party)	1 (3 Parties)	1 (1 Party)
Do you agree with the Panel's view that the legal text provided in the draft Modification Report correctly addresses the defect or issue identified in the Modification Proposal?	6 (36 Parties and 1 non-Party)	1 (3 Parties)	2 (2 Parties)
Do you agree with the Panel's provisional recommendation concerning the Implementation Date for P162?	7 (37 Parties and 1 non-Party)	0	2 (4 Parties)

### 6.1 Panel's Provisional Recommendation

The majority of respondents agreed with the Panel's provisional views and recommendation to the Authority that P162 be made, with one respondent in disagreement. The respondent in disagreement believes P162 would remove a longstanding, fundamental, and in their view desirable, principle that underlying generation and demand should be separately metered. All respondents who provided comments in support of their answer had also responded to the consultation within the Assessment

Procedure, and no new arguments were put forward either for or against the implementation of P162 in the consultation upon the draft Modification Report.

## **6.2 Draft Legal Text**

The majority of respondents agreed that the draft legal text correctly addresses the defect or issue identified in the Modification Proposal. No new issues were raised in these responses.

One respondent, who also disagrees with the Panel's provisional recommendation that P162 should be made, did not agree that the legal text addresses the defect or issue identified in the Modification Proposal. This respondent believes that a defect exists in one, but not all, of the clauses that would be modified by P162. The respondent shares the Modification Group's belief that current clause K1.1.4(d) was intended to be applied only to licensed Generating Units but as currently drafted may actually be applicable to all Generating Units whether licensable or not. The respondent believes this defect may be partly addressed by the legal text. The respondent does not agree that other perceived defects exist and therefore does not agree with the other proposed changes.

## **6.3 Recommended Implementation Date**

All respondents who expressed an opinion agreed with the proposed Implementation Date, with no alternatives suggested.

## **6.4 Further Comments**

Two respondents took the opportunity to provide further comments. In both cases these were re-iterations of issues they raised for consideration through the Assessment Procedure consultation.

One (that also holds the role of Transmission Company) suggested that the definition of Imports and Exports defined within the Code may become outdated in future should embedded and exemptable generation proliferate. This might necessitate further change to ensure that the Transmission Company has appropriate metering information to carry out its role of operating an efficient, economic and co-ordinated transmission system. The respondent indicates that consideration of such changes is outside the remit of P162, but wishes to ensure that the industry is aware that subsequent changes to the definition of Imports and Exports may be required as the contribution of embedded and exemptable generation to the market develops.

The other provided extensive comments arguing against the approval of P162. They contend that it would remove a fundamental principle that generation and demand underlying the Boundary Point should be separately metered. They suggest that any short term cost savings to small generators would be achieved through the creation of barriers or increased costs in the future development of the electricity industry, particularly as the level of distributed and licence exempt generation increases.

Particular concerns of this respondent are that P162 would result in:

- loss of visibility of the underlying composition of national generation and demand;
- entrenchment of embedded benefits;
- creation of barriers to entry through the promotion of vertically integrated sites;
- impeding the ability of transmission and distribution companies to maintain stability and balance the system by reducing information available to them on underlying physical assets;
- stifling metering innovation; and
- providing small generators with a greater degree of flexibility in providing balancing services than is available to larger generators.

## **6.5 Comments and views of the Panel**

The Panel gave due consideration to the responses to the consultation on the draft Modification Report in reaching their recommendation that Proposed Modification P162 should be made.

The Panel did not comment on the content of any of the consultation responses.

## **7 SUMMARY OF TRANSMISSION COMPANY ANALYSIS**

### **7.1 Analysis**

The Transmission Company does not believe that P162 would impact on its ability to discharge its obligations under the Transmission Licence in the current environment. It notes that this situation may change in future should levels of embedded/exemptable generation expand, and that any such changes may require additional Code modifications.

The Transmission Company believes P162 better facilitates Applicable BSC Objective (c) by reducing the risk of unnecessary expenditure by certain new entrants to the market. It believes P162 also better facilitates Applicable BSC Objective (d) by clarifying the obligations in the Code for entrants and supporting the effective operation and administration of the registration process.

P162 is not believed to require changes to the Transmission Company's computer systems and processes, and no development, capital or operating costs have been identified that would result from its implementation.

No consequential changes to Core Industry Documents that would result from the implementation of the Proposed Modification have been identified.

The Transmission Company further comments that whilst they are supportive of the Group's approach to clarify the obligations relating to unlicensed/exemptable plant, they believe it is important to maintain the Code requirement for metering individual Generating Units at Licensable Generating Plants. It is acknowledged that the Modification Group has considered this need in its discussions<sup>6</sup>.

The Transmission Company analysis is appended to this document as annex 3.

### **7.2 Comments and views of the Panel**

The Panel noted that the Transmission Company analysis suggested that P162 would not impact on its ability to discharge its obligations under the Transmission Licence in the current environment but that this situation may change in future should levels of embedded/exemptable generation expand, and that any such changes may require additional Code modifications.

## **8 SUMMARY OF EXTERNAL ADVICE**

The Group did not request or consider external consultancy advice during the course of its considerations.

## **9 IMPLEMENTATION APPROACH**

The Assessment Report identified that the requirements for implementation would be restricted to putting in place modified legal drafting and that BSCCo estimates are that this could be achieved within 10 Working Days from an Authority decision.

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<sup>6</sup> The draft legal text attached to this document contains provision to ensure licensable Generating Units (generally taken to be >50MW) constitute discrete Exports or Imports in recognition of this requirement.

The provisional Panel recommendation is for an Implementation Date of 10 Working Days after an Authority decision.

## 10 DOCUMENT CONTROL

### 10.1 Authorities

Version	Date	Author	Reviewer	Change Reference
0.1	14/05/04	Change Delivery	Change Delivery	Change Delivery Review
0.2	14/05/04	Change Delivery	Industry	Industry Review
0.3	27/05/04	Change Delivery	Change Delivery	Change Delivery Review
0.4	02/06/04	Change Delivery	Panel	Panel decision
1.0	15/06/04	Change Delivery	Authority	Authority decision

### 10.2 References

Ref.	Title	Owner	Issue date	Version
1	Modification Proposal P162 Main Document: <a href="http://www.elexon.co.uk/Documents/modification/s/162/P162.pdf">http://www.elexon.co.uk/Documents/modification/s/162/P162.pdf</a> Appendix 1: <a href="http://www.elexon.co.uk/Documents/modification/s/162/P162Att1.pdf">http://www.elexon.co.uk/Documents/modification/s/162/P162Att1.pdf</a>	SSE Energy Supply Ltd	30/01/04	-
2	Issues associated with the definition of Imports and Exports <a href="http://www.elexon.co.uk/documents/BSC_Panel_and_Panel_Committees/ISG_Meeting_2003_-_035_-_Papers/035_0393.pdf">http://www.elexon.co.uk/documents/BSC_Panel_and_Panel_Committees/ISG_Meeting_2003_-_035_-_Papers/035_0393.pdf</a>	ISG	16/12/03	-
3	Initial Written Assessment for Modification Proposal P162 <a href="http://www.elexon.co.uk/documents/BSC_Panel_and_Panel_Committees/BSC_Panel_Meetings_2004_-_072_-_Papers/72_015a.pdf">http://www.elexon.co.uk/documents/BSC_Panel_and_Panel_Committees/BSC_Panel_Meetings_2004_-_072_-_Papers/72_015a.pdf</a>	ELEXON	06/02/04	1.0
4	Interim Report for Modification Proposal P162 <a href="http://www.elexon.co.uk/Documents/modification/s/162/74_013a_P162IR.pdf">http://www.elexon.co.uk/Documents/modification/s/162/74_013a_P162IR.pdf</a>	SSMG	05/03/04	1.0
5	Consultation for Modification Proposal P162 <a href="http://www.elexon.co.uk/Documents/modification/s/162/P162AC10.pdf">http://www.elexon.co.uk/Documents/modification/s/162/P162AC10.pdf</a>	SSMG	02/03/04	1.0
6	Assessment Report for Modification Proposal P162 <a href="http://www.elexon.co.uk/documents/modification/s/162/75_011a_P162_AR.pdf">http://www.elexon.co.uk/documents/modification/s/162/75_011a_P162_AR.pdf</a>	SSMG	07/05/04	2.0

	<p>Annex 1:</p> <p><a href="http://www.elexon.co.uk/Documents/modifications/162/77_011b_P162.pdf">http://www.elexon.co.uk/Documents/modifications/162/77_011b_P162.pdf</a></p> <p>Annex 5:</p> <p><a href="http://www.elexon.co.uk/Documents/modifications/162/77_011c_P162_AR.pdf">http://www.elexon.co.uk/Documents/modifications/162/77_011c_P162_AR.pdf</a></p>			
7	<p>Draft Modification Report for Modification Proposal P162</p> <p><a href="http://www.elexon.co.uk/documents/BSC_Panel_and_Panel_Committees/BSC_Panel_Meetings_2004_-_078_-_Papers/78_008a.pdf">http://www.elexon.co.uk/documents/BSC_Panel_and_Panel_Committees/BSC_Panel_Meetings_2004_-_078_-_Papers/78_008a.pdf</a></p> <p>Annex 1:</p> <p><a href="http://www.elexon.co.uk/documents/BSC_Panel_and_Panel_Committees/BSC_Panel_Meetings_2004_-_078_-_Papers/78_008b.pdf">http://www.elexon.co.uk/documents/BSC_Panel_and_Panel_Committees/BSC_Panel_Meetings_2004_-_078_-_Papers/78_008b.pdf</a></p> <p>Annex 4:</p> <p><a href="http://www.elexon.co.uk/documents/BSC_Panel_and_Panel_Committees/BSC_Panel_Meetings_2004_-_078_-_Papers/78_008c.pdf">http://www.elexon.co.uk/documents/BSC_Panel_and_Panel_Committees/BSC_Panel_Meetings_2004_-_078_-_Papers/78_008c.pdf</a></p> <p>Annex 6:</p> <p><a href="http://www.elexon.co.uk/documents/BSC_Panel_and_Panel_Committees/BSC_Panel_Meetings_2004_-_078_-_Papers/78_008d.pdf">http://www.elexon.co.uk/documents/BSC_Panel_and_Panel_Committees/BSC_Panel_Meetings_2004_-_078_-_Papers/78_008d.pdf</a></p>	ELEXON	04/06/04	0.4

## ANNEX 1 LEGAL TEXT

The legal text is provided in a separate attachment to this document.

## ANNEX 2 MODIFICATION GROUP DETAILS

NAME	POSITION	MEMBER	MEETING ATTENDANCE		
			16/02/04	25/02/04	12/03/04
Keith Campion	Chairman (ELEXON)	Y	Y	Y	Y
Richard Hall	Lead Analyst (ELEXON)	Y	Y	Y	Y
Steve Drummond	EdF Trading Ltd	Y	Y	Y	N
Mark Manley	British Gas Trading	Y	Y	Y	Y
Kevin Rendell	National Grid Company	Y	Y	Y	N
Neil Smith	Powergen	Y	Y	Y	Y

Man Kwong Liu	Scottish Power	Y	N	Y	N
Helen Bray	London Electricity	Y	Y	N	N
Andrew Colley	SSE Energy Supply Ltd	Y	Y	N	Y
Carl Wilkes	Npower	Y	N	Y	Y
Ben Willis	Npower	Y	Y	N	N
Mike Harding	Yorkshire Electricity Group plc	Y	N	N	N
Joanne Ellis	Cornwall Consulting Ltd	N	Y	N	N
Steve Mackay	Ofgem	N	Y	Y	Y
Simon Fox	Additional technical support (ELEXON)	N	Y	N	N

### TERMS OF REFERENCE FOR MODIFICATION GROUP

1. The Modification Group will carry out an Assessment Procedure in respect of Modification Proposal P162 pursuant to section F2.6 of the BSC.
2. The Modification Group will produce an Assessment Report for consideration at the BSC Panel Meeting on 8 April 2004.
3. The Modification Group shall consider and/or include in the Assessment Report as appropriate:
  - Confirming the existing Code obligations relating to metering;
  - Reviewing the coverage of the existing definition of Imports and Exports;
  - Understanding the extent of any identified defect(s);
  - Identifying the implications of failing to address any identified defect(s). This to include consideration of costs of metering;
  - The interaction between the Code and the Codes of Practice (CoPs); and
  - In the context of P81, 'Removal of the Requirement for Half Hourly Metering on Third Party Generators at Domestic Premises', what is the responsibility for establishing an export MPAN where an import MPAN has been established.

### ANNEX 3 TRANSMISSION COMPANY ANALYSIS

1. *Please outline any impact of the Proposed Modification (and, if applicable, any Alternative Modification) on the ability of the Transmission Company to discharge its obligations efficiently under the Transmission Licence and on its ability to operate an efficient, economical and co-ordinated transmission system.*

We do not believe that the proposed modification has any impact on our ability to discharge our obligations under the Transmission Licence in the current environment, as it will not have any impact on operational procedures. However, we note that with likely future increases in embedded generation/exemptable plant there may be implications for our operational practices and a requirement for us to access further information from these parties in support of our ongoing role to operate an efficient, economical and co-ordinated transmission system. We recognise that such a

requirement for increased metered information is outside of the scope of this modification and any subsequent change may require further Code modifications which we will progress as and when appropriate.

2. *Please outline the views and rationale of the Transmission Company as to whether the Proposed Modification (and, if applicable, any Alternative Modification) would better facilitate achievement of the Applicable BSC Objectives.*

We believe that the proposed modification better facilitates BSC Applicable Objective c) by reducing the risk of unnecessary expenditure by certain new entrants to the market. We believe that the proposal also meets BSC Applicable Objective d) as it clarifies the obligations in the Code for entrants and supports the effective operation and administration of the registration process.

3. *Please outline the impact of the Proposed Modification (and, if applicable, any Alternative Modification) on the computer systems and processes of the Transmission Company, including details of any changes to such systems and processes that would be required as a result of the implementation of the Proposed Modification (and, if applicable, any Alternative Modification)*

We do not believe that there are any impacts on our computer systems and processes arising from the proposed modification.

4. *Please provide an estimate of the development, capital and operating costs (broken down in reasonable detail) which the Transmission Company anticipates that it would incur in, and as a result of, implementing the Proposed Modification (and, if applicable, any Alternative Modification).*

No costs have been identified.

5. *Please provide details of any consequential changes to Core Industry Documents that would be required as a result of the implementation of the Proposed Modification (and, if applicable, any Alternative Modification).*

None identified.

6. *Any other comments on the Proposed Modification (and Alternative Modification if applicable).*

We note that the intent of the modification is to clarify custom and practice with regard to the obligations placed on unlicensed/exemptable plant for the purpose of metering. Whilst we are supportive of this approach we must stress our continued support of the Code requirement for metering at an individual Genset level for larger players ie. for licensable generation above the 50MW level. As has been acknowledged in Modification Group discussions we believe there is a need to ensure that this existing requirement is unaffected by the proposed Code change.

## **ANNEX 4 BSC AGENT IMPACT ASSESSMENTS**

The NETA Central Service Agent impact assessment is provided in a separate attachment to this document.

## **ANNEX 5 CLARIFICATION OF COSTS**

There are several different types of costs relating to the implementation of Modification Proposals. ELEXON implements the majority of Approved Modifications under its CVA or SVA Release Programmes. These Programmes incur a base overhead which is broadly stable whatever the content of the Release. On top of this each Approved Modification incurs an incremental implementation cost. The table of estimated costs of implementing the Proposed/Alternative Modification given in section 2 of this report has three columns:



- **Stand Alone Cost** – the cost of delivering the Modification as a stand alone project outside of a CVA or SVA Release, or the cost of a CVA or SVA Release with no other changes included in the Release scope. This is the estimated maximum cost that could be attributed to any one Modification implementation.
- **Incremental Cost** - the cost of adding that Modification Proposal to the scope of an existing release. This cost would also represent the potential saving if the Modification Proposal was to be removed from the scope of a release before development had started.
- **Tolerance** – the predicted limits of how certain the cost estimates included in the template are. The tolerance will be dependent on the complexity and certainty of the solution and the time allowed for the provision of an impact assessment by the Service Provider(s).

The cost breakdowns are shown below:

PROGRESSING MODIFICATION PROPOSAL	
<b>Demand Led Cost</b>	This is the third party cost of progressing a Modification Proposal through the Modification Procedures in accordance with Section F of the Code. Service Provider Impact Assessments are covered by a contractual charge and so the Demand Led cost will typically be zero unless external Legal assistance or external consultancy is required.
<b>ELEXON Resource</b>	This is the ELEXON Resource requirement to progress the Modification Proposal through the Modification Procedures. This is estimated using a standard formula based on the length of the Modification Procedure.

SERVICE PROVIDER <sup>7</sup> COSTS	
<b>Change Specific Cost</b>	Cost of the Service Provider(s) Systems development and other activities relating specifically to the Modification Proposal.
<b>Release Cost</b>	Fixed cost associated with the development of the Service Provider(s) Systems as part of a release. This cost encompasses all the activities that would be undertaken regardless of the number or complexity of changes in the scope of a release. These activities include Project Management, the production of testing and deployment specifications and reports and various other standard release activities.
<b>Incremental Release Cost</b>	Additional costs on top of base Release Costs for delivering the specific Modification Proposal. For instance, the production of a Test Strategy and Test Report requires a certain amount of effort regardless of the number of changes to be tested, but the addition of a specific Modification Proposal may increase the scope of the Test Strategy and Test Report and hence incur additional costs.

<sup>7</sup> A Service Provider can be a BSC Agent or a non-BSC Agent, which provides a service or software as part of the BSC and BSC Agent Systems. The Service Provider cost will be the sum of the costs for all Service Providers who are impacted by the release.

IMPLEMENTATION COSTS	
<b>External Audit</b>	Allowance for the cost of external audit of the delivery of the release. For CVA BSC Systems Releases this is typically estimated as 8% of the total Service Provider Costs, with a tolerance of +/- 20%. At present the SVA Programme does not use an external auditor, so there is no External Audit cost associated with an SVA BSC Systems Release.
<b>Design Clarifications</b>	Allowance to cover the potential cost of making any amendments to the proposed solution to clarify any ambiguities identified during implementation. This is typically estimated as 5% of the total Service Provider Costs, with a tolerance of +/- 100%.
<b>Additional Resource Costs</b>	<p>Any short-term resource requirements in addition to the ELEXON resource available. For CVA BSC Systems Releases, this is typically only necessary if the proposed solution for a Modification Proposal would require more extensive testing than normal, procurements or 'in-house' development.</p> <p>For SVA BSC Systems Releases, this will include the management and operation of the Acceptance Testing and the associated testing environment.</p> <p>This cost relates solely to the short-term employment of contract staff to assist in the implementation of the release.</p>
<b>Additional Testing and Audit Support Costs</b>	Allowance for external assistance from the Service Provider(s) with testing, test environment and audit activities. Includes such activities as the creation of test environments and the operation of the Participant Test Service (PTS). For CVA BSC Systems Releases, this is typically estimated as £40k per release with at tolerance of +/-25%. For SVA BSC Systems Releases this is estimated on a Modification Proposal basis.

TOTAL DEMAND LED IMPLEMENTATION COSTS
<p>This is calculated as the sum of the total Service Provider(s) Cost and the total Implementation Cost. The tolerance associated with the Total Demand Led Implementation Cost is calculated as the weighted average of the individual Service Provider(s) Costs and Implementation Costs tolerances. This tolerance will be rounded to the nearest 5%.</p>

ELEXON IMPLEMENTATION RESOURCE COSTS
<p>Cost quoted in man days multiplied by project average daily rate, which represents the resources utilised by ELEXON in supporting the implementation of the release. This cost is typically funded from the "ELEXON Operational" budget using existing staff, but there may be instances where the total resources required to deliver a release exceeds the level of available ELEXON resources, in which case additional Demand Led Resources will be required.</p> <p>The ELEXON Implementation Resource Cost will typically have a tolerance of +/- 5% associated with it.</p>

ONGOING SUPPORT AND MAINTENANCE COSTS	
<b>ELEXON Operational Cost</b>	Cost, in man days per annum multiplied by project average daily rate, of operating the revised systems and processes post implementation.
<b>Service Provider Operation Cost</b>	Cost in £ per annum payable to the Service Provider(s) to cover staffing requirements, software or hardware licensing fees, communications charges or any hardware storage fees associated with the ongoing operation of the revised systems and processes.
<b>Service Provider Maintenance Cost</b>	Cost quoted in £ per annum payable to the Service Provider(s) to cover the maintenance of the amended BSC Systems.

## ANNEX 6 CONSULTATION RESPONSES

Responses to the consultation upon the draft Modification Report are provided in a separate attachment to this document.