# OTEG – Price Control Subgroup Summary Paper on Form, Scope of Price Control Design

## 1. BACKGROUND

At the second meeting of OTEG on 1 June 2006 it was decided that a subgroup (the price control subgroup) be formed to undertake high level work to assist Ofgem/Dti in developing their thinking on the design of the offshore transmission price control. The subgroup met twice during August and this paper summarises the discussion on the form, duration and scope of the offshore transmission price control design.

The objective of this paper is to inform the development of the regulatory framework for offshore transmission by generating debate and seeking views on the key issues and questions.

## 2. FUNDAMENTAL ISSUES

The group identified a number of issues that need to be addressed in order to introduce an efficient price control mechanism for offshore transmission –

- Need to build on the onshore regime as much as possible but to recognise and address the differences
- Significant degree of cost uncertainty associated with the development of offshore networks
- Absence of robust historical/benchmark data to enable development of incentive and efficiency mechanisms
- Requirement to deliver an effective solution that can be implemented as quickly as possible balanced with the need to develop an enduring regime
- Requirement for an appropriate balance between the interests of all stakeholders in terms of attracting the necessary investment while promoting cost efficiency

# **Questions:**

## O1. Do you agree with the fundamental issues that have been identified?

## 3. FORM OF PRICE CONTROL

## 3.1 High Level Approach

At the highest level, there are a number of different approaches that might be appropriate for the form of an offshore price control. These range from a straightforward mechanism where efficient costs are passed through (effectively rate of return regulation) to a regime where allowances are fixed in advance with the full costs/benefits of under/out performance being borne or retained by the TO. It is considered that neither of these extremes is likely to be appropriate and that a balanced approach is more suitable. Such an approach could incorporate various mechanisms to incentivise cost efficiency, share the cost/benefit of under/out-performance and deal with material movements in costs outwith the control of the TO. In the longer term, once uncertainties associated with offshore transmission are

reduced by a relevant period of operational experience then it could be possible to increase the power of incentives.

In assessing what form of price control might be appropriate for offshore transmission it is important to consider that there is likely to be a number of distinct phases to an offshore transmission project. A potential split for consideration of the issues specific to each, could be pre-construction phase, construction phase, operational phase and decommissioning phase. It is possible that a different approach to the form of price control is appropriate for the different phases.

Another issue arises around the degree of complexity that is appropriate for an offshore price control. The sub-group is of the view that, given the high degree of complexity around the regulatory arrangements for offshore generation/transmission, there would be merit in keeping the price control as simple as possible (at least in the early stages). Enhancements to the price control regime could be considered as relevant operational experience is gained.

## **Questions:**

- Q2. What form might be appropriate for an offshore price control?
- Q3. Are different approaches justified for the different phases of an offshore transmission project, and if so, what might these approaches be?
- Q4. What level of balance should be struck between simplicity and complexity in the offshore transmission price control?
- 3.2 RAV based with RPI-X

A RAV based RPI-X approach would be consistent with the onshore regime and, as such, it was considered that, when appropriate, the objective should be to move towards such an approach. However, given the likely high degree of cost uncertainty and lack of benchmark cost information in the early phases of an offshore transmission project, there is insufficient information to assess in advance, the stage at which a RAV could be determined and baseline cost allowances set. This leads to a further consideration as to what form of funding / price control mechanism is appropriate prior to this point.

# **Questions:**

- **Q5.** Is the objective of a RAV based RPI-X form of control appropriate?
- Q6. If yes, at what stage would such an approach be appropriate and how could costs be funded in advance of this?
- 3.3 Incentives for Cost Efficiency and Quality of Service

It is considered essential for the enduring offshore price control to incorporate incentives for efficiency and that these should be balanced by incentives for delivery and quality of service. Some form of rolling efficiency incentive may be appropriate as this would be consistent with the onshore regime for both transmission and

distribution. However issues around cost uncertainty and lack of benchmark information will lead to difficulty in establishing a firm baseline around which the incentive can operate.

Similarly, lack of historical performance data will make it difficult to establish quality of service incentives in the initial period of any price control regime. However, this issue could be tackled by establishing reporting requirements monitored for a set period of time after commissioning and form the basis for an initial price control period. This information could then form the basis for a quality of service incentive regime.

## **Questions:**

- Q7. What data would be appropriate to monitor post commissioning and what is a reasonable timeline for monitoring such data?
- Q8. Are there any incentive mechanisms that could be implemented at the beginning of the price control?
- 3.4 Regulatory Depreciation Period

A key input to the price control will be the regulatory depreciation period for the transmission assets. The main issue for consideration is whether the depreciation period should match the anticipated life of the transmission or generation assets. Current estimates for the life of contemporary offshore generation assets range from 20-25 years. There is uncertainty over the life of the transmission assets. However, there is a view that this could be significantly longer than that of the generation assets.

On the one hand, it could be that the potentially longer life for transmission assets is reflected in the price control. This would result in lower annual regulated revenues than the alternative and potentially, depending on the GBSO's charging methodology, lower annual charges to generators. However, it could also give rise to issues relating to recovery of costs of stranded assets if the transmission assets are not in use for a period of time, either through decommissioning of initial generation assets or lack of replacement users in the future.

However, on the other hand it could be argued that there is significant uncertainty around whether generating assets will be replaced at the end of their life and that the price control should not assume that replacement will take place. To make such an assumption would raise the risk of there being no user for transmission assets before they had been fully funded by the price control. Acceptance of this argument would lead to a regulatory depreciation period aligned with the anticipated life of the generating assets.

There is some precedent for aligning regulatory asset lives with those of generating assets. The Distributed Generation Incentive Mechanism established during DPCR4, where the life of distribution assets is aligned to the estimated life of the generators assets, currently 15 years.

If such an approach were to be adopted, then consideration would be required as to the price control and charging regime that would apply if the transmission assets were to be used beyond their regulated life. If assets were to continue in use for longer than the regulatory depreciation period then the transmission charges would be significantly reduced, comprising mainly of an opex element. Such a situation might require some form of refund mechanism for the user(s) that originally funded the assets if a different party subsequently makes use of them.

- Q9. Should the regulatory depreciation period align with the anticipated life of the transmission or generation assets?
- Q10. What form of refund/compensation mechanism would be appropriate in the event that transmission assets are used beyond their regulatory lives?
- 3.5 Potential Approaches

A variety of regulatory mechanisms are already in existence that could be drawn upon to some extent to establish a price control mechanism for offshore networks. Each approach is complicated by the problem of establishing a robust baseline around which incentives or adjustment mechanisms can operate.

Transmission Investment for Renewable Generation (TIRG)

The TIRG mechanism is being used onshore to fund a number of strategic upgrades to the transmission network. It provides a basis for assessing cost movements and is able to deal with cost uncertainties expected in the development of offshore transmission assets. TIRG funds both pre-construction and construction costs prior to determining RAV and would tackle the issue of what form an offshore price control would take on day 1.

There are however some concerns that have been expressed around some aspects of the mechanism. There is a view that TIRG is very resource intensive on both the part of transmission owners and Ofgem. In addition, it has been suggested that the mechanism has the potential to weaken cost efficiency incentives by allowing forecast costs to be reviewed and subsequently altered. However, the materiality of such concerns has to be balanced with the expected expenditure on offshore transmission projects (potentially in excess of £2bn) and the need to encourage investment to move projects forward.

The offshore price control provides the opportunity to use some of the principles incorporated in the TIRG mechanism informed by experience of operating the mechanism.

Q11. Are there elements of the TIRG mechanism appropriate for use in an offshore price control, if so, what are they?

The establishment of a baseline allowance and associated revenue driver for costs could avoid the need for frequent assessments of cost movements, something seen as a drawback of the TIRG mechanism. However, the absence of historical information and uncertainty over costs associated with offshore transmission make it difficult in the first instance to determine an appropriate baseline and value of revenue drivers.

Sliding Scale

Ofgem introduced the sliding scale mechanism during DPCR4. It is intended to allow, but not encourage, expenditure in excess of the allowance and to reward efficient expenditure but not excessively so. The mechanism incorporates the principle of greater and lesser incentives for different circumstances and it is for consideration whether this could be applied to offshore transmission. Issues that could be relevant in this consideration include the level of complexity that is appropriate for offshore transmission price controls and whether a relatively unproven mechanism should be applied to a new price control regime.

## 4. Duration

The duration of the price control will be influenced by a number of factors. Firstly, it is likely that the profile of capital expenditure will be heavily front-loaded. Also, there is uncertainty with regard to the costs applicable to operation and maintenance and how these might vary over time. There is a view that these costs could ramp up towards the end of the regulatory life of the assets with less spend in the early years. This further emphasises the view that the chosen mechanism should have provisions for dealing with unforeseen movements in costs.

Traditionally regulatory control periods have followed a path of 5-years. However, there is precedent for longer price control periods for Independent Distribution Network operators (IDNO) and Independent Gas Transporters (IGT). Price control periods of 10-years have been established in both of these cases.

The uncertainties surrounding offshore transmission give rise to the possibility of implementing a shorter control period initially covering the period from preconstruction through to commissioning of assets. Thereafter it may be appropriate to extend the price control period when there is greater transparency of costs that can be tracked and compared more easily against other TOs.

Consideration may also be given to separate control periods for capital and operation and maintenance expenditure. At this stage of the process it would be helpful to form a view on the potential duration any price control period could take. However, there is no over riding requirement to make a decision at this stage in the process. The possibility also exists for the price control duration to be varied at some point in the future.

Q12. Is it reasonable to implement a shorter price control period initially to enable the capture of data and to form a view on certainty of costs, and if so, how long should this be?

# Q13. Would the separation of control periods for capital and operation and maintenance expenditure have merit for offshore transmission?

# 5. Scope

The scope of the final price control for offshore transmission should be easier to identify once the commercial boundaries are determined. However, at this stage it is reasonable to assume that all assets owned by the offshore transmission operator will be included within the price control mechanism.

Another key consideration of any mechanism is how costs associated with obligations on the decommissioning of transmission assets, will be recovered by the transmission operator. While, it is recognised that these costs will not be incurred for some considerable time, it is considered essential that early clarity is provided on whether such costs will be funded via the price control. There is a view that such costs should be funded by the price control consistent with the statutory duty of GEMA under the Electricity Act to secure that licence holders are able to fund their activities.

If such costs are to be funded via the price control then consideration will be required as to the appropriate mechanism.

- Q14. Should decommissioning costs of transmission assets be funded via the price control?
- Q15. If so, what mechanisms might be appropriate for the recovery of these costs?

## 5.1 **Adoption Issues**

The treatment of assets constructed by third parties and offered for adoption by the TO under the price control is an important issue and one that could be covered by adopting a two-phase, transitional approach. However, the issue is outside the current scope of the subgroup remit and so detailed comment has not been made at this time, although it is recognised as a key issue for future consideration.

#### 6. Conclusion

This paper forms the basis of the discussion from the meeting of the subgroup and it is intended to cover the main issues that require to be addressed prior to the implementation of a price control mechanism for offshore transmission.

The paper does not attempt to provide solutions on what should be incorporated in the final price control mechanism. However the questions outlined within the paper will hopefully generate further debate and highlight any issues that might have been overlooked by the group at this stage.

The group would welcome comments that will inform Ofgem/Dti's autumn consultation expected towards the end of October.

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