

## **DISTRIBUTION NETWORKS PRICING CONSULTATION PAPER DNPC06**

### **Proposals for LDZ Charges to Recover NTS Exit Capacity Costs**

#### **A consultation paper on behalf of all Distribution Networks**

## **1 1. Introduction**

Currently NTS Exit Capacity and Commodity Charges for transportation to DN connected supply points are set by National Grid (NG) NTS and the revenue from the charges paid by DN shippers is credited directly to NG NTS.

Under the provisions of UNC Modification 195AV with effect from 1 October 2012 DNs will purchase NTS Exit Capacity (NTS Offtake Flat) and book NTS Offtake Flexibility Capacity at NTS/LDZ Offtakes from NG NTS. At the same time NG NTS will cease to levy NTS Exit Capacity Charges direct to DN shippers.

Under Special Condition E6, paragraph 2, of the DN Transporter's Licence the total costs incurred by a DN Licensee for NTS Exit Capacity (NEC) in respect of all NTS/LDZ Offtakes in its Distribution Network will be included in the DN's Allowed Revenue and the DN will then charge the DN shippers to recover the cost of these NTS charges. To do this, the DNs are proposing that new LDZ charges be introduced, to be called LDZ NEC Charges, where NEC stands for NTS Exit Capacity. These charges will be payable by DN Shippers to the DNs. For the avoidance of doubt the DN shippers will continue to pay the other NTS charges (including all NTS Commodity Charges) in respect of their DN registered supply points and DN CSEPs to NG NTS.

The purpose of this paper is to consult on how these new LDZ NEC Charges which will be applied with effect from 1 October 2012 will be structured.

## **2 NTS Exit Reform**

In order to implement NTS Exit Reform, UNC modification 195AV introduced NTS Offtake (Flat) Capacity, which will be available as Enduring, Enduring Annual, Daily and Off-Peak Daily (interruptible) capacity products from 1 October 2012. The Enduring and Enduring Annual Products will be released by means of application windows whilst the Daily and Off-Peak Daily products will be released through auction. The NG NTS Proposals for charging for Enduring Exit Capacity were set out in consultation document NTS GCM 05 NTS Exit (Flat) Capacity. The main proposals in this document were:

- Nodal, offtake specific exit capacity charges would be set.
- Exit capacity charges would be calculated using the prevailing charging methodology for NTS exit capacity charges based on the use of the Transportation model. This methodology is briefly described in NTS GCM05.
- NTS Interruption credits would be removed from the NTS charging methodology.

Indicative charges published in the above document showed that the NTS charges would be a flat pence per peak day kWh per day rate at each NTS/LDZ Offtake and would be applied to DN capacity booked at each NTS/LDZ Offtake. The NTS Indicative charges published in GCM05 are shown in Appendix 1.

### 3 DNP04 Discussion Paper

In April 2009 the DNs published DNP04, a Discussion Paper setting out initial proposals for the LDZ NEC Charges, although in that paper they were referred to as LDZ Exit Capacity Charges. This Paper set out four questions for discussion. There were six responses to the Paper, five from shippers and one from an end-user group.

#### DNP04 – Responses to Questions for Discussion

(1) **Should LDZ Exit Capacity Charges be based on a flat rate pence per peak day kWh per day rate in the same way as the NTS Exit Capacity Charges are now or should some alternative be considered.**

All five shippers and the end-user association supported basing LDZ Exit Capacity Charges on a flat rate pence per peak day kWh per day in the same way as the current NTS Exit Capacity Charges. Different reasons were given for supporting this proposal, including that it would avoid complexity, it would be cost reflective because it would reflect the NTS charges, and that there was no compelling reason to change.

(2) **Should LDZ Exit Capacity Charges be applied by Offtake, by Exit Zone or by Network, or should they be included in the existing LDZ system charges or should some other alternative be considered.**

- **By Offtake:** Five of the six respondents were not in favour of charges being applied by Offtake mainly because of the likely increased variability of charges and additional costs for shippers. They also did not think there was much to be gained from increased cost reflectivity through this option, given the lack of a stable mapping from NTS Offtake to supply point.
- **By Exit Zone:** Four of the five shippers and the end-user association supported DN Exit Charges structured by Exit Zone. The main reasons given were that it was felt it would provide more stable charges than the other options, that because it was based on the existing structure of charges it may involve the least change and cost for shippers, and that it may provide the best practical degree of cost reflectivity.
- **By Network:** Two shippers supported this option along with the Exit Zone option. One said it believed it would produce predictable and transparent charges and involve limited changes to shippers' systems. The other said Network aligned charges may be more stable than the other options, easier to administer and consistent with other DN charges. Two shippers were against because of loss of cost reflectivity, and the End User Association was against because they thought it went too far in diluting locational charging elements. The remaining shipper did not support or oppose the proposal but said it would be the simplest to operate.
- **Include in existing LDZ system charges:** None of the respondents supported this option, mainly because they thought it could be less cost reflective than keeping separate charges, and because it could reduce transparency.

- (3) **Should the misalignment of NTS and DN dates for changing charges be addressed by the DNs seeking to change the LDZ Exit Capacity Charges in October or should no change be sought until the industry has some experience of the operation of the new regime.**

There was no support among respondents for an October change for the LDZ NEC charges. Respondents generally thought that the issue would not be material because the NTS capacity bookings and charges would be reasonably predictable, and that it would be better to gain some experience of the new arrangements before making any changes.

- (4) **Should we introduce a separate K for the LDZ Exit charges, for the purposes of setting the level of the charges.**

Four respondents supported the concept of a separate K, on the basis that they felt it would be more cost reflective and that over/under recovery would be paid back to shippers in the same proportions in which it arose. One shipper did not support the proposal and one did not respond to this question.

#### 4 DNs' Proposals following DNP04

- 4.1 Type of Charge** The primary objective of the charging methodology is that it should lead to charges which are cost reflective. On that basis the LDZ NEC Charges should reflect the costs incurred by the DNs through the NTS charges. This would imply that the LDZ NEC Charges to supply points should be structured to reflect as closely as possible the NTS charges applied to the DNs. The most cost reflective charges would therefore be based on a flat pence per peak day kWh per day unit rate applied to the supply point capacity (SOQ). The unit rate would therefore not vary with the size of the supply point SOQ as most existing LDZ charges do.

All the respondents to DNP04 supported this option for the type of charge,. Therefore this is the only type of charge which is proposed.

- 4.2 Application of the Charge** A new charge based on a flat pence per peak day kWh per day unit rate applied to the supply point SOQ, following the NTS structure, could be set by Offtake, by Exit Zone or by Network. (The NG NTS proposal is that the capacity charges to the DNs will be charged by NTS/LDZ Offtake.) These three options were discussed at length in DNP04.

- (1) **By Offtake** – In view of the lack of support for this option in the responses to DNP04 it is not proposed to consider this option further.
- (2) **By Exit Zone** - This is how the NTS Exit Capacity Charges are currently applied for DN supply points. The Exit Zone based charge would effectively be a capacity-weighted average of the individual NTS/LDZ Offtake charges for all the NTS/LDZ Offtakes making up the Exit Zone. There should be no practical problems in applying LDZ NEC charges on this basis as all DN supply points are already mapped to Exit Zones. Currently the mapping of DN supply points to Exit Zones does not change from year to year. However there is flexibility under Exit Reform for the DNs to book Exit

Capacity from different offtakes which may, over time, lead to the re-mapping of some supply points between Exit Zones, which might create winners and losers.

In DNP04 charging by Exit Zone was considered to be the most cost-reflective practical option and would be consistent with the current NTS charging arrangements (although under the new NTS Exit arrangements the current Exit Zones will cease to have any charging relevance). It was also the option which received the most support from respondents.

In the NTS Charging Methodology the complexity of charging by directly connected NTS supply point and by Exit Zone was justified by the locational signals provided. This methodology has advantages at the NTS level, particularly as applied to new large NTS-directly connected supply points, and continues to apply for NTS-directly connected loads.

However these advantages do not apply to any significant extent within the Distribution Networks. In charging by Network as opposed to by Exit Zone it is only the locational signals within each Network which would be lost. However the differences in the NTS Exit Capacity charges across the Exit Zones within the Networks are relatively small compared with the differences between the Networks (See Appendix). Locational signals really are only of benefit in decisions on the location for new loads where the possible variation in the gas distribution transportation charge would comprise a significant factor in the business costs. This is unlikely to be the case within the Networks because the potential variations are likely to be small. Within the DNs factors other than small variations in gas distribution charges are probably typically key to location decisions.

In addition, the provision and maintenance of capacity for DN supply points will involve DN pipeline capacity, DN interruptible contracts and the DN purchase of NTS Exit Capacity. The level of NTS Exit Capacity booked at a particular NTS offtake or group of offtakes will depend not just on the supply point capacity of loads which may be deemed to be supplied through the offtake(s) but by the configuration of the DN pipeline network and the use of interruption contracts. For example, where the DN enters into an interruption contract it would expect to purchase a lower level of NTS Exit capacity at a relevant NTS offtake. These interactions and the fact that capacity capability within the distribution network is dynamic, varying across days, seasons and years, mean that the reflection of the DN's NTS Exit Capacity costs alone in a geographically-varying charge would provide at best a partial and possibly a misleading, locational charge signal which is useful to very few loads.

Charging by Exit Zone would introduce additional complexity and volatility into the DN Charging Methodology. It would mean that the annual changes in the NTS charges would be reflected in the LDZ charges, with some charges going up while others may be going down. This will mean greater volatility in the charges to individual supply points than if the charging were done on a Network basis.

- (3) **By Network** – The total NTS/LDZ Offtake charges for a DN would be averaged across the whole Network by averaging the total DN cost of NTS exit Capacity over the total DN capacity base. There would be some significant advantages in applying these charges by Network including:-

- There would be significantly less volatility in the charges because there would be just one percentage change when the charges were changed and this is likely to be smaller than the changes which would apply to individual Exit Zones.
- The major part of the NTS locational signals, i.e. those between the Networks would be retained, so that for example the Exit Charges in the South of England and Wales & West would still be much higher than in Scotland.
- Any reductions in the cost of NTS Exit Capacity which a Network achieves due to having interruption contracts would be spread equally across the whole Network.
- LDZ NEC charges on a Network basis would be more easily compatible with future developments such as biogas which would have direct entry to the Networks. With the introduction of DN Entry points capable of supplying a significant part of the load within the DN the existing deemed linkages of Supply Point locations to NTS Exit zones will change and is likely to become more complex.
- Charging on a Network basis would allow the DNs to take full advantage of whatever flexibility of booking NTS Exit Capacity from different offtakes is available without the possibility of having to re-map sites from one Exit Zone to another, which might create winners and losers.
- The existing principle of having the same DN charges across the whole Network would be maintained and the charging would be the simplest to administer.

The DNs are now of the opinion that this option has significant advantages and relatively few disadvantages compared to charging by Exit Zone and so this is the DN favoured option.

## **5 Other Charges and Adjustments**

### **5.1 Flex Capacity Charges**

Under the current proposals the DNs will not be charged for Flex Capacity by the NTS so there will be no Flex Capacity Charges to consider.

### **5.2 Other NTS Charges**

There are other NTS charges, including TO Entry Capacity charges, Entry and Exit Commodity charges and Short-haul charges, which will continue to be levied by NG NTS and will not affect the LDZ NEC Charges applied by the DNs.

### **5.3 Interruptible Contracts**

After 1 October 2011 all DN supply points will be firm and will pay firm Capacity Charges. Through the Interruption Invitations DNs are able to purchase interruption rights from supply points. Where interruption rights have been secured it is likely that the requirement for NTS Exit Capacity will be reduced. For clarity therefore, the total to be recovered through the LDZ NEC Charges will be based on the total DN cost of NTS Exit Capacity.

## 6 Timing of Changes to the Level of Charges

NG NTS changes its Exit Capacity Charges on 1 October each year. With effect from 1 April 2009 the normal date for the DNs to change their charges, specified in their Licences (Standard Special Condition A4,2(a)), is 1 April each year.

This misalignment in the timing of changes to the NTS and DN charges may need to be addressed if it regularly causes additional under- or over-recovery for the DNs contributing to additional instability in the level of the DN charges. Currently their Licences allow the DNs to change their charges at dates other than 1 April if there is good reason to do so and they inform Ofgem. Therefore the status quo could be maintained until some experience has been gained of the operation of the new regime.

In DNP04 there was no support among respondents for an October price change for LDZ NEC Charges. Respondents generally thought that the issue would not be material because the NTS capacity bookings and charges would be reasonably predictable, and that it would be better to gain some experience of the new system before making any changes. However it may be noted that an October price change date for these charges would not mean any significant change for shippers because as administered by NG NTS these charges currently change on 1 October.

## 7 Separate Management of K

The DNs are also proposing to identify, within K, the element that relates to the recovery of the cost of the NTS Exit Capacity Charges within the DNs' Allowed Revenue so that this element may be managed separately. In NTS GCM12 the NTS introduced the concept of the separate management of the Entry and Exit elements of TO K.

The separate management of the element of K relating to the recovery of the cost of the NTS Exit Capacity Charges would mean that each DN would monitor separately the amounts it paid to the NTS for Exit Capacity and compare these with the revenue from the LDZ NEC Charges. The difference between these two would be "K (NEC)". Assuming an April price change, then in January of each formula year the forecast K (NEC) for that formula year would be taken into account in setting the level of the LDZ NEC charges for the following formula year. K NEC would therefore not affect the setting of the level of the existing LDZ charges but it would be included in total DN K for regulatory purposes

This separate management of the element of K relating to the LDZ NEC Charges would mean that under- or over-recovery within a period could be recovered from or paid back to shippers in the same proportions in which it arose. This might be seen to be fairer than combining the Exit Capacity over- or under-recovery within the total DN K as this would mean that recovery from or repayment to shippers would predominantly reflect the structure of the LDZ System and Customer charges.

This separate identification of a K NEC could be beneficial whatever the price change date for the LDZ NEC Charges. It would be established purely for charge-setting purposes so that no formal modification of the DN licence "K" would be required. It would also show clearly whether an October price change date for these charges would contribute to greater price stability.

## 8 Objectives of the Charging Methodology

The introduction of new DN charges would mean a change to the charging methodology so it should therefore be considered with respect to the achievement of the objectives of the charging methodology, set out in Standard Special Condition A5 of the Gas Transporter Licence. The relevant objectives are:

- (a) That compliance with the charging methodology results in charges which reflect the costs incurred by the licensee in its transportation business;
- (b) That, so far as is consistent with (a), the charging methodology properly takes account of developments in the transportation business;
- (c) That, so far as is consistent with (a) and (b), compliance with the charging methodology facilitates effective competition between gas shippers and between gas suppliers.

### (a) Cost Reflectivity

For the reasons provided above, the DNs consider that the new charge should be determined either on an Exit Zone or DN-wide basis. Although structuring the charge on an Exit Zone basis might be considered to provide slightly better cost-reflectivity than on a DN-wide basis, as noted previously this would result in only a partial degree of locational cost reflectivity which would not reflect the full locationally-driven costs, and so could provide a misleading locational charge signal which in practice would be relevant to very few new loads. Taking into account these wider cost-reflectivity issues, the DNs consider that structuring the charge on a DN-wide basis would provide an equivalent level of overall cost reflectivity and, as noted previously, has many other advantages.

The levels of the charges could also be kept more cost reflective if the timing of changes to the LDZ NEC Charges were aligned with the timing of changes to the NTS Exit Capacity charges. A separate K NEC would also help to ensure that an appropriate level of revenue was obtained from LDZ NEC Charges over a number of years, so improving cost reflectivity.

### (b) Take account of developments within the transportation business

The proposals for LDZ NEC Charges take account of NTS Exit Reform and the changes in the way NTS Exit Capacity will be booked from 1 October 2012.

### (c) Facilitating Competition

The proposed change would probably have little impact on competition between shippers but would do nothing to discourage it.

## 9 Impact of the Change

The immediate impact of the change would probably be minimised if the DN charges are based on Exit Zones as the NTS charges are at present (the second option in Section 4). However if the charges were done on a Network basis (the third option in Section 4) it is likely that they would be more stable in the future.

## 10 Implementation of the change

The change would be implemented on 1 October 2012 to coincide with the implementation of the changes to the way the NTS Exit Capacity charges are levied. The DNs have asked xoserve to provide high-level estimates of the costs of changes to their billing systems under each of the options.

## 11 Questions for Consultation

Responses are invited on any issue within the paper or on any other relevant issues which may have been omitted. We would particularly welcome comments on:

- (1) Should LDZ NEC Charges be based on a flat rate pence per peak day kWh per day rate in the same way as the NTS Exit Capacity charges are now?
- (2) Should LDZ NEC Charges to be applied by Network or by Exit Zone as discussed in Section 4?
- (3) Should the misalignment of NTS and DN dates for changing charges be addressed by the DNs seeking to change the LDZ NEC Charges in October or should no change be sought until the industry has some experience of the operation of the new regime?
- (4) Should the DNs seek to introduce management of a separate K NEC relating to the LDZ NEC charges, for the purposes of setting the level of these charges?

Responses to this Consultation Paper should be sent to [enquiries@gasgovernance.co.uk](mailto:enquiries@gasgovernance.co.uk) to arrive by close of play on 19 February 2010.

Questions on the content of the paper can be directed to any of the following:-

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### Appendix

This table shows Indicative NTS Charges. The equivalent LDZ NEC Charges by zone or by network may be slightly different

<b>2012/13 Indicative NTS Charges - Capacity Weighted</b>	
Charges taken from NTS paper GCM05	pence/pk day kWh per day
<b>Northern Gas Networks</b>	
<b>Exit Zone</b>	
NE1	0.0008
NE2	0.0017
NE3	0.0045
NO1	0.0063
NO2	0.0056
<b>Northern Gas DN</b>	<b>0.0036</b>
<b>Wales &amp; West Utilities</b>	
<b>Exit Zone</b>	
SW1	0.0158
SW2	0.0220
SW3	0.0332
WN	0.0227
WS	0.0095
<b>Wales &amp; West DN</b>	<b>0.0187</b>
<b>Scotia Gas Networks</b>	
<b>Exit Zone</b>	
SC1	0.0001
SC2	0.0001
SC4	0.0002
<b>Scotland DN</b>	<b>0.0002</b>
SE1	0.0153
SE2	0.0205
SO1	0.0155
SO2	0.0228
<b>Southern DN</b>	<b>0.0181</b>
<b>National Grid Gas</b>	
<b>Exit Zone</b>	
EA1	0.0088
EA2	0.0066
EA3	0.0100
EA4	0.0039
EM1	0.0157
EM2	0.0057
EM3	0.0075
EM4	0.0068
<b>East of England DN</b>	<b>0.0075</b>
NT1	0.0126
NT2	0.0124
NT3	0.0170
<b>London DN</b>	<b>0.0155</b>
NW1	0.0206
NW2	0.0177
<b>North West DN</b>	<b>0.0192</b>
WM1	0.0171

WM2	0.0148
WM3	0.0151
<b>West Midlands DN</b>	<b>0.0155</b>