



Gas Regional Initiative North West Regional Energy Market

Transmission Transparency Project Second Implementation Report

Ref: GRI-NW-RCC-21-11 Final Version 21-11-2008



Document history

Version	Date	Description	Author			
1	07 Nov 2008	Draft circulated to Stakeholder Group for feedback and discussion at 14 November workshop	Ofgem			
2	21 Nov 2008	Final draft Changes to reflect clarifications or commitments provided by: - BBL - Fluxys - BNetzA - National Grid	Ofgem			



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1 Introduction

The European Regulators Group for Electricity and Gas (ERGEG) launched its Electricity and Gas Regional Initiatives (ERI and GRI) in spring 2006. The Regional Initiatives framework created seven electricity regions and three gas regions in Europe. The Gas Regional Initiative North-West (GRI NW) comprises nine countries¹ and is the largest of the three Gas Regional Initiatives in terms of market size and geographic scope.

The overall aim of the Regional Initiatives is to facilitate the development of regional gas and electricity markets, working in cooperation with stakeholders, to remove barriers to trade and competition. The Regional Initiatives take a bottom up approach to reform by identifying the key barriers to progress and where possible, work with stakeholders to implement appropriate solutions.

There is a consensus among stakeholders that the main priorities for GRI NW are transparency, capacity and investment². These issues are critical to developing a market where gas can be freely traded between Member States on a non-discriminatory basis. Other areas identified as a lower priority were gas balancing, gas quality, the creation of trading hubs and storage. This report focuses on the progress in transparency.

The energy sector review by DG Competition³ highlighted the absence of information regarding the availability of gas transmission capacity as one of the main shortcomings in the market. Access to information on available network capacity and on the probability of interruptions is important to enable shippers to flow gas across Europe and to increase gas trading⁴.

A lack of information on available transmission capacity also acts as a barrier to entry for new market participants. This is especially true where the Transmission System Operator (TSO) is part of a vertically integrated company that may use its information advantage in transmission to effectively block entry in other parts of the gas market supply chain. It is impossible to guarantee non-discriminatory market access and gas trading on a regional basis in the absence of effective transparency.

As this report does not approve or guarantee the accuracy of the data submitted by TSOs we welcome feedback from stakeholders on the validity of the TSOs reported progress.

¹ Belgium, Denmark, France (Northern zone), Germany, Great Britain, Ireland, Netherlands, Northern Ireland, Sweden, with Norway acting as an observer

² "Roadmap and Vision for the Gas Regional Initiative North West" presented at the third stakeholder group meeting April 2008

The European Commission's Directorate General for Competition (http://ec.europa.eu/comm/competition/index_en.html)

⁴ As identified in the European Commission's energy sector inquiry http://ec.europa.eu/comm/competition/sectors/energy/inquiry/index.html



Stakeholders discussed project progress at the transparency workshop that took place at the NW GRI Stakeholder Group meeting on 14 November in London.

Written feedback was requested by Friday 21 November. Feedback has been taken into account for the completion of the report (for latest changes, please see document history above). Should you have any further comments on the final version of this report, please feel free to send those in electronic form to transparency@ofgem.gov.uk or hard copies to the address below. Your comments will be taken into account in the Final Implementation report to be published in February 2009.

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We would welcome stakeholder views on the following areas:

- 1. Overall progress of the project and how this may be improved
- 2. The quality and consistency of the data published by the TSOs in your area of responsibility/operation
- 3. The accuracy of the report and its conclusions
- 4. Next steps for GRI NW Transparency work



2 Purpose of the report

The purpose of this report is to comment on the implementation of the TSO Transmission Transparency Project. In December 2007 sixteen TSOs⁵ presented a project plan which committed them to publishing information on capacity availability and gas flows at cross-border interconnection points in the North-West gas region. In addition BBL, who operate the interconnector between Great Britain and the Netherlands, has become an active participant for the second and final stages of the transparency project.

The data types to be published were agreed between TSOs and network users. It was agreed that TSOs would release new information on capacity⁶ and actual gas flows⁷. The TSOs have committed to publishing the agreed information by three project milestones May, September or December 2008. The implementation report for the first stage of the project was published on 25 July.

In October 2008 the TSOs submitted data to Ofgem on implementation progress for the second stage of the transparency project. This report presents the data submitted by the TSOs for the second stage of the project, provides comment on implementation progress and explains the next steps.

As this report does not approve or guarantee the accuracy of the data submitted by TSOs we would welcome feedback from stakeholders on the appropriateness of the reporting format and the validity of the TSOs reported progress.

3 Background

At workshops in Bonn and Dublin, respectively in February and April 2007, stakeholders in the North-West Gas Regional Initiative agreed that network users, represented by European Federation of Energy Traders (EFET) and International Federation of Industrial Energy Consumers (IFIEC), would produce a detailed list of information requirements on behalf of gas market participants. The TSOs agreed to respond to this list with concrete proposals to improve transparency.

Questionnaires were sent to all TSOs in the region in May and June 2007. The questionnaires, prepared by EFET and the International Federation of Industrial Energy Consumers (IFIEC), built up a picture of the information that was already being published by TSOs and highlighted potential barriers identified by TSOs to further transparency improvements.

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⁵ RWE Transportnetz Gas, Fluxys, E.ON Gastransport, Svenska Kraftnät, National Grid, BGE, GRTgaz, GTS, WINGAS TRANSPORT, Interconnector UK, Ontras, Energinet, Gasunie Deutschland, DEP, Swedegas, Gaz de France Deutschland Transport

Max technical capacity, interruption probability, daily commercial firm and interruptible capacity
 Daily flows and interruptions, daily prompt allocations, Daily aggregate day-ahead nominations, historic gas flows



The results of the transparency questionnaires were presented at the September 2007 mini-workshop in London and a summary report was published on the ERGEG website8. At the workshop, TSOs and user groups agreed that the key priority for improving transparency was the provision of daily information on capacity and gas flows at cross-border interconnection points. TSOs committed to produce a project plan for the release of information on the seven specified data types (set out in section 4.2) at cross-border interconnection points.

The TSOs presented their initial Transmission Transparency Project Plan at the October 2007 Stakeholders Group meeting in The Hague. This plan set out the information that TSOs had agreed to provide and the milestones for the publication of all of the agreed information. A final draft of the project plan was presented and agreed upon at the Regional Coordination Committee in December 2007.

In May 2008 TSOs submitted initial data for implementation of the first stage of the project. A draft report on project progress was presented at a mini-workshop held in London on 10 July where stakeholders were invited to provide feedback. A final report was published on the ERGEG website on 25 July 2008.

The first project implementation report found that progress had been made by TSOs in releasing new information for market participants9. For the first stage, the project was ahead of schedule in releasing data on historic gas flows (F4) due to early implementation by E.ON Gastransport and DEP¹⁰. The project was also broadly on track for releasing new data on daily commercial and interruptible capacity (C3) and daily prompt allocation information (F2).

The areas where the project had fallen furthest behind with the original implementation schedule were for the release of information on the probability of interruption (C2), aggregate daily flow/interruption information (F1) and aggregate day-ahead nominations (F3). Half of the 16 TSOs still had to publish information on these data types in the second and final stages of the project. The project was also behind schedule for the release of information on maximum technical capacity (C1). However, in this case only one TSO delayed implementation.

⁸ http://www.energy-regulators.eu/portal/page/portal/EER_HOME/EER_INITIATIVES /GRI/North_West /Achievements/Transparency

http://www.energy-

regulators.eu/portal/page/portal/EER HOME/EER INITIATIVES/GRI/North West/Final%20docs/N W%20GRI%20Transparency%20implementation%20report%20-%2025Jul08.pdf

¹⁰See annex 1 for more detailed data definitions



4 The project plan

4.1 Objectives

As set out in the project plan presented at the October 2007 Stakeholders Group meeting, the overall objectives of the project are to:

- improve the publication of capacity and flow data to a high standard;
- provide clarity over current and proposed published data definitions; and
- demonstrate TSO commitment to respond to network users and market requirements.

At the April 2007 Dublin workshop user groups expressed a preference for the rapid release of new information with respect to cross-border interconnector points rather than a focus on producing information in a standardised or particular format.

4.2 Deliverables

The September mini-workshop held in London provided an opportunity for stakeholders to reach agreement on the specific data to be released by TSOs in 2008. It was decided that TSOs would release data for cross-border interconnection points to describe actual gas flows and transmission capacity at each point. The specific data list is described in table 1 below. A more detailed description of each data type that TSOs have committed to release is provided in annex 1.

Transmission Capacity									
(C1)	Max technical capacity								
(C2)	Interruption probability								
(C3)	Daily commercial firm and interruptible capacity								

Gas Flo	Gas Flows									
(F1)	Daily flow and interruptions									
(F2)	Daily prompt allocations									
(F3)	Daily aggregate day-ahead nominations									
(F4)	Historic gas flows									

Table 1 – Data types to be released by TSOs for cross-border interconnection points

It should be clear that all the information requested is already available to TSOs and is essential to creating an environment in which customers can trade gas freely between Member States on a non-discriminatory basis.

For any interconnection point, information on maximum technical capacity is easily obtainable and held by all TSOs. Publishing this information enables market participants to analyse local transmission constraints. It also signals the potential for network investment and development to the market. It is important that, in publishing information on technical capacity, TSOs also provide clarification on how they define and calculate maximum technical capacity.



The publication of daily commercial firm and interruptible capacity enables customers to determine what capacity is available for purchase and what has already been sold. Without this information it is impossible for network users to determine network utilisation rates and assess capacity constraints. It also means that, in the absence of a perfectly effective Chinese wall, supply affiliates of vertically integrated TSOs may have an unfair information advantage when competing downstream in the supply markets with other network users.

Information on interruption probability is important as it allows customers to understand the potential costs and risks of entering into a contract for interruptible transmission capacity. Without this information it is not possible for customers to assess the relative value of firm and interruptible contracts.

An exact definition of interruption probability could not be agreed by TSOs and stakeholders. It was agreed that, if the information listed in table 5 (annex 1) were published, shippers would have sufficient information to estimate the probability of being interrupted. Shippers are still invited to develop a common definition of interruption probability based on the information in table 5.

Customers require information on actual gas flows (daily prompt allocation information) in order to determine their costs. This information is commercially sensitive and is only provided to individual customers on an individual and confidential basis. However, aggregated information on daily flows and interruptions at an interconnection point, published on an ex-post basis (after the day), helps customers to assess the risk of interruption and manage the related potential costs.

The publication of information on daily aggregate day-ahead nominations enables customers to make an assessment of available capacities at each interconnection point. This would enable customers to adjust their nominations to utilise unused capacity and result in more efficient utilisation of the existing infrastructure. The release of historic gas flow information for interconnection points contributes to the assessment of the likelihood of interruption and helps assess grid capacity constraints.

4.3 Timeline

TSOs committed to the following timeline (table 2) for the release of new information. The table sets out the project milestones against which TSOs expect to be able to release data. All TSOs (now seventeen, as a result of BBL joining the project) committed to releasing all of the data types described in table 1 for the relevant interconnection points before the end of the project period in December 2008. A detailed breakdown of the milestones committed to by individual TSOs can be found in annex 2.



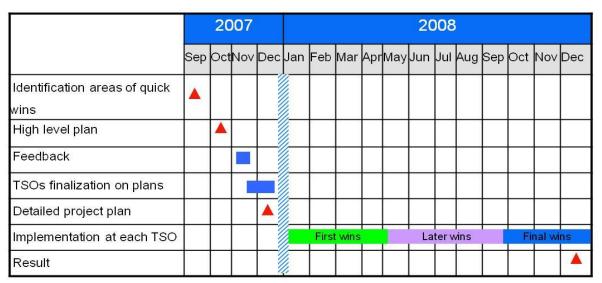


Table 2 – Project timeline

4.4 Scope

The European Gas Regulation¹¹ requires TSOs to publish information on technical, contracted and available capacities for all relevant entry and exit points on a regular basis and in a user-friendly standardised manner. However, at this stage, the scope of the project is for TSOs to release the relevant data for cross-border interconnection points. Interconnection points between TSOs respective networks within Member States are outside of the scope of the current project. However, this does not prevent TSOs from meeting their obligations under the Gas Regulation and publishing the required information for all relevant points.

Where a TSO considers that it cannot make all the required information public due to confidentiality concerns, it must seek authorisation from the relevant national authority to limit publication. It is only possible to grant authorisation to limit the release of information where less than three network users have contracted for capacity at the same point. The Regional Coordination Committee (RCC) approved guidance on the application of the "less than three shipper rule" by TSOs, competent authorities and network users ¹².

¹¹ Regulation (EC) No. 1775/2005 of the European Parliament and of the Council of 28 September 2005 on conditions for access to the natural gas transmission networks

Available on the GRI NW transparency website: http://www.energy-regulators.eu/portal/page/portal/EER HOME/EER INITIATIVES/GRI/North West/Meetings/SG meetings/2nd_NNW_SG/DD/Cover%20note%20and%20revised%20less%203%20post%20consultclean.doc



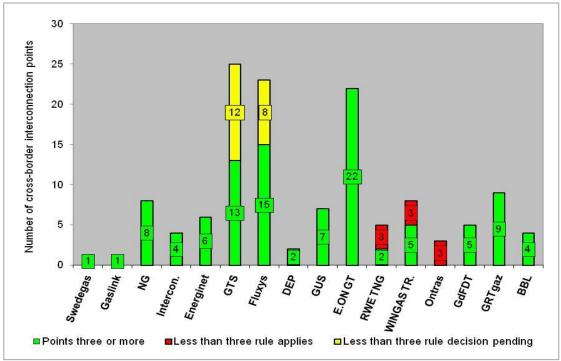


Figure 1 – Number of cross-border interconnection points, within the scope of the project that TSOs have identified as subject to the less than three shipper rule

Currently, of the 133 cross-border interconnection points identified, the TSOs consider that at 104 points there are no confidentiality concerns. The number of cross-border interconnection points for which individual TSOs will make data available is summarised in figure 1. A detailed breakdown of these interconnection points is included in annex 4.

The number of interconnector points for which TSOs are able to release information has increased as the project has progressed. Table 3 shows that the proportion of interconnection points subject to the less than three shipper rule has declined since the start of the project¹³. The observed decline is the result of both action by individual TSOs to negotiate with shippers over the application of the rule and the relevant regulatory authority's decision on whether the rule should be applied.

For example, both E.ON Gastransport and RWE Transportnetz Gas reported that they were able to reach agreement with shippers that information can be released for an increased number of interconnection points. Gasunie Deutschland and WINGAS TRANSPORT reported that the relevant regulatory authority, BNetzA, has taken a decision with regard to the number of interconnection points to which the less than three shipper rule shall apply.

¹³ Table 2 does not include the interconnection points that E.ON GT considered to be subject to the less than three shipper rule before the start of the project.



	January 2008	May 2008	September 2008
Total number of Interconnection points	126	128	133
Subject to less than three shipper rule	35	33	29
Authority's decision pending	35	32	20
Per cent "confidential"	28%	26%	22%
Per cent "pending"	28%	25%	15%

Table 3 – Change in number of interconnection points, within the scope of the project, subject to the less than three shipper rule

There are still 20 cross border interconnection points where the relevant regulatory authority's decision on whether the less than three shipper rule should be applied is pending.

5 Less than three shipper rule

Following the publication of the first draft project report, TSOs were asked to provide further information regarding the application of the less than three shipper rule. Each TSO was asked to specify:

- whether it had requested that the less than three shipper rule be applied;
- the interconnection points subject to a request;
- if the responsible regulatory authority had taken a decision regarding the application of the rule; and
- the data types that would be published for interconnection points subject to the less than three shipper rule.

The TSO response rate for providing the requested information was very good. For the second implementation report this process has been formalised and the relevant questions included in the TSO questionnaire. Full details regarding the application of the less than three shipper rule to specific interconnection points can be found in annex 4. In the following section of the report we provide an overview of the impact of the less than three shipper rule on the release of information.

5.1 Impact on data release

The table below provides an overview of the impact of the less than three shipper rule on the data that will be released by TSOs. As discussed in section 4.4 of the report there are now only five TSOs that report to have interconnection points subject to the less than three shipper rule. Table 4 provides a comparison of the data that TSOs have committed to release for interconnection points where the less than three shipper rule applies.



In all cases the application of the less than three shipper rule reduces the number of data types that TSOs are able to release. However, it is clear that in each case, shippers or TSOs may have a different understanding of data that is considered to be confidential. For example, WINGAS TRANSPORT reported that for interconnection points subject to the less than three shipper rule it will release all data types except for maximum technical capacity (C1), daily flows and interruptions (F1) and day-ahead nomination information (F3). While GTS report that, for interconnection points subject to the less than three shippers rule it will only release daily prompt allocation information to shippers (F2).

It is important to note that for Fluxys and GTS the decision of the relevant regulatory authority on the application of the less than three shipper rule to the requested interconnection points is still pending. Therefore the number of interconnection points to which the rule applies and the data types to be released may both be subject to change. It should also be noted that we have limited our consideration of the impact of the rule to the seven data types specified in the project.

	Less than three	Data Type												
TSO	shipper rule applies	C1	C2	C3	F1	F2	F3	F4						
RWE TNG	Yes	×	✓	ж	х	✓	×	×						
Fluxys	Yes	✓	×	×	×	✓	×	×						
GTS	Yes	×	×	×	×	\checkmark	×	×						
WINGAS TRANS.	Yes	×	✓	✓	×	✓	×	✓						
Ontras	Yes	✓	×	\checkmark	×	\checkmark	×	×						

Table 4 - comparison of data types to be published where the less than three shipper rule applies

6 Implementation Review

In their project plan TSOs committed to reporting on implementation progress in May, September and December.

It is important to note that in presenting this report we are not approving or guaranteeing the data submitted by TSOs and we would welcome feedback from other stakeholders on its accuracy.



6.1 Expected implementation progress

The graph below compares expected implementation progress at the outset of the project with observed implementation and expectations after receiving the TSO questionnaire responses for the project's second implementation stage. The graph presents the aggregate number of data types to be released by the TSOs participating in the transparency project. If all TSOs¹⁴ released all information then the maximum aggregate number of data types that could be published is 112¹⁵.

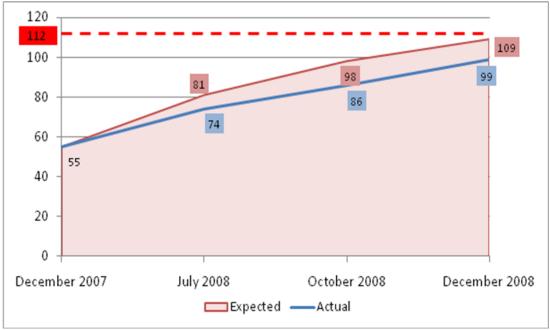


Figure 2 – Comparison of expected and actual aggregate implementation progress

As can be seen, actual implementation has been slower and less ambitious than expected at the outset of the project. The aggregate number of data types that has been published has increased from 55 in January to 86 in October. According to current implementation plans it is expected that the aggregate number published data types will increase to 99 by the end of the project. This is 13 less than could be published if all TSOs published all data types in the project. These 13 comprise data types that could not be released because of the less than three shipper rule (4) and data types that TSOs have not committed to publish in 2008 (9).

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This assumes the Swedish companies Svenska Kraftnät and Swedegas are jointly implementing the project requirements

^{15 16} TSOs x 7 Data Types = 112 (as Swedegas and Svenska Kraftnät are undertaking joint implementation we have counted them as one TSO)



6.2 Implementation by data type: second stage

Progress on implementation for the second stage of the project is mixed. For daily prompt allocation information (F2) all TSOs already provide this information. Six TSOs (RWE Transportnetz Gas, Gaslink, DEP, Gasunie Deutschland, Energinet.dk and Wingas Transport) reported to have successfully published new information between June and October 2008. For five of the data types implementation, for this stage of the project, is behind schedule only because of the failure of Swedegas to release the required information. These data types are:

- 1. Historic gas flows (F4)
- 2. Daily flow/aggregated allocation (F1)
- 3. Daily commercial firm and interruptible capacity (C3)
- 4. The probability of interruption (C2)
- 5. Maximum technical capacity (C1)

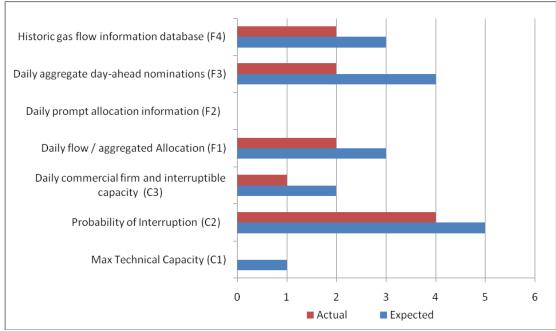


Figure 3 – October 2008 implementation status for individual data types

For the data type, daily aggregate day ahead nominations (F3) two TSOs (Gasunie and DEP) delayed publication of this information until the final stage of the project which ends in December 2009. A detailed analysis of implementation progress for each data type is carried out in the following section of the report. Annex 2 and 3 present the data on which the analysis in the following section was based.



For the first implementation stage of the project in May 2008, a number of TSOs delayed publication of specific data types until the second stage of the project in October 2008. Figure 4 provides an overview of the impact of delays on project implementation. The graph shows that TSOs that have delayed implementation from one stage of the project to another are far less likely to publish the expected information. Where, from the start of the project, information was expected to be released in the second stage, TSOs were able to release 11 out of 13 new pieces of information.

Where publication has been delayed from the original TSO implementation plan, only one out of five pieces of information was published during the second stage of the project. For the other 4 pieces of information, implementation has again been delayed to the final stage of the project.

Figure 4 also presents the data types for which TSOs have not committed to releasing information before the end of the project in December 2008. For these nine pieces of information implementation is currently expected after December 2008. Further details are provided in the following section of the report.

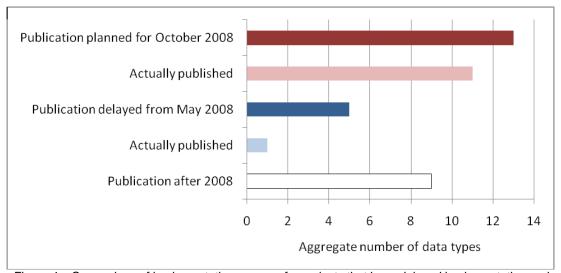


Figure 4 – Comparison of implementation success for projects that have delayed implementation and projects where implementation is on schedule for the second stage of the project

6.2.1 Max technical capacity (C1)

Only Swedegas still need to publish information on max technical capacity. All other TSOs report to have released the required information for this data type. At the start of the project Swedegas committed to publishing this data before May 2008. However, implementation has been delayed until December. In its response to the TSO questionnaire, Swedegas stated that the delay was due to other pressing matters.

The number of TSOs that release information for this data type are expected to increase from twelve to sixteen as a result of the transparency project. The only TSO that is still required to publish information on this data type is Swedegas.



6.2.2 Probability of interruption (C2)

Five TSOs (Gaslink, Energinet.dk, Gasunie, DEP and Swedegas) planned to release information on the probability of interruption during the second stage of the project. Three of the five TSOs (Energinet.dk, Gasunie and DEP) were able to release the information for this data type on schedule. WINGAS TRANSPORT had not initially committed to releasing information on the probability of interruption, but reported having done so during the second stage. As a result four TSOs were able to release information on this data type during the second stage. Swedegas delayed implementation until December.

Three TSOs (Ontras, Fluxys and Gaslink) have stated that they will not be able to release information on this data type before the end of the project in December. Ontras is unable to release the information as a result of the application of the less than three shipper rule.

In its questionnaire response Fluxys stated that currently no interruptions information is published on the website. Fluxys has now committed to publish this information by 15 January 2009, when a new IT system will be introduced by the company.

At the start of the project Gaslink committed to releasing information on the probability of interruption for the second stage of the project. However, in its questionnaire response, Gaslink commented that it does not currently offer interruptible capacity/transportation products on its network as there is currently sufficient firm capacity available for shippers to purchase. Gaslink plan to introduce an interruptible service in the fourth quarter of 2010¹⁶ as part of the Common Arrangements for Gas (CAG) project.

The number of TSOs that release information for this data type is expected to increase from four to thirteen as a result of the transparency project by December 2008. In order to achieve this target, Swedegas is required to publish information on this data type in the final stage of the project.

6.2.3 Daily commercial firm and interruptible capacity (C3)

Two TSOs (RWE Transportnezt Gas and Swedegas) planned to release information on this data type in the second stage of the project. RWE Transportnetz Gas reported to have successfully published information for this data type.

Swedegas were unable to release the information as planned and have delayed publication until December.

¹⁶ Subject to the approval of the National Regulatory Authority



BBL already publishes data relating to daily commercial firm and interruptible capacity on its website. However, this data is currently only partially published. BBL has committed to fully publishing this data in December 2008.

The number of TSOs that release information for this data type is expected to increase from eleven to sixteen as a result of the transparency project. In order to achieve this target Swedegas needs to publish information on this data type in the final stage of the project.

6.2.4 Aggregate daily flow and interruptions (F1)

Three TSOs (RWE Transportnetz Gas, Gaslink and Swedegas) planned to release information on this data type during the second stage of the project. RWE Transportnetz Gas and Gaslink reported that they have been successful in releasing the new information.

Swedegas were unable to release the information as planned and have delayed publication until December. Three other TSOs (Energinet.dk, BBL and WINGAS TRANSPORT) plan to release information on this data type in the final stage of the project by December 2008.

Two TSOs (Ontras and Fluxys) have stated that they will not be able to release information on this data type before the end of the project in December. Ontras is unable to release the information as a result of the application of the less than three shipper rule.

For Fluxys aggregate daily flows and interruptions are published on its historic gas flow database. This database is currently updated on a monthly basis. Therefore, Fluxys has not fully met the requirements of the project. However, Fluxys has stated that it is in the process of improving its IT system so that the update takes place on a daily basis. Fluxys has committed to release data on aggregate daily flow and interruptions by 15 January 2009.

The number of TSOs that release information for this data type is expected to increase from four to fourteen by December 2008. In order to achieve this target four TSOs (WINGAS TRANSPORT, Energinet.dk, Swedegas and BBL) will have to publish information on this data type in the final stage of the project.

6.2.5 Daily prompt allocation information (F2)

Implementation for this data type was completed by May 2008 as all TSOs provided this information to shippers on a confidential basis. The number of TSOs that provide this information has increased from thirteen to sixteen as a result of the transparency project.



6.2.6 Daily aggregate day-ahead nominations (F3)

Four TSOs (RWE Transportnetz Gas, Gaslink, Gasunie and DEP) planned to release information on this data type during the second stage of the project. RWE Transportnetz Gas and Gaslink reported successfully releasing the new information. Both Gasunie and DEP have delayed publication of this data type to the final stage of the project.

Gasunie Deutschland stated that the delay in publishing this information was due to its recent change in ownership and the introduction, in October 2008, of the new balancing regime in Germany. In its response to the questionnaire DEP stated that this service would be provided for its customers by Gasunie Deutschland.

Two other TSOs (Svenska Kraftnät and WINGAS TRANSPORT) expect to publish information on this data type in December before the end of the project.

There are seven other TSOs (Fluxys, National Grid, GRTgaz, Energinet.dk, GdF DT, BBL and Ontras) that have not committed to releasing information on this data type within the timeframe of the project. Ontras is unable to release the information as a result of the application of the less than three shipper rule.

Fluxys has stated that it is in the process of improving its IT system so that the update takes place on a daily basis. The company has committed to release data on day-ahead nominations by 15 January 2009.

National Grid stated that the consultation on the legal requirement for it to publish the required data will be completed before the end of the project in December. Actual publication will take place as part of a more general IT system upgrade in the first half of 2009.

GRTgaz stated that it is in the process of consulting with shippers on the publication of information on this data type. In its questionnaire response, GRTgaz explained that, depending on the outcome of a consultation with its shippers, the required information could be published in January 2009. The consultation with shippers regarding the planned publication will take place at the end of 2008.

In its questionnaire response Energinet.dk confirmed that individual shippers confirm their nominations at 18:00 before the gas day and that this information is not currently published. However, Energinet.dk did state that publication of this information is required as part of the second phase of the GTE+ transparency platform project. Therefore, Energinet.dk is planning to publish this information in the first half of 2009.

GdF DT responded that publication of this information would require major IT developments and process changes which could not be implemented before the end of the transparency project in December 2008. However, GdF DT has not committed to any timetable or plan for the release of this information after December 2008.



In its questionnaire response BBL indicated that it was not possible to provide this information in its current programme of IT system upgrades. However BBL did commit to publication of this information in the next round of IT systems upgrades which would take place in 2009. The exact date is subject to uncertainty due to the company's internal IT processes.

The number of TSOs that release information for this data type is expected to increase from two to nine in December 2008 as a result of the transparency project. In order to achieve this target five TSOs (Svenska Kraftnät, Gasunie Deutschland, DEP and WINGAS TRANSPORT) need to publish information on this data type.

Of the seven TSOs that have not committed to publishing the information in 2008, six have committed to processes which should result in the publication of the required data in 2009.

6.2.7 Historic gas flow database (F4)

RWE Transportnetz Gas, Swedegas and Gaslink planned to release information on this data type in the second stage of the project. RWE Transportnetz Gas and Gaslink reported that they have successfully released information for this data type.

Swedegas were unable to release the information as planned and have delayed publication until December. BBL have also committed to releasing information on historic gas flows before the end of the project in December.

Ontras is unable to release the information as a result of the application of the less than three shipper rule.

The number of TSOs that release information for this data type is expected to increase from seven to fifteen as a result of the transparency project. In order to achieve this target Swedegas and BBL need to publish information on this data type in the final stage of the project.

7 Conclusion

Progress of the transparency project at the second implementation stage is mixed. Overall, TSOs have made progress in releasing new information for all data types. It is important to acknowledge the time and resources that TSOs have put toward successfully releasing new information on available capacity and gas flows. Six TSOs (RWE Transportnetz Gas, Gaslink, DEP, Gasunie Deutschland, Energinet.dk and Wingas Transport) reported to have successfully published new information between June and October 2008.



However, there are two data types, daily flows and interruptions¹⁷ (F1) and daily aggregate day-ahead nominations¹⁸ (F3) where implementation has fallen significantly behind schedule. For each of these two data types there are four TSOs that still need to publish this information in the final stage of the project, if implementation progress is to meet current expectations for the end of 2008.

Moreover, for day-ahead nomination information (F3) there are seven TSOs that have not committed to publishing this information before December 2008. Six of these TSOs (Energinet.dk, GRTgaz, GdF DT, Fluxys, National Grid and BBL) have indicated that they will be able to publish this information in 2009.

There are also TSOs, notably Fluxys and Swedegas, that have fallen significantly behind schedule in publishing new information. The materiality of these delays varies according to the number of interconnector points the company operates. From this perspective the Belgian TSO Fluxys represents the biggest information gap. However, Fluxys has confirmed indicated it will release on 15 January 2009 the three remaining data types - probability of interruption (C2), daily gas flow information (F1) and day-ahead nomination information (F3).

The number of data types that TSOs have not committed to release before the end of the project in December 2008 is shown in figure 5. Six companies (Fluxys, National Grid, GdF DT, Energinet.dk, GRTgaz and BBL) have indicated that they will release information on the relevant data type in 2009. It is important for the transparency project that these companies provide clear implementation schedules for 2009 or comply with those when they have been provided. Gaslink has indicated that it will publish information on the probability of interruption in 2010 when its first interruptible capacity product is introduced.

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 ^{17 9} out of an expected 15 TSOs had actually published information on this data type by October 2008
 5 out of an expected 9 TSOs had actually published information on this data type by October 2008



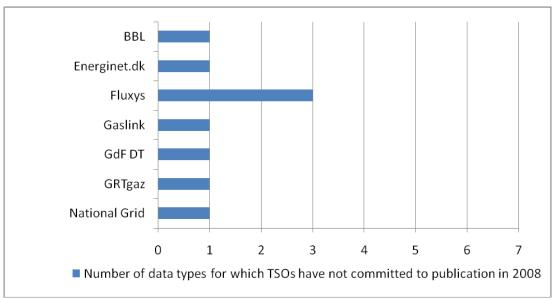


Figure 5 – Number of data types that TSOs have not committed to publish before December 2008

Figure 6 provides an overview of the number of data types that each TSO has committed to release in the final stage of the project. It is notable that the Svenska Kraftnät and Swedegas still need to publish information on six of the data types in the final stage. As BBL joined the transparency project during its second implementation stage, it is has committed to publishing information on two data types in the projects final stage.

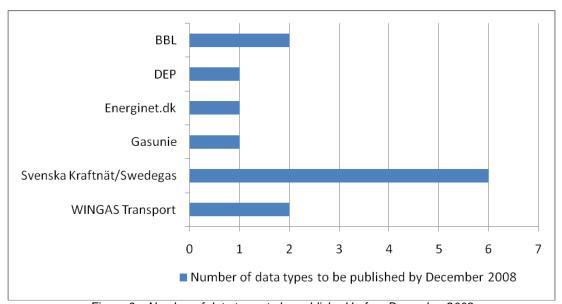


Figure 6 – Number of data types to be published before December 2008



The decision of the relevant regulatory authority on the application of the less than three shipper rule to specific interconnection points is still pending for both GTS and Fluxys. It is interesting to note the variation in the impact of the less than three shipper rule on the number of data types that TSOs are able to publish for affected interconnection points. It would require further analysis why TSOs, shipper or regulators could have divergent views on what data types are considered to be commercially sensitive.



Annex 1 - Data definitions

The following table provides specifications for the information to be released on each data type as described in the TSO project plan and agreed at the September workshop in London.

Data type definitions

- The provision of the following information refers to cross-border interconnection points
- D + 1: the gas day after the relevant day
- D − 1: the gas day before the relevant day
- All information are published on the TSOs' websites [except for shipper specific information (F2)]
- Hourly\Daily Information on a daily basis (d+1) dependent on market arrangements

(C1) Max technical capacity of the transmission system

- Static data which only varies with additional investment, transmission asset expiry etc...
- Expected to be updated on a periodic/annual basis following a permanent change in maximum technical capability
- Each TSO will publish a definition of the provided data according to the relevant market rules

(C2) Level of interruption probability

- Information on previous interruptions may indicate the chance of being interrupted in the future
- TSOs are/will be publishing following Information:
 - o Maintenance plans
 - o Information on flows and previous interruptions (see F1)
 - o Booked firm and interruptible capacities (see C3)
 - Available firm and interruptible capacities (see C3)
 - Day-ahead nominations (see F3)
- TSOs invite market participants to define a "traffic light" definition based on the information above
- Individual plans will show current release and potential enhancement

(C3) Daily commercial firm and interruptible capacity

- Dynamic data reflecting the levels of booked and available capacity
- Aggregate values of each of the following capacity categories, as applicable, for the relevant gas day:
 - Booked firm entry capacity
 - Booked firm exit capacity
 - Booked interruptible entry capacity
 - Booked interruptible exit capacity
 - Available firm entry capacity
 - Available firm exit capacity
 - Available interruptible entry capacity
 - Available interruptible exit capacity
- Updated Information on a daily basis dependent on market

Capacity information



Data type definitions									
	arrangements								
	(F1) Daily flow and interruptions								
	 Dynamic data reflecting actual flows and interruptions Aggregate gas flow / aggregate confirmed nominations in each direction Aggregate gas flow interruptions initiated by TSO in each direction Published D + 1 								
	(F2) Daily prompt allocation information to each shipper								
Flow Information	 Dynamic data reflecting flow allocation provided daily via private website or EDIGAS/ other direct communication links For each shipper, their individual allocation of gas in each direction (where applicable) Published D + 1 								
	(F3) Daily aggregate day-ahead nominations								
	 Dynamic data reflecting aggregate nominations day-ahead Sum of all nominations received by TSO at first gate closure Test period to make sure market players' / TSOs' positions are not jeopardised Published D – 1 								
	(F4) Historic gas flow information database								
	 Historic repository of information specified in 'Daily flow and interruptions' (F1) 								

Table 5 – Agreed data specifications



Annex 2 –Implementation progress indicators

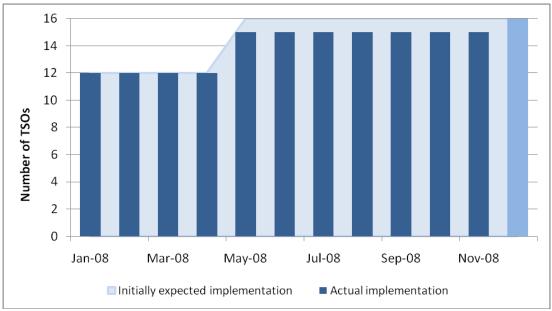


Figure 7 – Progress for release of information on maximum technical capacity (C1)

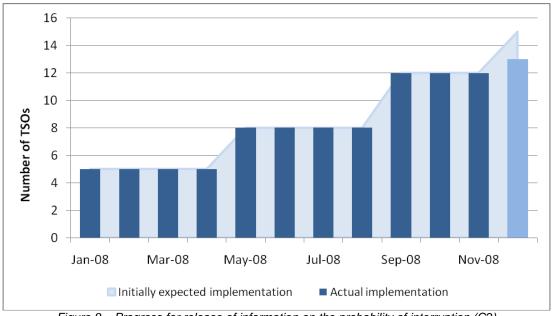


Figure 8 – Progress for release of information on the probability of interruption (C2)



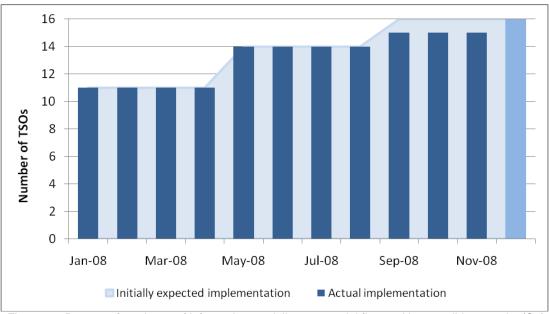


Figure 9 – Progress for release of information on daily commercial firm and interruptible capacity (C3)

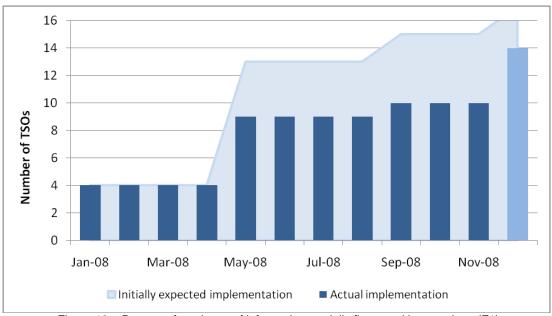


Figure 10 – Progress for release of information on daily flows and interruptions (F1)



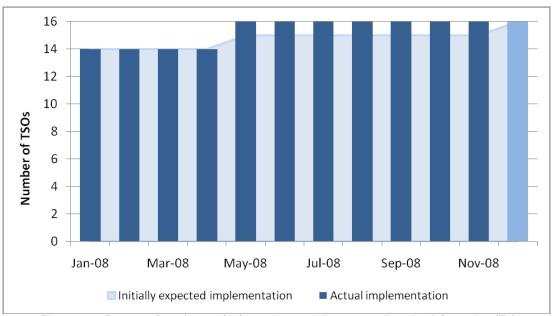


Figure 11 – Progress for release of information on daily prompt allocation information (F2)

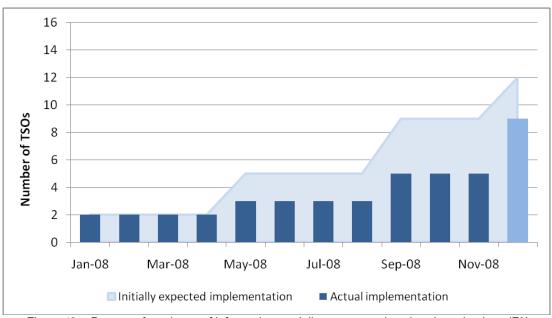


Figure 12 – Progress for release of information on daily aggregate day ahead nominations (F3)



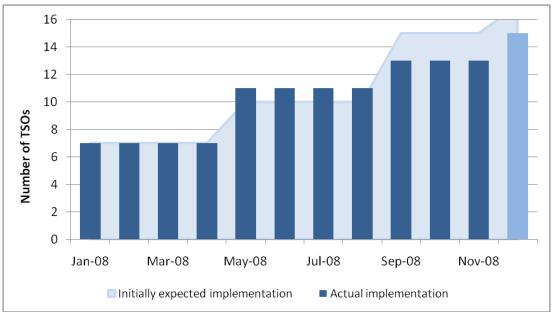


Figure 13 – Progress for release of information on historic gas flow database (F4)



Annex 3 – Overall Implementation progress

Overview: Status October 08

	E.ON GT	Fluxy s	Sven. Kraft.	RWE TNG	Nat. Grid	Interconn ector	Gaslin k	WING AS	Ontras	GRTg az	Energ inet	Gasu nie	DEP	Swed egas	GdF DT	GTS	BBL
(C1) Max technical capacity	in place	in place	N/A	in place	in place	in place	in place	in place	in place	in place	in place	in place	in place	final	in place	in place	in place
(C2) Interruption	in place	2009	N/A	in place	in place	in place	2010	in place	3 - rule	in place	in place	in place	in place	final	in place	in place	in place
(C3) Daily commercial firm and interruptible capacity	in place	in place	N/A	in place	in place	in place	in place	in place	in place	in place	in place	in place	in place	final	in place	in place	in place
(F1) Daily flow / aggregated Allocation	in place	2009	N/A	in place	in place	in place	in place	final	3 - rule	in place	final	in place	in place	final	in place	in place	final
(F2) Daily prompt allocation information	in place	in place	in place	in place	in place	in place	in place	in place	in place	in place	in place	in place	in place	N/A	in place	in place	in place
(F3) Daily aggregate day-ahead nominations	in place	2009	final	in place	2009	in place	in place	final	3- rule	2009	2009	final	final	N/A	2009	in place	2009
(F4) Historic gas flow information database	in place	in place	N/A	in place	in place	in place	in place	in place	3 - rule	in place	in place	in place	in place	final	in place	in place	final
Number of IPs	22	23	1	5	8	4	1	8	3	9	6	7	2	1	5	25	4
3 minus rule IPs	0	8	0	3	0	0	0	3	3	0	0	0	0	0	0	12	0

December 2008 Later Publication Final Exist

Existing before October 2008
Three minus or not required

In place



Overview: Status July 08

	E.ON GT	Fluxys	Svenska Kraftnät	RWE TNG	Natio nal Grid	Interc onnec tor	Gaslin k	WING AS Trans port	Ontra s	GRTg az	Energ inet.d k	Gasu nie	DEP	Swed egas	GdFD T	GTS	BBL
(C1) Max technical capacity	in place	in place		in place	in place	in place	in place	in place	in place	in place	in place	in place	in place	later	in place	in place	in place
(C2) Interruption	in place	final		in place	in place	in place	later			in place	later	later	later	later	in place	in place	in place
(C3) Daily commercial firm and interruptible capacity	in place	in place		later	in place	in place	in place	in place	in place	in place	in place	in place	in place	later	in place	in place	in place
(F1) Daily flow / aggregated Allocation	in place	in place		later	in place	in place	later	final		in place	final	in place	in place	later	in place	in place	final
(F2) Daily prompt allocation information	in place	in place	in place	in place	in place	in place	in place	in place	in place	in place	in place	in place	in place		in place	in place	in place
(F3) Daily aggregate day-ahead nominations	in place	final	final	later	final	in place	later	final				later	later			in place	
(F4) Historic gas flow information database	in place	in place		later	in place	in place	later	in place		in place	in place	in place	in place	later	in place	in place	final

October 2008 December 2008 later final

Existing before May 2008 no answer

in place



Overview: Status

_		
20	07	

2007	E.ON GT	Fluxys	Svens ka Kraftn ät	RWE TNG	Natio nal Grid	Inter- conne ctor	Gaslink	WINGA S Transpo rt	Ontras	GRT gaz	Energin et.dk	Gasunie	DEP	Swedeg as	GdFDT	GTS	BBL
(C1) Max technical capacity	in place	earlier		in place	in place	in place	earlier	in place	in place	in place	earlier	in place	in place	earlier	in place	in place	in place
(C2) Interruption	later	final		final	in place	in place	later		earlier	in place	earlier	later	later	earlier	in place	in place	final
(C3) Daily commercial firm and interruptible capacity	in place	earlier		later	in place	in place	earlier	in place	in place	in place	earlier	in place	in place	later	in place	in place	in place
(F1) Daily flow / aggregated Allocation	earlier	earlier	final	later	in place	in place	later	earlier	earlier	in place	earlier	earlier	earlier	earlier	earlier	in place	final
(F2) Daily prompt allocation information	earlier	in place	final	in place	in place	in place	in place	in place	in place	in place	in place	in place	in place		in place	in place	in place
(F3) Daily aggregate day-ahead nominations	later	final	final	later	final	in place	later	earlier	earlier			later	earlier			in place	
(F4) Historic gas flow information database	later	in place	final	later	in place	in place	later	earlier	earlier	in place	in place	earlier	later	later	in place	in place	final

April 2008 October 2008 December 2008 earlier later final Existing before project start no answer

in place



Annex 4 – Cross-border interconnection points

No.	Interconnector Name	Туре	Connected TSO	Confidential	Decision	C1	C2	C3	F1	F2	F3	F4
TSO 1: Swedegas												
1.	Dragør	Exit	Energinet.dk	No	N/A	Final	Final	Final	Final			Final
TSO 2: Svenska Kraftnät												
1.	Dragør	Entry	Energinet.dk	No	N/A					Yes	Final	
TSO 3: Gaslink												
1.	Moffat	Entry	National Grid	No	N/A	Yes	2010	Yes	Yes	Yes	Yes	Yes
TSO 4: National Grid												
1.	Bacton	Entry	Interconnector`	No	N/A	Yes	Yes	Yes	Yes	Yes	2009	Yes
2.	Bacton	Exit	Interconnector`	No	N/A	Yes	Yes	Yes	Yes	Yes	2009	Yes
3.	Bacton	Entry	BBL	No	N/A	Yes	Yes	Yes	Yes	Yes	2009	Yes
4.	Bacton	Exit	BBL	No	N/A	Yes	Yes	Yes	Yes	Yes	2009	Yes
5.	Moffatt	Exit	Gaslink	No	N/A	Yes	Yes	Yes	Yes	Yes	2009	Yes
6.	Easington	Entry	Gassco/Centrica	No	N/A	Yes	Yes	Yes	Yes	Yes	2009	Yes
7.	Milford Haven	Entry	Dragon/South Hook	No	N/A	Yes	Yes	Yes	Yes	Yes	2009	Yes
8.	Isle of Grain	Entry	Grain LNG	No	N/A	Yes	Yes	Yes	Yes	Yes	2009	Yes
TSO 5: Interconnector UK												
1.	IZT	Entry	Fluxys	No	N/A	Yes	Yes	Yes	Yes	Yes	Yes	Yes
2.	IZT	Exit	Fluxys	No	N/A	Yes	Yes	Yes	Yes	Yes	Yes	Yes
3.	Bacton	Entry	National Grid	No	N/A	Yes	Yes	Yes	Yes	Yes	Yes	Yes



No.	Interconnector Name	Туре	Connected TSO	Confidential	Decision	C1	C2	C3	F1	F2	F3	F4
4.	Bacton	Exit	National Grid	No	N/A	Yes	Yes	Yes	Yes	Yes	Yes	Yes
TSO	TSO 6: Energinet.dk											
1.	Nybro	Entry	DONG Energy	No	N/A	Yes	Yes	Yes	Final	Yes	Final	Yes
	•		E.ON GT,			Vaa	Vaa	Vaa	Cin al	Vaa	Cin al	Vaa
2.	Ellund	Entry	Gasunie, Dong	No	N/A	Yes	Yes	Yes	Final	Yes	Final	Yes
			Svenska Kraftnät			Yes	Yes	Yes	Final	Yes	Final	Yes
3.	Dragør	Entry	and Swedegas	No	N/A	162	165	165	ГШа	165	ГШа	165
4.	Nybro	Exit	DONG Energy	No	N/A	Yes	Yes	Yes	Final	Yes	Final	Yes
			E.ON GT,			Yes	Yes	Yes	Final	Yes	Final	Yes
5.	Ellund	Exit	Gasunie, Dong	No	N/A	103	103	103	I IIIai	103	i ii iai	103
			Svenska Kraftnät			Yes	Yes	Yes	Final	Yes	Final	Yes
6.	Dragør	Exit	and Swedegas	No	N/A	103	103	103	Tillai	103	I IIIai	100
TSO	TSO 7: GTS											
1.	Hilvarenbeek	Exit	Fluxys	Yes	Pending	No	No	No	No	Yes	No	No
2.	Zevenaar	Exit	EGT	Yes	Pending	No	No	No	No	Yes	No	No
3.	Zandvliet	Exit	Fluxys	Yes	Pending	No	No	No	No	Yes	No	No
4.	OudeStatenzijl(EWE-G)	Exit	EWE	Yes	Pending	No	No	No	No	Yes	No	No
5.	Obbicht	Exit	Fluxys	Yes	Pending	No	No	No	No	Yes	No	No
6.	Tegelen	Exit	EGT	Yes	Pending	No	No	No	No	Yes	No	No
7.	Dinxperlo	Exit	RWE	Yes	Pending	No	No	No	No	Yes	No	No
8.	Haanrade	Exit	RWE	Yes	Pending	No	No	No	No	Yes	No	No
9.	Vlieghuis	Exit	RWE	Yes	Pending	No	No	No	No	Yes	No	No
10.	Zandvliet	Exit	Fluxys	Yes	Pending	No	No	No	No	Yes	No	No
11.	Oude Statenzijl (DgasH)	Entry	D-Gas	Yes	Pending	No	No	No	No	Yes	No	No
12.	Oude Statenzijl (DgasH)	Exit	D-Gas	Yes	Pending	No	No	No	No	Yes	No	No
13.	Emden	Entry	Gassco	No	N/A	Yes	Yes	Yes	Yes	Yes	Yes	Yes
14.	Julianadorp (BBL)	Exit	BBL	No	N/A	Yes	Yes	Yes	Yes	Yes	Yes	Yes
15.	Winterswijk	Exit	EGT	No	N/A	Yes	Yes	Yes	Yes	Yes	Yes	Yes
16.	Bocholtz	Exit	EGT	No	N/A	Yes	Yes	Yes	Yes	Yes	Yes	Yes
17.	s 'Gravenvoeren	Exit	Fluxys	No	N/A	Yes	Yes	Yes	Yes	Yes	Yes	Yes



No.	Interconnector Name	Туре	Connected TSO	Confidential	Decision	C1	C2	C3	F1	F2	F3	F4
	Oude Statenzijl					Yes	Yes	Yes	Yes	Yes	Yes	Yes
18.	(Ruhrgas-H)	Entry	EGT	No	N/A	163	163	163	163	163	163	163
	Oude Statenzijl					Yes	Yes	Yes	Yes	Yes	Yes	Yes
19.	(Ruhrgas-H)	Exit	EGT	No	N/A	100	100	100	100	100	100	100
	Oude Statenzijl	_				Yes	Yes	Yes	Yes	Yes	Yes	Yes
20.	(Wingas-H)	Entry	Wingas	No	N/A	. 00	100	. 00	. 00			
	Oude Statenzijl					Yes	Yes	Yes	Yes	Yes	Yes	Yes
21.	(Wingas-H)	Exit	Wingas	No	N/A							
22.	Oude Statenzijl(BEB-G)	Exit	Gasunie	No	N/A	Yes	Yes	Yes	Yes	Yes	Yes	Yes
23.	Oude Statenzijl(BEB-H)	Entry	Gasunie	No	N/A	Yes	Yes	Yes	Yes	Yes	Yes	Yes
24.	Oude Statenzijl(BEB-H)	Exit	Gasunie	No	N/A	Yes	Yes	Yes	Yes	Yes	Yes	Yes
25.	Zelzate	Entry	Fluxys	No	N/A	Yes	Yes	Yes	Yes	Yes	Yes	Yes
TSO 8: Fluxys												
	Zeebrugge ZPT					Voc	2009	Yes	2009	Voc	2009	Yes
1.	(Zeepipe Terminal)	Entry	Gassco	No	N/A	Yes	2009	res	2009	Yes	2009	res
	Zeebrugge IZT					Yes	2009	Yes	2009	Yes	2009	Yes
2.	(Interconnector)	Entry	Interconnector UK	No	N/A	165	2009	165	2009	165	2009	165
	Zeebrugge IZT					Yes	2009	Yes	2009	Yes	2009	Yes
3.	(Interconnector)	Exit	Interconnector UK	No	N/A	165	2009	165	2009	165	2009	162
	Zelzate 1 (Gas					Yes	2009	Yes	2009	Yes	2009	Yes
4.	Transport Services)	Exit	GTS	No	N/A	165	2009	165	2009	165	2009	162
	Zelzate 2 (Zebra					Yes	2009	Yes	2009	Yes	2009	Yes
5.	Gasnetwerk)	Exit	Zebra	No	N/A	165	2009	165	2009	165	2009	165
	Eynatten 1 (Wingas					Yes	2009	Yes	2009	Yes	2009	Yes
6.	Transport)	Entry	Wingas	No	N/A	165	2009	165	2009	165	2009	165
	Eynatten 1 (Wingas					Yes	2009	Yes	2009	Yes	2009	Yes
7.	Transport)	Exit	Wingas	No	N/A	165	2009	165	2009	165	2009	162
	Eynatten 2 (EON		EON GT/RWE			Yes	2009	Yes	2009	Yes	2009	Yes
8.	Gastransport)	Entry	Transportnetz	No	N/A	165	2009	165	2009	165	2009	162
	Eynatten 2 (EON		EON GT/RWE			Yes	2009	Yes	2009	Yes	2009	Yes
9.	Gastransport)	Exit	Transportnetz	No	N/A	163	2003	163	2009	163	2003	163



No.	Interconnector Name	Туре	Connected TSO	Confidential	Decision	C1	C2	C3	F1	F2	F3	F4
	's Gravenvoeren +					Yes	2009	Yes	2009	Yes	2009	Yes
10.	Dilsen	Entry	GTS	No	N/A							
11.	Blaregnies SEGEO	Exit	GRTgaz	No	N/A	Yes	2009	Yes	2009	Yes	2009	Yes
12.	Blaregnies TROLL	Exit	GRTgaz	No	N/A	Yes	2009	Yes	2009	Yes	2009	Yes
	Loenhout Storage					Yes	2009	Yes	2009	Yes	2009	Yes
13.	(Injection)	Exit	Fluxys	No	N/A	103	2003	103	2003	103	2003	103
14.	Loenhout storage(Withdrawal)	Entry	Fluxys	No	N/A	Yes	2009	Yes	2009	Yes	2009	Yes
	Zeebrugge LNG		į			Voc	2009	Voc	2009	Yes	2009	Voc
15.	Terminal	Entry	Fluxys	No	N/A	Yes	2009	Yes	2009	res	2009	Yes
16.	Poppel + Zandvliet L	Entry	GTS	Yes	Pending	Yes	No	No	No	Yes	No	No
17.	Blaregnies L	Exit	GRTgaz	Yes	Pending	Yes	No	No	No	Yes	No	No
18.	Veldwezelt (L-gas)	Entry	GTS	Yes	Pending	Yes	No	No	No	Yes	No	No
19.	Zandvliet H	Entry	GTS	Yes	Pending	Yes	No	No	No	Yes	No	No
20.	Momignies	Entry	GRTgaz	Yes	Pending	Yes	No	No	No	Yes	No	No
21.	Bras	Exit	Soteg	Yes	Pending	Yes	No	No	No	Yes	No	No
22.	Athus (Pétange)	Exit	Soteg	Yes	Pending	Yes	No	No	No	Yes	No	No
	Dudzele Peak Shaving					Yes	No	No	No	Yes	No	No
23.	Plant	Entry	Fluxys	Yes	Pending	163	140	INO	INO	163	INO	INO
TSO	9: DEP											
1.	Ellund	Entry	Energinet.dk	No	N/A	Yes	Yes	Yes	Yes	Yes	Final	Yes
2.	Ellund	Exit	Energinet.dk	No	N/A	Yes	Yes	Yes	Yes	Yes	Final	Yes
TSO	10: Gasunie Deutschland											
1.	Ellund (H-Gas)	Entry	Energinet.dk	No	N/A	Yes	Yes	Yes	Yes	Yes	Final	Yes
2.	Emden - EPT1 (H-Gas)	Entry	Gassco AS	No	N/A	Yes	Yes	Yes	Yes	Yes	Final	Yes
3.	Emden - NPT (H-Gas)	Entry	Gassco AS	No	N/A	Yes	Yes	Yes	Yes	Yes	Final	Yes
4.	Oude Statenzijl (H-Gas)	Entry	GTS	No	N/A	Yes	Yes	Yes	Yes	Yes	Final	Yes
5.	Ellund (H-Gas)	Exit	Energinet.dk	No	N/A	Yes	Yes	Yes	Yes	Yes	Final	Yes
6.	Oude Statenzijl (H-Gas)	Exit	GTS	No	N/A	Yes	Yes	Yes	Yes	Yes	Final	Yes
7.	Oude Statenzijl (L-Gas)	Entry	GTS	No	N/A	Yes	Yes	Yes	Yes	Yes	Final	Yes



No.	Interconnector Name	Type	Connected TSO	Confidential	Decision	C1	C2	C3	F1	F2	F3	F4
TSO	11: E.ON GT		•									
1.	Waidhaus	Entry	Transgas	No	N/A	Yes						
			Gas Transport			Vaa	Vaa	Vas	Vaa	Vaa	Yes	Vaa
4.	Bocholtz	Entry	Services	No	N/A	Yes	Yes	Yes	Yes	Yes	res	Yes
5.	Emden NPT	Entry	Gassco	No	N/A	Yes						
3.	Dornum	Entry	Gassco	No	N/A	Yes						
7.	Emden EPT	Entry	Gassco	No	N/A	Yes						
8.	Oberkappel	Entry	OMV	No	N/A	Yes						
10.	Ellund	Entry	Energinet	No	N/A	Yes						
11.	Wallbach	Entry	Transitgas	No	N/A	Yes						
12.	Eynatten/Raeren	Entry	Fluxys	No	N/A	Yes						
			Gas Transport			Yes						
13.	Oude Statenzijl	Entry	Services	No	N/A	162						
14.	Medelsheim	Entry	GRTgaz	No	N/A	Yes						
			Gas Transport			Yes						
15.	Oude Statenzijl 2	Entry	Services	No	N/A							
17.	Wallbach	Exit	Transitgas	No	N/A	Yes						
18.	Eynatten/Raeren	Exit	Fluxys	No	N/A	Yes						
			Gas Transport			Yes						
19.	OudeStatenzijl	Exit	Services	No	N/A							
20.	Medelsheim	Exit	GRTgaz	No	N/A	Yes						
21.	Ellund	Exit	Energinet	No	N/A	Yes						
			Gas Transport			Yes						
23.	Bocholtz	Exit	Services	No	N/A		165					
24.	Emden NPT	Exit	Gassco	No	N/A	Yes						
25.	Emden EPT	Exit	Gassco	No	N/A	Yes						
26.	Oberkappel	Exit	OMV	No	N/A	Yes						
			Gas Transport			Yes						
28.	Oude Statenzijl 2	Exit	Services	No	N/A	165	165	165	165	165	165	165



No.	Interconnector Name	Туре	Connected TSO	Confidential	Decision	C1	C2	C3	F1	F2	F3	F4
1.	Emden EPT	Entry	Gassco	Yes	Yes	No	Yes	No	No	Yes	No	No
2.	Emden NPT	Entry	Gassco	Yes	Yes	No	Yes	No	No	Yes	No	No
3.	Eynatten (Lichtenbusch	Entry	Fluxys	No	N/A	Yes	Yes	Yes	Yes	Yes	Yes	Yes
4.	Zevenaar	Entry	Gas Transport Services	No	N/A	Yes	Yes	Yes	Yes	Yes	Yes	Yes
5.	Haanrade	Entry	Gas Transport Services	Yes	Yes	No	Yes	No	No	Yes	No	No
TSO	13: WINGAS TRANSPOR	Τ										
1.	Bunde	Entry	GTS	No	N/A	Yes	Yes	Yes	Final	Yes	Final	Yes
2.	Eynatten	Entry	Fluxys	No	N/A	Yes	Yes	Yes	Final	Yes	Final	Yes
3.	Mallnow	Entry	EuRoPol GAZ	Yes	Yes	No	Yes	Yes	No	Yes	No	Yes
4.	Olbernhau	Entry	RWE Transgas Net	Yes	Yes	No	Yes	Yes	No	Yes	No	Yes
5.	Überackern	Entry	OMV	No	N/A	Yes	Yes	Yes	Final	Yes	Final	Yes
6.	Bunde	Exit	GTS	No	N/A	Yes	Yes	Yes	Final	Yes	Final	Yes
7.	Eynatten	Exit	Fluxys	No	N/A	Yes	Yes	Yes	Final	Yes	Final	Yes
8.	Olbernhau	Exit	RWE Transgas Net	Yes	Yes	No	Yes	Yes	No	Yes	No	Yes
TSO	14: Ontras											
1.	Deutschneudorf	Entry	RWE Transgas Net	Yes	Yes	Yes	No	Yes	No	Yes	No	No
2.	Deutschneudorf	Exit	RWE Transgas Net	Yes	Yes	Yes	No	Yes	No	Yes	No	No
3.	Lasow	Exit	GAZ-SYSTEM	Yes	Yes	Yes	No	Yes	No	Yes	No	No
TSO	15: GdF DT											
1.	Oberkappel	Entry	BOG	No	N/A	Yes	Yes	Yes	Yes	Yes	2009	Yes
2.	Oberkappel	Exit	BOG	No	N/A	Yes	Yes	Yes	Yes	Yes	2009	Yes
3.	Waidhaus	Entry	RWE Transgas Net	No	N/A	Yes	Yes	Yes	Yes	Yes	2009	Yes
4.	Medelsheim	Entry	GRTGaz	No	N/A	Yes	Yes	Yes	Yes	Yes	2009	Yes



No.	Interconnector Name	Туре	Connected TSO	Confidential	Decision	C1	C2	C3	F1	F2	F3	F4
5.	Medelsheim	Exit	GRTGaz	No	N/A	Yes	Yes	Yes	Yes	Yes	2009	Yes
TSO	16: GRTgaz											
1.	Dunkerque	Entry	Gassco	No	N/A	Yes	Yes	Yes	Yes	Yes	2009	Yes
2.	Taisnières L	Entry	Fluxys	No	N/A	Yes	Yes	Yes	Yes	Yes	2009	Yes
3.	Taisnières H	Entry	Fluxys	No	N/A	Yes	Yes	Yes	Yes	Yes	2009	Yes
4.	Taisnières H	Exit	Fluxys	No	N/A	Yes	Yes	Yes	Yes	Yes	2009	Yes
5.	Obergailbach	Entry	GdF DT + E On Gastransport	No	N/A	Yes	Yes	Yes	Yes	Yes	2009	Yes
6.	Obergailbach	Exit	GdF DT + E On Gastransport	No	N/A	Yes	Yes	Yes	Yes	Yes	2009	Yes
7.	Oltingue	Exit	ENI CH gas and power + Swissgas	No	N/A	Yes	Yes	Yes	Yes	Yes	2009	Yes
8.	Oltingue	Entry	ENI CH gas and power + Swissgas	No	N/A	Yes	Yes	Yes	Yes	Yes	2009	Yes
9.	Montoir de Bretagne (LNG)	Entry	Gaz de France	No	N/A	Yes	Yes	Yes	Yes	Yes	2009	Yes
TSO	TSO 17: BBL											
1.	BBL Julianadorp	Entry	GTS	No		Yes	Yes	Yes	Final	Yes	2009	Final
2.	BBL Julianadorp	Exit	GTS	No		Yes	Yes	Yes	Final	Yes	2009	Final
3.	BBL Bacton	Entry	National Grid	No		Yes	Yes	Yes	Final	Yes	2009	Final
4.	BBL Bacton	Exit	National Grid	No		Yes	Yes	Yes	Final	Yes	2009	FInal



Annex 5 - TSO websites links

TSO: Interconne	TSO: Interconnector (UK) Limited					
Data Type	Link	Date to be published				
(C1) Max technical capacity	http://www.interconnector.com/Commercial/primarycap.htm	Published				
(C2) Probability of interruption	Planned maintenance information: http://www.interconnector.com/onlineservices/shutdowndates.htm Unplanned interruption information (press and news updates): http://www.interconnector.com/mediacentre/pressreleases.htm http://www.interconnector.com/index.html *Have not had unplanned interruption since 2005	Published				
(C3) Daily commercial firm and interruptible capacity	http://www.interconnector.com/Commercial/primarycap.htm The footnote provides an indication of the interruptible capacity that will likely be available on any given day. As interruptible capacity is typically sold on a day ahead basis, dynamic information regarding the availability of interruptible capacity is provided via ISIS: http://www.interconnector.com/fags.htm	Published				
(F1) Daily flow/aggregated information	http://www.interconnector.com/iuk/onlinepage	Published				
(F3) Daily aggregate day ahead nominations	http://www.interconnector.com/iuk/onlinepage	Published				
(F4) Historic gas flow database	http://www.interconnector.com/onlineservices/historicflows.htm	Published				

TSO: Nationa	l Grid	
Data Type	Link	Date to be published
(C1) Max technical capacity	http://www.nationalgrid.com/uk/Gas/TYS/ Click on "Ten Year Statement 2007 Charts" and then "Download the article here" Information on peak forecasts for entry exit point is available in "annex 2" of the spreadsheet (via "menu" tab) http://www.nationalgrid.com/NR/rdonlyres/ABA258D7-17D2-4357-BCF7-C9C492201806/22104/TYS_2007Charts.xls Or http://www.nationalgrid.com/uk/gas/data/cmr Click on "Long Term Entry Capacity Summary Report - Download excel spreadsheet" http://www.nationalgrid.com/NR/rdonlyres/4A5BC67E-65A1-4EC8-BFB8- BCCCBABE5131/26740/AggregatecapacitySoldbyASEP_summary0107	Published
(C2) Probability of interruption	08.xls http://www.nationalgrid.com/NR/rdonlyres/4DD86869-3D51-42F2-9905-A35D4452AE0E/18874/Summer2007FinalMaintenanceProgrammeV43rdAug2007.pdf http://www.nationalgrid.com/NR/rdonlyres/A7CD68A5-DBB0-4822-	Published



	ABF5- <u>0EEFCDAC7C4C/20423/SummerMaintenance2008SeptemberUpdate.p</u> <u>df</u>	
	http://www.nationalgrid.com/uk/Gas/Data/EDR/After/NTSEntryEndofDay Flow.htm	
(C3) Daily	http://www.nationalgrid.com/uk/gas/Data/CMR	
and	http://www.nationalgrid.com/uk/Gas/Data/CDR/	Published
interruptible capacity	http://www.nationalgrid.com/uk/Gas/Data/capacitys/	
(F1) Daily	http://www.nationalgrid.com/uk/Gas/Data/EFD/	
flow/aggregated information	http://www.nationalgrid.com/uk/Gas/Data/EDR/After/NTSEntryEndofDay Flow.htm	Published
	http://www.nationalgrid.com/uk/Gas/Data/CDR/After/CONH.htm	
(F3) Daily aggregate day ahead nominations		December 2008
(F4) Historic	http://www.nationalgrid.com/uk/Gas/Data/misc/	
gas flow database	http://www.nationalgrid.com/uk/Gas/Data/EDR/After/NTSEntryEndofDay	Published
	Flow.htm	

TSO: Energin	et.dk	
Data Type	Link	Date to be published
(C1) Max technical capacity	https://selvbetjening.energinet.dk/en/menu/Frontpage.htm	Published
(C2) Probability of interruption	The probability of being interrupted is reflected in the tariff. There are two levels of interruptible capacity. This means that the price reflects the general risk: http://www.energinet.dk/en/menu/Market/Tariffs+and+prices/Gas+- +Transmission+tariffs/Gas+-+Interruptible+tariffs/Interruptible+tariffs.htm How much interruptible capacity there has been booked, and the gas flow per day from the previous month (this will be updated with d-1 data in early 2009) are also published, giving the shippers a good idea of the chance of interruption. See also: https://selvbetjening.energinet.dk/en/menu/PublicData/HistoricalFutureCapacity/HistoricalFutureCapacity.htm; and, http://www.energinet.dk/en/menu/Market/Gas+market/reports/Gas+market+report.htm	Published
(C3) Daily commercial firm and interruptible capacity	https://selvbetjening.energinet.dk/en/menu/Frontpage.htm	Published
(F1) Daily flow/aggregated information	See (C2)	December 2008
(F3) Daily aggregate day ahead nominations		2009
(F4) Historic	http://www.energinet.dk/en/menu/Market/Trading/Gas+-	Published



gas flow	<u>Transmission+capacity/Gas+-+Transmission+capacity.htm</u>	
database		

TSO: Dong Er	nergy Pipelines	
Data Type	Link	Date to be published
(C1) Max technical capacity	http://www.dongenergy- pipelines.de/en/capacities/Pages/Free%20capacities.aspx http://www.dongenergy- pipelines.de/SiteCollectionDocuments/PDF_filer/Overview_Capacities.p df	Published
(C2) Probability of interruption	http://www.dongenergy- pipelines.de/en/about%20us/Pages/Details%20of%20the%20pipeline% 20system.aspx	Published
(C3) Daily commercial firm and interruptible capacity	http://www.dongenergy- pipelines.de/en/capacities/Pages/Free%20capacities.aspx http://www.dongenergy- pipelines.de/SiteCollectionDocuments/PDF_filer/Overview_Capacities.p df Registered users can also log in into the online booking system. The website http://www.dongenergy- pipelines.de/en/online%20booking/Pages/index.aspx provides a link to the website of the cooperation platform www.marktgebiete.com by use of the password the customer can log in and check available capacities and tariffs.	Published
(F1) Daily flow/aggregated information	http://www.dongenergy- pipelines.de/en/capacities/Pages/Allocated hourly flows.aspx	Published
(F3) Daily aggregate day ahead nominations		December 2008
(F4) Historic gas flow database	http://www.dongenergy- pipelines.de/de/kapazitaten/Historische%20Lastflüsse/Pages/Historisch eLastflüsse.aspx	Published

TSO: Ontras		
Data Type	Link	Date to be published
(C1) Max technical capacity	www.marktgebiete.com/h-gas (Indicative value for max technical capacity available when "less than three shipper rule" does not apply)	n.a.
	To access follow links: Market area information, Interactive Network Map, Select Network Point – click on details tab at bottom right hand side of page	II.a.
(C2) Probability of interruption		n.a.
(C3) Daily commercial firm	www.marktgebiete.com/h-gas	
and interruptible capacity	To access follow links: Market area information, Interactive Network Map, Select Network Point – click on details tab at bottom right hand side of page	Published



(F1) Daily flow/aggregated information		n.a.
(F3) Daily aggregate day ahead nominations	www.ontras.com/portal/servlet/OpenPortal (provided on confidential basis to shippers – Login → Kundencenter → Abrechnungsdaten → Angebote/Daten)	Published
(F4) Historic gas flow database		n.a.

TSO: RWE Transportnetz Gas		
Data Type	Link	Date to be published
(C1) Max technical capacity	http://www.rwetransportnetzgas.com/generator.aspx/homepage/netzzug ang/netzinformation/language=de/id=195172/page.html http://www.rwetransportnetzgas.com/generator.aspx/homepage/netzzug ang/netzinformation/language=en/id=195172/page.html To access select an entry- or exit point, click on "weitere informationen" tab at bottom of page. In the new window click on "kapazitäten"	Published
(C2) Probability of interruption	(Information available in German) http://www.rwetransportnetzgas.de/generator.aspx/homepage/netzzuga ng/netzinformation/language=en/id=195172/page.html Click on "maintenance" or "building activities"	Published
(C3) Daily commercial firm and interruptible capacity	https://netzzugang.rwetransportnetzgas.com/eesy/servlet/OpenPortal Click on "Online-Buchung für Transportkunden"; then on the right side "Kapazität hinzufügen"; then you can choose a date and a point;	Published
(F1) Daily flow/aggregated information	http://www.rwetransportnetzgas.de/generator.aspx/homepage/netzzuga ng/netzinformation/bba/language=en/id=494516/nominierung- allokation.html Click on the respective point	Published
(F3) Daily aggregate day ahead nominations	http://www.rwetransportnetzgas.de/generator.aspx/homepage/netzzuga ng/netzinformation/bba/language=en/id=494516/nominierung- allokation.html Click on the respective point	Published
(F4) Historic gas flow database	http://www.rwetransportnetzgas.de/generator.aspx/homepage/netzzuga ng/netzinformation/bba/language=en/id=494516/nominierung- allokation.html Click on the respective point	Published

TSO: GRTgaz		
Data Type	Link	Date to be published
(C1) Max technical capacity	http://wwww.grtgaz.com/fileadmin/user_upload/Acheminement/Docume_nts/FR/acheminement_capacites-reservation-court-long-terme.xls Excel file indicating the capacity of each IP (short and long term). The way capacities are calculated is explained in the Ten-year development	Published



	statement of GRTgaz for 2008-2017: (http://wwww.grtgaz.com/fileadmin/user_upload/Institutionnel/Document_s/EN/projets-etude10ans_en.pdf)	
(C2) Probability of interruption	http://www.grtgaz.com/fileadmin/user_upload/Acheminement/Docume_nts/EN/acheminement_capacites-interruptibles-en.pdf and http://www.grtgaz.com/en/home/transmission/engineering-work-schedules/ Document (pdf) on the availability of interruptible capacity + csv file on maintenance schedule	Published
(C3) Daily commercial firm and interruptible capacity	http://wwww.grtgaz.com/fileadmin/user_upload/Acheminement/Docume nts/FR/acheminement capacites-reservation-court-long-terme.xls (and private website ECT) Excel file indicating the firm and interruptible capacity of all IPs (short and long term, updated minimum three times a month to be consistent with the open subscription periods) + click and book system on GRTgaz' private website (ECT) for daily available capacity	Published
(F1) Daily flow/aggregated information	http://wwww.grtgaz.com/module-chiffres/index.php and http://wwww.grtgaz.com/fileadmin/user_upload/Acheminement/Docume nts/EN/acheminement_capacites-interruptibles-en.pdf Available on the GRTgaz' key figures area + in the pdf document about the availability of the interruptible capacity	Published
(F3) Daily aggregate day ahead nominations	Implementation not possible before 2009. This year, within the consultation process on the evolution of the balancing system, GRTgaz will have discussions with the shippers who did not agree with such a publication in 2007. We will present the benefits of such a publication and we will propose a format, hoping to reach an agreement.	2009
(F4) Historic gas flow database	http://wwww.grtgaz.com/module-chiffres/index.php Available on the GRTgaz' key figures area, downloadable in xls or csv files	Published

TSO: Fluxys		
Data Type	Link	Date to be published
(C1) Max technical capacity	Web-link = www.fluxys.be/Index_Transport.htm (then click on Indicative available capacities in the right column and open the table with Technical Maximum capacities at the interconnection points) http://www.fluxys.com/en/Services/Transport/OperationalData/OperationalData.aspx	Published
(C2) Probability of interruption	Currently no interruptions are published on the website. The services of interruptible capacity are sold with a probability of interruption based on historical flow data. Q1 in 2009 new IT System for daily update (D+1) of publications on general website	2009
(C3) Daily commercial firm and interruptible capacity	http://www.fluxys.com/en/Services/Transport/OperationalData/OperationalData.aspx	Published
(F1) Daily flow/aggregated information	The publication of the daily aggregated upstream flows is now done in a manual process on a monthly basis.	2009



	http://www.fluxys.com/en/Services/Transport/OperationalData/OperationalData.aspx	
	Q 1 in 2009 new IT System for daily update (D+1) of publications on general website	
(F3) Daily aggregate day ahead nominations		
(F4) Historic gas flow database	Link = www.fluxys.be/Index Transport.htm (then click on Historic Flow Data in the right column and open the table for each Gas Year)	
	Historical flows are published for the last 3 gas years + the current gas year after one month delay. Place on the website = www.fluxys.net / Transport Services / Historical Flow Data / select the appropriated gas year	Published

TSO: Gaslink		
Data Type	Link	Date to be published
(C1) Max technical capacity	http://www.gaslink.ie/index.jsp?p=136&n=235 http://web1.bgegtms.ie/index.html	Published
(C2) Probability of interruption	Information on network development is available http://www.gaslink.ie/index.jsp?&p=93&n=138	
	No Interruptible Capacity services offered at this point in time. Introduction of Interruptible Capacity services has been rescheduled to the end 2010 as part of the All-Island Common Arrangements for Gas (CAG) Project.	2010
(C3) Daily commercial firm and interruptible capacity	http://www.gaslink.ie/index.jsp?p=136&n=235 http://web1.bgegtms.ie/index.html	Published
(F1) Daily flow/aggregated information	http://www.gaslink.ie/index.jsp?p=136&n=235 http://web1.bgegtms.ie/index.html	Published
(F3) Daily aggregate day ahead nominations	http://www.gaslink.ie/index.jsp?p=136&n=235 http://web1.bgegtms.ie/index.html	Published
(F4) Historic gas flow database	http://www.gaslink.ie/index.jsp?p=136&n=235 http://web1.bgegtms.ie/index.html	Published

TSO: GdF DT		
Data Type	Link	Date to be published
(C1) Max technical capacity	http://www.gazdefrance- transport.de/content/kundenbereich/kapazitaetsinformationen/verfuegka pazitaeten/kapazitaetsuebersicht/index_neu_uk.php	Published
(C2) Probability of interruption	Maintenance schedules: http://www.gazdefrance-	Published



	transport.de/content/kundenbereich/kapazitaetsinformationen/verfuegka pazitaeten/kapazitaetsuebersicht/index neu uk.php http://www.gazdefrance- transport.de/content/kundenbereich/kapazitaetsinformationen/lastfluess e/lfpage uk.php?input num=3&input monat=06&input jahr=2007⋐	
	mit=Go http://www.gazdefrance- transport.de/content/kundenbereich/kapazitaetsinformationen/instandhal tung/index_uk.php	
(C3) Daily commercial firm and interruptible capacity	http://www.gazdefrance-transport.de/content/kundenbereich/kapazitaetsinformationen/verfuegkapazitaeten/kapazitaetsuebersicht/index_uk.php	Published
(F1) Daily flow/aggregated information	http://www.gazdefrance- transport.de/content/kundenbereich/kapazitaetsinformationen/lastfluess e/lfpage_uk.php	Published
(F3) Daily aggregate day ahead nominations	Would require major IT developments and process changes that GDFDT cannot implement before December 2008	2009
(F4) Historic gas flow database	http://www.gazdefrance- transport.de/content/kundenbereich/kapazitaetsinformationen/lastfluess e/lfpage_uk.php	Published

TSO: GTS		
Data Type	Link	Date to be published
(C1) Max technical capacity	Border Points: http://www.gastransportservices.com/shippers/transport/570060/ Domestic entry points http://www.gastransportservices.com/shippers/transport/518189/ Online availability checks and booking for all entry and exit points via OTIS (for registered users): http://www.gastransportservices.com/shippers/online/	Published
(C2) Probability of interruption	"GTS offers two different types of interruptible capacity to shippers (2.5% and 10%). Next to user specific data (see row 26), GTS provides for border points* the aggregated allocations and interruptions per network point. Aggregated allocations are given separately for entry, exit, backhaul, firm and interruptible. Non-fiscal data (user specific): https://otis.gastransportservices.nl/nimbus-im/ (requires login) "Fiscal data (user specific): https://otis.gastransportservices.nl/dialog/ (requires login) "border points*: https://www.gastransportservices.com/shippers/transport/570060/	Published
(C3) Daily commercial firm and interruptible capacity	Border points (booked and available capacities plus other information): http://www.gastransportservices.com/shippers/transport/570060/ Domestic entry points (available capacities): http://www.gastransportservices.com/shippers/transport/518189/ Capacity monitor (general indication of scarcity):	Published



	http://www.gastransportservices.com/shippers/transport/561907/	
(F1) Daily flow/aggregated information	"Next to user specific data (see row 26), GTS provides for border points* the aggregated allocations and interruptions per network point. Aggregated allocations are given separately for entry, exit, backhaul, firm and interruptible. Non-fiscal data (user specific): https://otis.gastransportservices.nl/nimbus-im/ (requires login) Fiscal data (user specific): https://otis.gastransportservices.nl/dialog/ (requires login) border points*: http://www.gastransportservices.com/shippers/transport/570060/ http://www.gastransportservices.com/shippers/transport/570067/	Published
(F3) Daily aggregate day ahead nominations	GTS provides aggregate day ahead nominations at 15:00h and 22:00h http://www.gastransportservices.com/shippers/transport/570067/	Published
(F4) Historic gas flow database	"Next to user specific data (see row 26), GTS provides for border points* the aggregated allocations and interruptions per network point. Aggregated allocations are given separately for entry, exit, backhaul, firm and interruptible. Non-fiscal data (user specific): https://otis.gastransportservices.nl/nimbus-im/ (requires login) "Fiscal data (user specific): https://otis.gastransportservices.nl/dialog/ (requires login) "border points*: http://www.gastransportservices.com/shippers/transport/570067/	Published

TSO: Gasunie Deutschland		
Data Type	Link	Date to be published
(C1) Max technical capacity	http://www.gasunie.de/cms/doc/doc_download.cfm?7CEDFC705056AD 1948723C7FFAB9E6FC	Published
(C2) Probability of interruption	http://www.gasunie.de/cms/index.cfm?uuid=0A776D825056AD1948796 37CB97DC89B&o lang id=2	Published
(C3) Daily commercial firm and interruptible capacity	http://www.gasunie.de/cms/doc/doc_download.cfm?7CEDFC705056AD 1948723C7FFAB9E6FC	Published
(F1) Daily flow/aggregated information	http://www.gasunie.de/statistic_data_tr2006/index_en.cfm	Published
(F3) Daily aggregate day ahead nominations		December 2008
(F4) Historic gas flow database	http://www.gasunie.de/statistic data tr2006/index en.cfm	Published



TSO: WINGAS	S TRANSPORT	
Data Type	Link	Date to be published
(C1) Max technical capacity	http://wtkg.de/entgeltrechner/entgelt_en.html	Published
(C2) Probability of interruption	http://www.wingas-transport.de/45.html?&L=1	Published
(C3) Daily commercial firm and interruptible capacity	http://wtkg.de/entgeltrechner/entgelt_en.html	Published
(F1) Daily flow/aggregated information		December 2008
(F3) Daily aggregate day ahead nominations		December 2008
(F4) Historic gas flow database	http://www.wingas-transport.de/107.html?&L=1 On the "grid information" drop down tab at the top of the page select "history data"	Published

TSO: E.ON Gastransport		
Data Type	Link	Date to be published
(C1) Max technical capacity	http://www.eon-gastransport.com/cps/rde/xchg/SID-3F57EEF5- B59D5038/eon-gastransport/hs.xsl/3025.htm	Published
(C2) Probability of interruption	http://www.eon-gastransport.com/cps/rde/xchg/SID-3F57EEF5- B59D5038/eon-gastransport/hs.xsl/2461.htm	Published
(C3) Daily commercial firm and interruptible capacity	http://www.eon-gastransport.com/cps/rde/xchg/SID-3F57EEF5- B59D5038/eon-gastransport/hs.xsl/3025.htm	Published
(F1) Daily flow/aggregated information	http://transparency.eon- gastransport.com/Reports/TransparencyReport.aspx?Kultur=en-GB	Published
(F3) Daily aggregate day ahead nominations	http://transparency.eon- gastransport.com/Reports/TransparencyReport.aspx?Kultur=en-GB	Published
(F4) Historic gas flow database	http://transparency.eon- gastransport.com/Reports/TransparencyReport.aspx?Kultur=en-GB	Published

TSO: Svenska Kraftnät		
Data Type	Link	Date to be published
(C1) Max technical		n.a



capacity	
(C2) Probability	n 0
of interruption	n.a
(C3) Daily	
commercial firm	
and	n.a
interruptible	
capacity	
(F1) Daily	
flow/aggregated	n.a
information	
(F3) Daily	
aggregate day	December 2008
ahead	December 2000
nominations	
(F4) Historic	
gas flow	n.a
database	

TSO: Swedegas		
Data Type	Link	Date to be published
(C1) Max technical capacity		December 2008
(C2) Probability of interruption		December 2008
(C3) Daily commercial firm and interruptible capacity		December 2008
(F1) Daily flow/aggregated information		December 2008
(F3) Daily aggregate day ahead nominations		n.a
(F4) Historic gas flow database		December 2008

TSO: BBL Company		
Data Type	Link	Date to be published
(C1) Max technical capacity	http://www.bblcompany.com/en/download/Overview_of_available_firm_f orward_capacity0908.pdf	Published
(C2) Probability of interruption	http://www.bblcompany.com/en/Plannedmaintenance.html	Published
(C3) Daily commercial firm and interruptible	http://www.bblcompany.com/en/download/Overview of available firm forward_capacity0908.pdf http://www.bblcompany.com/en/download/Overview_of_sold_IFF_capacity_1008.pdf	Published



capacity		
(F1) Daily flow/aggregated information		December 2008
(F3) Daily aggregate day ahead nominations	The allocated energy (including energy balance) is provided to shippers for the points where they are active. Non-fiscal data (user specific): https://otis.gastransportservices.nl/nimbus-im/ Fiscal data (user specific): https://otis.gastransportservices.nl/dialog/	Published
(F4) Historic gas flow database		December 2008