







# Second ACER-ENTSOG Report on the status of the implementation of the Balancing Network Code

5 November 2015

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# **Executive Summary**

This document is the second edition of the ACER and ENTSOG joint Report on the status of the early implementation of the Balancing Network Code, first issued in 2014. This report was prepared prior to the implementation deadline of 1 October 2015 and is based entirely on the assessments of NRAs and TSOs reporting to ACER/ ENTSOG.

Overall, the implementation of the Code is progressing along multiple time schedules and along several options. The Balancing Network Code allows national flexibility in implementation in particular with respect to, among others, the implementation date, information model, types of interim measures, products procured by the TSOs on the trading platform, balancing services, linepack flexibility services and within-day balancing obligations. This report mainly checks the early application of the Code in relation to balancing products, information provision requirements, nomination procedures, within-day obligations and interim measures. Detailed analyses on the charges and merit order is required in order to reveal whether the designs chosen progress towards market-based daily balancing.

Based on the information collected, the report shows that:

- 10 countries<sup>1</sup> reported to expect to implement the Code by 1 October 2015;
- 5 countries reported to expect to implement the Code by 1 October 2016;
- 10 countries<sup>2</sup> expect to implement all or part of the Code by April 2019, applying interim measures in the intervening period:
- The information provision requirement shall be put in place fully by one third of the countries;
- In 15 countries balancing services are still used or planned to be used. These measures require an annual regulatory review;
- In 13 countries the possibility for the TSO to trade in adjacent balancing zones already applies or is foreseen. These measures also require an annual regulatory review;
- Where interim measures are implemented:

o most responses suggest that additional work is needed to ensure there are sufficiently detailed plans on how these measures will work in practice;

countries should also plan for how a timely transition (moving away from the interim measures) will be conducted. These plans should be transparent and clearly communicated to market participants.

<sup>1</sup> Including Luxembourg which holds derogation on the basis of Article 49 of Directive 2009/73/EC and provided information on the implementation of the Code on a voluntary basis.

<sup>&</sup>lt;sup>2</sup> Including Estonia which holds derogation on the basis of Article 49 of Directive 2009/73/EC and provided information on the implementation of the Code on a voluntary basis.





# 1 Introduction and purpose

For safety and operational reasons, the volume of gas entered into and taken off gas transmission networks requires to be balanced on a daily basis. Gas Transmission System Operators (TSOs) have ultimate responsibility for this across the EU. The Network Code on Gas Balancing of Transmission Networks<sup>3</sup> (the 'BAL NC' or the 'Code') seeks to improve the economic efficiency of gas balancing by creating markets which allow TSOs to procure balancing services from network users, and network users to trade imbalance positions, in a non-discriminatory basis.

The BAL NC was published on 27 March 2014. It establishes rules for natural gas balancing, including network-related rules on nomination procedures, imbalance charges, settlement processes associated with daily imbalance charges and provisions on operational balancing between TSOs' networks. The BAL NC applies to balancing zones within the borders of the EU<sup>4</sup>, with the exception of Cyprus, Estonia, Finland, Latvia, Luxembourg<sup>5</sup> and Malta that hold a derogation on the basis of Article 49 of Directive 2009/73/EC.

The Code is applicable as of 1 October 2015 and its application can be postponed until 1 October 2016 if allowed by the national regulatory authority ('NRA') following the TSO's justified request. Instead of fully implementation, there is also the possibility to implement interim measures for up to five years<sup>6</sup> from the entry into force of the Code (i.e. until 16 April 2019). Such interim measures would be applied consistent with the options laid down in Chapter X of the Code, while all the other provisions shall be implemented by 1 October 2015.

At the 25<sup>th</sup> Madrid Forum (6-7 May 2014) ENTSOG (European Network of Transmission System Operators for Gas) and ACER (the Agency for the Cooperation of Energy Regulators, 'the Agency'), were requested by the Forum to follow up on the early implementation status of the BAL NC. ENTSOG and the Agency cooperated to provide an overview of the implementation process in a report that presented the state of play regarding the implementation of the BAL NC provisions across the EU. The report was presented at the 26<sup>th</sup> Madrid Forum (15-16 October 2014) and subsequently published on the ENTSOG and the Agency website.

The Code, as approved by the Member States and subsequently adopted by the Commission, provides a high degree of flexibility to NRAs and TSOs in their national implementation, as gas networks and markets differ from each other in their characteristics. Thus, the Code offers: three possible implementation dates, four possible types of information models, four possible types of interim measures, four possible types of products to be procured by the TSO for balancing purposes on the trading platform, the possibility to continue procuring resources for balancing via a balancing services, the possibility to provide a linepack flexibility service in addition to short term standardised products,

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<sup>&</sup>lt;sup>3</sup> Commission Regulation (EU) No 312/2014 of 26 March 2014, OJ L 91, 27.3.2014.

<sup>&</sup>lt;sup>4</sup> Energy Community Contracting Parties will follow the Code implementation based on deadlines agreed by their Ministerial Council. The implementation of the BAL NC in these Countries is not in the scope of this report.

<sup>&</sup>lt;sup>5</sup> Luxembourg holds derogation but reported that balancing rules applied since 1 October 2015 within the BeLux integrated market are compliant with the BAL NC.

<sup>&</sup>lt;sup>6</sup> And additional 5 years for the case of the interim measure of a balancing platform, pursuant to Article 47(3) of the NC.





different lead times for trade notifications (from 30 minutes to up to two hours) and the possibility to choose whether or not to apply within day obligations.

Across the EU as a whole, almost all of the possibilities have been used by the countries in responding to their obligations under the Code. The range and detail of the national implementation option used were reflected in the joint responses submitted to the Agency and ENTSOG by NRAs and TSOs. Some specifics are directly explained in the report, others are found in greater detail in the Annexes of the report.

#### 2 Information sources and data collection

The information for this report was provided for each EU country<sup>7</sup> by the NRA and TSOs in their joint responses to an online survey<sup>8</sup> jointly prepared by ENTSOG and the Agency and covering the specific provisions of each chapter of the Code. Data are updated until the end of September 2015.

The survey was launched on 1 July 2015, in order to receive joint responses from NRAs and TSOs of the 22 EU countries where the Code applies. The survey was also open to updates on voluntary basis from Cyprus, Estonia, Finland, Latvia, Luxembourg and Malta. These countries currently hold a derogation on the basis of Article 49 of Directive 2009/73/EC. Voluntary responses were received from Luxembourg and Estonia and a partial voluntary response from Estonia. There were thus in total 24 responses and one partial response to the questionnaire.

The following section presents a summary of the main results. Specific comments and explanations are shown where relevant. All detailed responses to the questionnaire for each country are shown in the annexes to the report.

<sup>&</sup>lt;sup>7</sup> For the UK two replies were submitted. This reflects the fact that in the UK there are two balancing zones, one covering Great Britain and one covering Northern Ireland. These balancing zones are in different transmission networks and are regulated by different NRAs. In this report Great Britain will be referred to as UK-GB and Northern Ireland as UK-NI.

<sup>&</sup>lt;sup>8</sup> Https://ec.europa.eu/eusurvey/runner/Balancing\_Early\_Implementation\_2015.





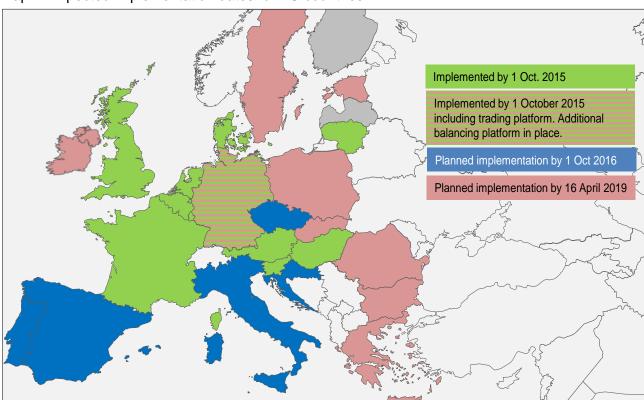
# 3 Evaluation of responses to the questionnaire

#### 3.1 Overview

#### 3.1.1 Implementation dates of BAL NC in Europe

The BAL NC provides countries with several alternatives regarding its implementation date.

All the provisions of the BAL NC shall be implemented by 1 October 2015 or, in the case of adopting the transitional period option, by 1 October 2016. Alternatively, in the absence of sufficient liquidity of the short term wholesale gas market or if other reasons make it necessary<sup>9</sup>, countries can implement interim measures until 16 April 2019, provided that all the other provisions of the BAL NC are implemented by October 2015.



Map 1: Expected implementation dates for EU countries

<sup>&</sup>lt;sup>9</sup> For example, in Germany the further use of the physical balancing platform as an interim measure is temporarily approved, as the required locational products cannot reasonably be procured on the short term wholesale gas market (Article 47 of BAL NC).





Ten respondents reported that the BAL NC would be implemented by 1 Oct 2015 (AT, BE, DK, FR, HU, LU, LT, NL, SI, UK-GB). Austria and the Netherlands reported that the Code was already implemented by October 2014.

Five countries plan to implement the BAL NC by 1 October 2016 (CZ, ES, HR, IT and PT). By September 2015, TSOs from these five countries submitted their extension request to the NRA and the NRA approvals were issued in Czech Republic, Spain and Portugal. More details can be found in Annex II, table 2.4.

Ten respondents (BG, DE, EE, EL, IE, PL, RO, SE, SK, UK-NI) plan to apply interim measures, which will allow them to implement some of the BAL NC provisions (i.e. trading platform, daily imbalance charge, tolerances) by April 2019. Germany reported that the majority of the BAL NC provisions would be implemented by October 2015 (including the trading platform). A balancing platform<sup>10</sup> will be in place until April 2019 in order to procure specific products not available on the trading platform. The NRA shall evaluate the way in which this balancing platform is used.

Seven countries indicated a different implementation timeline than the one reported to the Agency and ENTSOG last year:

- The Czech Republic foresees 1 July 2016 as the implementation date instead of the previously reported implementation date of 1 October 2016;
- Italy will provide shippers with the opportunity to test the new rules/TSO's IT systems. With the
  approval of the application of transitory measures in August 2015, the previously-reported
  implementation date of 1 October 2015 has been postponed by a few months;
- Portugal issued the decision to implement the BAL NC by 1 October 2016 after the publication
  of the first ACER-ENTSOG early implementation report in 2014. At the time of the first report
  Portugal was still consulting on two implementation dates (October 2016 and April 2019);

Further details on can be found in in Annex II, table 2.2.

#### 3.1.2 General implementation barriers reported

Countries were asked to provide to ENTSOG and the Agency with updates on issues, risks or barriers faced during the implementation of the BAL NC. The issues identified will be subject for further dialogue and exchange with NRAs and TSOs to trace progress.

The main areas of concern identified are:

- Low levels of market liquidity and/or limited connections with neighbouring Countries (BG, HR, IT, PL, PT, RO, SE, SK, UK-NI);

<sup>&</sup>lt;sup>10</sup> A balancing platform is a trading platform where the TSO is a trading participant to all trades. The establishment or confirmation of the balancing platform is an interim measure subject to NRA's approval and must end by April 2019 but can be extended by further 5 years by the NRA.





- Implementation costs, especially related to the implementation of information provisions (HR, IT, PT);
- Collaborating with stakeholders to make required system changes to implement the BAL NC whilst other industry developments (including implementation of other Network Codes) are ongoing (UK-GB) and challenging implementation timescales (PT);
- Role of NRA in the BAL NC implementation questioned by stakeholders (ES) or considered as too limited (CZ).

Further details on the implementation barriers reported can be found in Annex II, table 2.3.

#### 3.1.3 Consultations and best practices

15 countries provided the link<sup>11</sup> to the documents on the implementation timings and work plan for the BAL NC publicly consulted with the market. All details concerning consultations with stakeholders can be found in Annex II, table 2.6. Countries were also asked to share implementation experiences that could be considered as best practice. Based on the responses received (from BE, ES, LU, PL, UK-GB) the best practices reported refer to either extensive consultation processes carried out by the NRA or to the information provided to network users by the TSO and NRA going beyond the basic requirements established by the BAL NC. Further details can be found in Annex II, table 2.7.

#### 3.1.4 Cross-border cooperation and market integrations

Eight respondents indicated that some level of cross-border cooperation is taking place with the adjacent TSOs or NRAs. The main elements with an impact on cross-border cooperation are:

- nominations and renominations;
- interconnection agreements and provisions for interconnection points;
- short-term standardised products and trading platform;
- gas day and units;
- trading possibilities within an adjacent market for balancing purposes;
- common balancing zone for two countries.

Further details on cross-border cooperation can be found in Annex II, table 2.8.

#### Focus 1: Market integration between Belgium and Luxembourg - BeLux

Belgium and Luxembourg have integrated their two gas markets into a common market area (BeLux). This is the first full cross-border merger between two gas markets. The merger has created a single balancing market in the two countries, offering further opportunities for suppliers and shippers to be active in both countries.

<sup>&</sup>lt;sup>11</sup> See Annex II. table 2.5.





To manage the rules and mechanisms for commercial balancing of the integrated market, a new company called Balansys was created, a joint venture between Fluxys Belgium and Creos Luxembourg. The market integration started on 1 October 2015. In the framework of the BeLux market integration project, intensive coordination took place between the TSOs (Creos Luxembourg and Fluxys Belgium) and the NRAs (ILR and CREG). Since Fluxys Belgium is ownership unbundled while Creos Luxembourg is a part of a vertically integrated undertaking<sup>12</sup>, the NRAs shall finalise checking the compliance programme of Balansys, as the foreseen balancing operator of the BeLux area, to ensure that commercially sensitive information from network users is protected. Fluxys Belgium and Creos Luxembourg plan to have Balansys start its operations as joint balancing operator of the BeLux area in the course of 2016, once its compliance programme is approved by ACER.

#### Focus 2: Market integration in Southern France - Trading Region South (TRS)

On 1 April 2015 TIGF and GRTgaz merged their gas markets in the South of France creating a trading region (Trading Region South, "TRS"). Under the arrangements, trade notifications have to be submitted by shippers to one newly created Virtual Trading Point (VTP) instead of the two old ones (PEG South and PEG TIGF). TRS products are tradable on PEGAS Trading Platform. Imbalance settlement is made by each TSO in its respective balancing zone (GRTgaz south and TIGF). The shipper imbalance is established based on a distribution keys and a methodology approved by CRE using common marginal prices. Regarding operational balancing, each TSO undertakes its own balancing actions on its respective network as previously. Further integration steps in the French gas market are planned.

#### 3.1.5 Network Code effect indicators

Countries that have already implemented or have almost completed the implementation of the BAL NC were asked to provide ENTSOG and the Agency with the following indicators:

- a. Share of TSO balancing through short-term standardised products versus balancing services (daily average).
- b. Physical linepack day-on-day changes.
- c. Balancing cash flow analysis (neutrality) per month.

Details on the calculation method of the indicators and the answers provided can be found in Annex II, tables 2.9, 2.10 and 2.11. The indicators used were developed by an independent consultant<sup>13</sup> commissioned by the Agency. Subject to further review, the Agency will use them in future Market monitoring reports.

<sup>&</sup>lt;sup>12</sup> Despite its derogation according to apply article 9 of directive 2009/73, Luxembourg has implemented a number of unbundling obligations for Creos Luxembourg continuously monitored by ILR, in particular through a compliance programme and the annual reports from the Creos compliance officer.

<sup>&</sup>lt;sup>13</sup> The report is published at the following link: <a href="http://www.acer.europa.eu/Media/News/Pages/ACER-publishes-study-on-how-best-monitor-the-effects-of-the-implementation-of-the-network-codes.aspx">http://www.acer.europa.eu/Media/News/Pages/ACER-publishes-study-on-how-best-monitor-the-effects-of-the-implementation-of-the-network-codes.aspx</a>





#### 3.1.6 Overview table of selected information on early implementation

The following table contains selected information with the aim of providing an initial overview on the state of play of the BAL NC early implementation in the countries, without covering all the topics and all the details that are available later in the report. In order to have a detailed status on the early implementation in the countries, please see the annexes of this report.

Table 1: Overview table of selected information on early implementation

Country	Trading platform (in place/ foreseen date)	STSPs (only title/ also others/ under discussion/n o plans)	Balancing services (in place/ foreseen or discussed/ none)	Standard Re- nomination lead time (≤2 hrs)	Trade notifications and lead time (30 min / 30 mins <x hrs="" ≤2="">2 hrs)</x>	Types of information provision art. 32 BAL NC (total out of 3)	Methodology for the calculation of neutrality charges for balancing (published/ not published/ published in the tariff review)
AT	In place	Only title	In place	Yes	30 min <x h<="" th="" ≤2=""><th>3</th><th>N/A<sup>14</sup></th></x>	3	N/A <sup>14</sup>
BE	In place	Only title	None	Yes	30 min	3	Published
BG	2019	Under discussion	Foreseen or discussed	No	Not implemented	1	Not published
CZ	In place	Under discussion	Foreseen or discussed	Yes	30 min	2	Not published
DE	In place	Also others	In place	Yes	30 min	3	Not published
DK	In place	Only title	In place	Yes	30 min <x h<="" td="" ≤2=""><td>3</td><td>Published</td></x>	3	Published
EE*	Not indicated	Under discussion	Not indicated	Yes	>2 h	Not indicated	Not indicated
EL	2019	Under discussion	In place	Yes	Not implemented	3	Published
ES	January 2016	Also others	Foreseen or discussed	Yes	30 min	3 <sup>15</sup>	Published
FR	In place	Also others	Foreseen or discussed	Yes	30 min	3	Published
HR	2016	Under discussion	None	Yes	30 min <x h<="" td="" ≤2=""><td>1</td><td>Not published</td></x>	1	Not published
HU	In place	Also others	None	Yes	30 min <x h<="" td="" ≤2=""><td>3</td><td>Published</td></x>	3	Published
IE	2019	Under discussion	In place	Yes	30 min	2	Published

<sup>&</sup>lt;sup>14</sup> Austria applies "balancing portfolio" within day obligations. The daily balancing is carried out by the Market Area Manager (MAM), a task delegated by the balancing responsible party to the Market Area Manager. As such, for Austria, it was reported that neither the TSO nor the Market Area Manager generate any profits resulting from the balancing incentive mark-up, calculated on the basis of hourly deviations and used to incentives balance responsible parties to make balanced entry and exit nominations for each balance group. All allocated nominations, imbalances, carry-forward accounts and balancing incentive mark-ups are published on the MAM online-platform, so that balancing incentive mark-ups are transparent at all times.

<sup>&</sup>lt;sup>15</sup> From 1 November 2015 the "overall status of the transmission network" and the "transmission system operator's balancing actions" will be published.





Country	Trading platform (in place/ foreseen date)	STSPs (only title/ also others/ under discussion/n o plans)	Balancing services (in place/ foreseen or discussed/ none)	Standard Re- nomination lead time (≤2 hrs)	Trade notifications and lead time (30 min / 30 mins <x hrs="" ≤2="">2 hrs)</x>	Types of information provision art. 32 BAL NC (total out of 3)	Methodology for the calculation of neutrality charges for balancing (published/ not published/ published in the tariff review)
IT	In place	Also others	Foreseen or discussed	Yes	30 min	3 <sup>16</sup>	Published
LT	In place	Only title	In place	Yes	>2 h	3	Published in the tariff review
LU*	In place	Only title	None	No	30 min	3	Published
NL	In place	Also others	None	Yes	30 min	3	N/A <sup>17</sup>
PL	In place	Also others	None	Yes	30 min <x h<="" td="" ≤2=""><td>3</td><td>Published</td></x>	3	Published
PT	2016	Under discussion	Foreseen or discussed	Yes	30 min <x h<="" td="" ≤2=""><td>1</td><td>Not published</td></x>	1	Not published
RO	2019	Under discussion	None	Yes	30 min	1	Not published
SE	2019	No	In place	Yes	30 min <x h<="" td="" ≤2=""><td>3</td><td>Not published</td></x>	3	Not published
SI	In place	Only title	In place	Yes	30 min <x h<="" td="" ≤2=""><td>3</td><td>Published</td></x>	3	Published
SK	2019	Only title	Foreseen or discussed	Yes	30 min <x h<="" td="" ≤2=""><td>2</td><td>Not published</td></x>	2	Not published
UK-GB	In place	Also others	None	Yes	30 min	3	Published
UK-NI	2019	No	In place	Yes	30 min <x h<="" td="" ≤2=""><td>3</td><td>Published in the tariff review</td></x>	3	Published in the tariff review

<sup>\*</sup>Derogation

<sup>&</sup>lt;sup>16</sup> From 1 November 2015 the "network user's inputs and off-takes for the gas day" will be published.

<sup>&</sup>lt;sup>17</sup> Reported as not applicable. The Netherlands applies "system-wide" within day obligations. The within day balancing costs and revenues are passed to the responsible shippers directly, the daily balancing revenues come from linepack, where the neutrality mechanism shall not apply unless decided by the national regulatory authority.





# 3.2 Operational Balancing (Chapter III of the BAL NC), Balancing System (Chapter II of the BAL NC), Nominations (Chapter IV of the BAL NC)

#### 3.2.1 Operational Balancing

A trading platform provides support to both the network user and the TSO to procure gas when balancing actions are needed. The TSO must balance its system by firstly using the products traded on the trading platform (the Short Term Standardised Products, STSPs) and then using, if any, other balancing products or contracts ('balancing services'). This order is the 'merit order'.

A STSP is a product for delivery on a within day or day ahead basis seven days a week and can be traded by both the TSO and the network user. There are four types of STSPs: title products<sup>18</sup>, locational products<sup>19</sup>, temporal products<sup>20</sup> and/or temporal locational products<sup>21</sup>. When procuring STSPs, the TSO must prioritise and shall give preference to title products.

As stated in the last report, most respondents are already offering or planning to offer STSPs in the near future. The products in use are listed in Table 2 below. In this context eleven respondents (AT, CZ, DE, ES, FR, HU, IT, NL, PL, SK, UK-GB) have already implemented or are planning to implement a merit order giving title products priority. Seven respondents (AT, BE, DK, FR, LT, LU, SI) indicated that only title products are used for the time being.

Table 2: Short Term Standardised Products offered<sup>22</sup>

Type of product	Country where it is offered	Country where it is planned or under study
Title products	AT, BE, DE, DK, ES, FR, IT, LU*, LT, NL, PL, SI, SK, UK-GB	BG*, HR, RO
Locational products	DE*, ES, IT, PL*, UK-GB	BG, FR, HR, RO, SK
Temporal products	NL	FR, HR, RO, UK-GB
Temporal locational products	-	-
All the above products	HU	EL

<sup>\*</sup>Further details can be found in ANNEX III, table 3.1.

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<sup>&</sup>lt;sup>18</sup> Title products are products with the indication on delivery volume and time and where the delivery volume is the same for each hour.

<sup>&</sup>lt;sup>19</sup> Locational products with the indication on delivery point, volume and time and where and where the delivery volume is the same for each hour.

<sup>&</sup>lt;sup>20</sup> Temporal products are title products where the delivery volume is not the same for each hour.

<sup>&</sup>lt;sup>21</sup> Temporal locational products are locational products where the delivery volume is not the same for each hour.

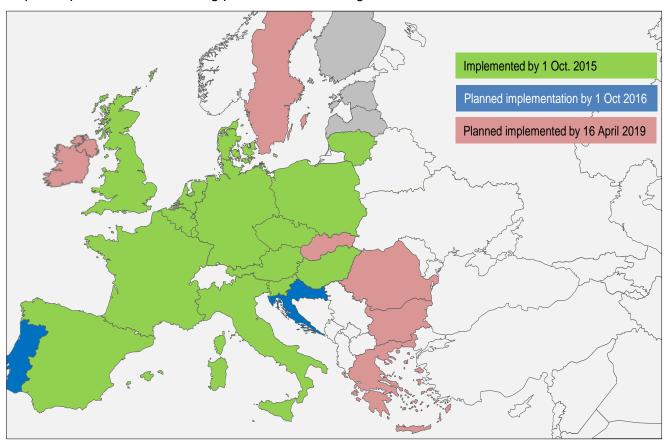
<sup>&</sup>lt;sup>22</sup> In the Czech Republic and Ireland the type of products that will be offered is still to be determined. In Portugal, it is still under discussion. No provisions have been implemented so far with regard to the use of STSP as a trading platform is not yet created. In Sweden there are no plans for short term standardised products in the near future. In Bulgaria there is no STSP usage possibility due to missing liquid balancing market. The usage of an interim measure – alternative to the balancing platform, e.g. mainly balancing services is planned.





STSPs may also be offered on the balancing platform, where its usage has been approved by the NRA<sup>23</sup>. Map 2 below illustrates the use of trading platforms in Europe. Trading platforms were mainly established in the Central and Eastern countries (CZ, LT, PL), located next to countries with developed trading platforms. In Spain the implementation of a trading platform is planned by January 2016, in Portugal and Croatia it is planned by 1 October 2016. Seven respondents (BG, EL, IE, RO, SE, SK, UK-NI) reported that a trading platform is not yet developed and either dedicated a balancing platform (EL, SK) or an alternative to the balancing platform (BG, IE, SE, RO, UK-NI) are temporarily used or planned to be used.

Map 2: Implementation of trading platform for balancing



Whenever the use of STSPs is not sufficient to address the needs of the market or the network, the use of balancing services is permitted. Seven respondents indicated this year that they still foresee the use of balancing services, in particular where the market is not sufficiently liquid or in order to ensure the operational limits of the system. (See table 3 below). Further information on the characteristics of the balancing services implemented in the countries can be found in Annex III, table 3.3.

<sup>23</sup> Map 10 shows the Countries where the balancing platform is currently in use or is planned to be used.





Table 3: Use of balancing services

Country	Balancing services
DE, EL, IE <sup>24</sup> , LT, SE, SI, UK-NI (8)	Still possible to use balancing services
BG, CZ, ES, FR, IT, PT <sup>25</sup> , SK (7)	Use of balancing services foreseen/ under discussion
AT, BE, DK, HR, HU, LU, NL, PL, RO, UK-GB (10)	No plan to use balancing services

# 3.2.1.1 Barriers reported on operational balancing implementation

Northern Ireland and Portugal, as well as six respondents already reporting barriers to implement STSPs last year (BG, DK, IE, PL, SE and SK), were still facing low levels of market liquidity.

All of these respondents (except DK) also predict the use of interim measures (see also Chapter 3.8) such as balancing platforms in order to stimulate the short-term market. Next year, Poland plans to analyse the merger of the H-gas and Transit Gas Pipeline System (TGPS) balancing areas in order to mitigate the low liquidity level in the H-gas market.

Denmark intends to permit trade in five pre-defined slots in order to stimulate the within-day market by concentrating activity.

As stated in the last report, some countries continue to foresee balancing services (see *table 3* above) in cases where the STSPs cannot provide an adequate response to keep the transmission network within its operational limits and in the absent liquid trading of STSPs. Balancing services can also be employed at some entry points of the transmission network, for example in Greece at the Revythoussa LNG terminal. The trading of STSPs in adjacent balancing zones could be used and are planned to be used by 13 countries (AT, BE, BG, CZ, DE, EE, HR, IE, LU, PL, RO, SE, SK) for balancing purposes. These measures require regulatory review on an annual basis (see also Annex III, tables 3.5 and 3.6).

### 3.2.1.2 Operational balancing implementation practices

Countries reported a range of experience regarding the cooperation with adjacent balancing areas for the development of relevant STSPs: As noted above, Belgium and Luxembourg have cooperated under the BeLux project. Poland emphasises its cooperation with other TSOs concerning STSPs within the Gas Regional Initiative consultation. Spain reported an ongoing cooperation with the adjacent TSOs under the South Gas Regional Initiative. In Italy, coordination with the adjacent TSOs supported the application of STSPs. Sweden mentioned it has open discussion of this topic with Denmark. Other respondents have unilaterally developed STSPs (e.g. DK, NL, UK-GB). Two others have not yet opened discussions on STSPs with neighbours, (RO, UK-NI) due to the planned implementation of interim measures.

<sup>&</sup>lt;sup>24</sup> Ireland is operating balancing services under interim measures.

<sup>&</sup>lt;sup>25</sup> In Portugal no provisions have been implemented so far with regard to Balancing Services, but this is a possibility that is not discarded at this point, depending, among other conditions, on the liquidity of the Iberian gas market in the near future.





NRAs can incentivise the TSO to undertake balancing actions efficiently or to maximise balancing through the trade of short term standardised products. This could foster liquidity in the short term market. Four respondents indicated that an incentive mechanism applies, but in different ways (AT, FR, UK-GB) or is under discussion (ES). Further details can be found in Annex III, table 3.7).

In five countries (BE, DK, FR, LU, NL) specific operational limits already apply for the TSO balancing actions in order to incentivise the TSO to reduce its balancing activities. In Slovakia the application of specific operational limits is planned (see Annex III, table 3.8).



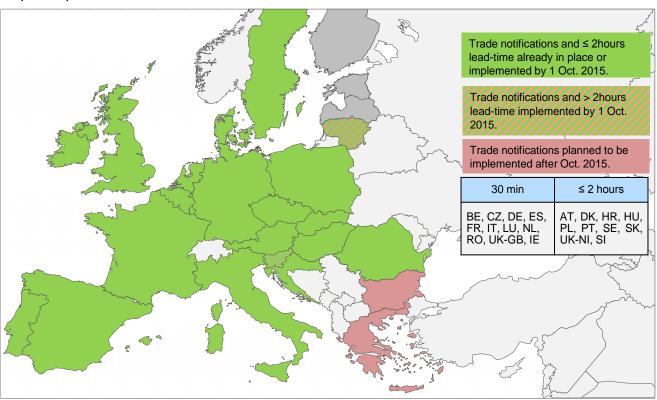


#### 3.2.2 Balancing System

Trade notifications are intended to incentivise network users to optimise their gas portfolios options and obligations efficiently and as an outcome minimise the need for transmission system operators to undertake balancing actions.

Countries have to implement trade notifications by 1 October 2015 if they do not have a derogation for implementation by 1 October 2016.

Map 3: Implementation of trade notifications



<sup>\*</sup>Estonia stated that trade notifications are already in place.

Map 3 shows that the majority of respondents reported that trade notifications are already in place or planned for implementation by 1 October 2015. Two respondents (BG, EL) are still in the process of introducing trade notifications, finalising the process after October 2016.

20 countries (AT, BE, CZ, DK, EE, ES, FR, HR, HU, IE, IT, LT, LU, NL, PL, PT, SE, SI, SK, UK-GB, UK-NI) already established the scheme that allows network users to transfer gas between two balancing portfolios within one balancing zone or within a trading region as applied in France.





Luxembourg has merged its market area with Belgium from 1 October 2015 and therefore allows trade notifications via ZTP. Romania planned the implementation of such a scheme as of 1 October 2015. Greece will implement the mechanism in April 2019. Bulgaria has not yet specified a timeline. Table 4 shows the lead-time across countries as of 1 October 2015.

Table 4: Lead-time across countries as of 1 October 2015

		Lead-time		
	30 min	≤ 2 hours	>2 hours	Not implemented
Countries	BE, CZ, DE, ES, FR, IE, IT, LU*, NL, RO, UK-GB	AT, DK, HR, HU, PL, PT, SE, SI, SK, UK-NI	EE*, LT	BG, EL

<sup>\*</sup> Derogation

#### 3.2.3 Nominations

The information the TSO receives from a network user's gas nomination is essential to the safe and efficient balancing of the network. It is from this information that TSOs are able to predict where and to what extent gas imbalances are likely to occur. Nominations are therefore a central part of the BAL NC. The BAL NC sets out basic nomination and re-nomination rules for TSOs and shippers to follow when nominating and re-nominating gas quantities at Interconnection Points.

As can be seen in the map below, ten respondents (DE, FR, IE, IT, LU, PT, RO, SI, UK-GB, UK-NI) indicate that they plan to have these provisions in place by 1 October 2015. Spain plans to be ready by 1 November 2015 and the Czech Republic will follow on 1 January 2016.

In nine countries (AT, BE, DK, HR, LT, NL, PL, SE and SK) the TSOs are already compliant with the rules for nominations as set out in the BAL NC.

Two respondents (BG and EL) are still in the decision making process regarding implementing of the nomination rules. Details on the national schedules on the implementation of nomination provisions can be found in Annex V, table 5.1. A review how these schedules were respected shall be carried out by the Agency after the implementation deadline of 1 October 2015.

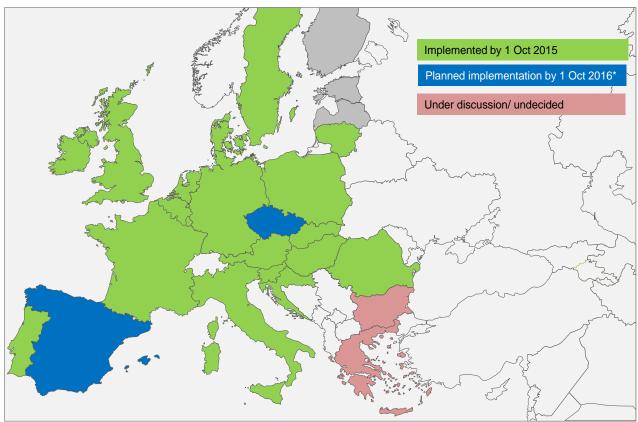
At certain interconnection points hourly and daily nominations coexist. Details on the co-existence of hourly and daily nomination<sup>26</sup> regimes can be found in Annex V, table 5.2.

<sup>&</sup>lt;sup>26</sup> At the interconnection points, where hourly and daily nomination regimes co-exist, NRAs or TSOs may consult stakeholders in order to harmonise nominations and re-nominations at both sides of this interconnection point. The NRAs approve the change proposals made.





Map 4: Implementation of nomination provisions



\*Spain implemented the nomination provisions of BAL NC by 1 November 2015.

#### 3.2.3.1 Standard re-nomination lead-time of two hours

In 21 countries the standard renomination lead-time of two hours will be applied according to Article 15(3) of BAL NC. However, in two countries (BG and LU) other lead times are in place. This is reported to be a consequence of the special circumstances at certain interconnection points (IPs).

At the IP Remich between Germany and Luxemburg the renomination lead time is two hours and 15 minutes<sup>27</sup>. In Bulgaria a longer lead-time is used<sup>28</sup>. The Bulgarian TSO is currently in the process of concluding Interconnection Agreements with the adjacent TSOs for the Bulgarian-Greek IP and for the Bulgarian-Romanian IP allowing TSOs to jointly set the procedures for nominations/renominations.

<sup>&</sup>lt;sup>27</sup> Luxembourg holds derogation but reported that balancing rules applied since 1 October 2015 within the BeLux integrated market are compliant with the BAL NC. The additional time is used by Creos Luxemburg to renominate in case suppliers do not fulfil their nominations obligations/restrictions based on the forecast offtake at this IP.

<sup>&</sup>lt;sup>28</sup> Bulgaria reported that network users submit their day ahead nominations D-1 and receive confirmed day ahead nominations D-1. Currently, intraday re-nominations are not allowed.





# 3.3 Information provision (Chapter VIII of the BAL NC)

The Code outlines the information that the TSO must provide to network users during the gas day. This information covers: 1) the overall status of the transmission network, 2) the transmission system operator's balancing actions and 3) the network user's inputs and off-takes for the gas day.

16 respondents (AT, BE, DE, DK, EL, ES, FR, HU, IT, LT, LU, NL, PL, SE, SI, UK-GB, UK-NI) reported that as of 1 October 2015 all three types of information required by Art. 32 of the Code would be or are already provided. In Italy and Spain they will be provided as of 1 November 2015.

Seven respondents (BG, CZ, HR, IE, PT, RO, SK) reported that the process of full implementation is under development with one or two types of information already provided.

	Implementation of the information provisions established by Article 32 of the BAL NC		
	All 3 types of information	2 types of information	1 type of information
Countries	AT, BE, DE, DK, EL, ES*, FR, HU, IT*, LT, LU, NL, PL, SE, SI, UK-GB, UK-NI	CZ, IE, SK	BG, HR, PT, RO

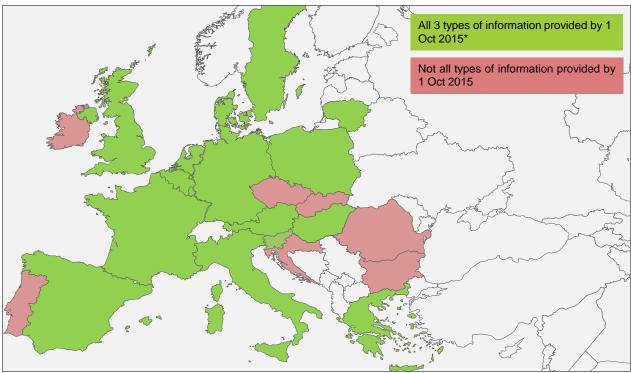
<sup>\*</sup> Italy and Spain will provide all the information by 1 November 2015.

Further details on replies provided by Countries on the implementation of the information provisions established by Article 32 of the BAL NC can be found in Annex VI table 6.1.





Map 5: Implementation of information provisions as reported by the countries



<sup>\*</sup> Italy and Spain implemented the information provisions by 1 November 2015.

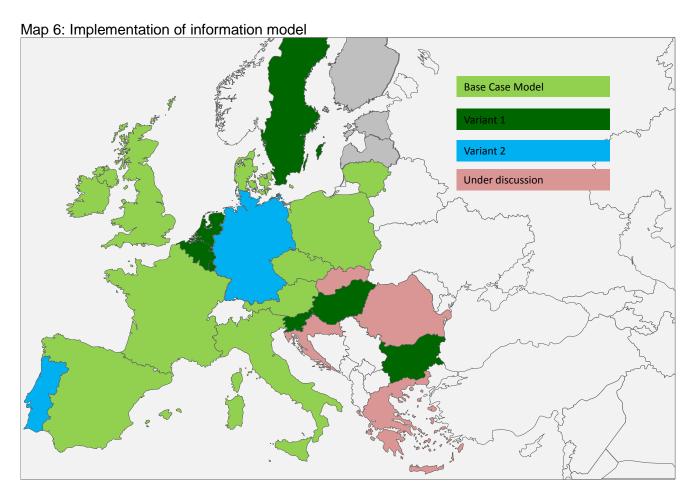
The BAL NC allows three different information models for non-daily metered off-takes, as specified in Article 36 of BAL NC. These are a 'base case' model, a 'variant 1' and a 'variant 2', which differ in how allocation data is calculated and how and whether forecasts are provided.

According to the definitions in BAL NC, 'base case' means the model for information provision where the information on non-daily metered off-takes consists of day ahead and within day forecasts; 'variant 1' means the model for information provision where the information on non-daily metered and daily metered off-takes is based on apportionment of measured flows during the gas day and 'variant 2' means the model for information provision where the information on non-daily metered off-takes is a day ahead forecast<sup>29</sup>. The following map illustrates which information model for non-daily metered off takes will apply in the respective countries.

<sup>&</sup>lt;sup>29</sup> According to article 36 (1), where base case model is applied, TSO shall provide network users with a minimum of two daily updates of the forecast of their non-daily metered off-takes. According to article 36 (4), where the information model variant 1 is applied, TSO shall provide network users with a minimum of two daily updates of their apportionment of measured flows. According to article 36 (5), where variant 2 model is applied, TSO shall provide network users with a forecast of their non-daily metered off- takes, as referred to in paragraph 1(a): on gas day D-1, the TSO shall provide network users with a forecast of their non-daily metered off-takes for gas day D no later than 12:00 UTC (winter time) or 11:00 UTC (daylight saving.







In Austria the model is currently not applicable as there are no non-daily metered off-take points connected to the transmission system. In case a non-daily metered off-take point is connected to the transmission system, Austria will be prepared to apply the 'base case'. According to Article 33(5) of BAL NC, a prior market consultation has to be conducted if a country decides to apply 'variant 2' as the information model for non-daily metered off takes, after the entry into force of the Code. In Portugal, no public consultation has been conducted to underpin the NRA decision. 'Variant 2' was proposed by the TSO and DSOs to the NRA. Table 6.2 in Annex VI provides an overview on the model for information provision chosen by the Countries.

#### Provision of final allocation data

The BAL NC does not define a time limit for TSOs to provide each network user with the final allocation for its inputs and off- takes and the final daily imbalance quantity. Such a time limit shall be defined at national level.

The Agency and ENTSOG asked TSOs and NRAs to indicate the timeframe in which final allocation data, used for the calculation of the daily imbalance charges, is submitted to network users. The responses showed that divergent approaches are used. This was due to the fact that 'final allocation data' is understood differently in some countries. 17 countries (AT, BG, CZ, DE, DK, EE, ES, HU, IE,





IT, LT, PL, RO, SI, UK-GB, UK-NI) use a comparably longer period (days/month) for the provision of final allocation data, however in these countries the data already includes a reconciliation procedure. In three countries (BE, LU, NL) the reconciliation is separated from the calculation of imbalance charges and therefore final allocation data can be provided in minutes/hours.

Further details on the final allocation data can be found in Annex VI, table 6.3.

Due to difference of approach to providing final allocation data across EU countries, the Agency and ENTSOG consider that maximum transparency should be provided to shippers to ensure that they are fully aware of the time periods which will apply in each domain.

#### **Establishing a forecasting party**

TSOs and NRAs were also asked to indicate whether or not they are planning to establish a forecasting party and if planning to do so, which party will take on this role.

16 respondents indicated that they are planning to establish, or have already established, a forecasting party. Half of these respondents (BE, DK, IE, IT, LU, PT, RO, UK-GB) reported that the forecasting task will be fulfilled by the respective TSO. Five respondents (AT, DE, ES, HU, LT) have indicated that the forecasting task is fulfilled by Distribution System Operators (DSOs) and/or specific bodies that coordinate DSOs or collaborate with DSOs to determine the demand forecast (ES).

For three respondents (HR, PL, SI) a final decision on the forecasting party has yet not been taken.

Table 5: Overview of Forecasting party

	Forecasting party				
Countries	TSO	DSO or other specific bodies	Under discussion		
	BE, DK, IE, IT, LU, PT, RO, UK-GB	AT, DE, ES, HU, LT	HR, PL, SI		

#### 3.3.1 Outstanding issues reported on information provision

In the first BAL NC early implementation report five countries (FR, HU, IT, PL, SE) identified the insufficient information provision regarding consumers without daily metering and an inconsistent information exchange between TSOs and DSOs, as two of the main barriers to the implementation of the BAL NC.

In particular, three main issues were identified:

- 1. Implementation of new IT systems and new SCADA systems;
- 2. Upgrading of metering systems;
- 3. DSOs' ability to deliver information at the right time.

Six countries (BG, DK, EL, IT, PT, SK) reported that they were still in the process of adapting their IT systems to meet the requirements of the BAL NC, either as of October 2015 or 2016. The same applies





to the upgrading of the metering systems for which three TSOs and NRAs (CZ, HR, HU) indicated that projects were currently performed.

Regarding the ability of DSOs to deliver information at the right time, following a cost-benefit analysis, Sweden will not implement the forecasting of the non-daily-metered off-takes. In Lithuania the TSO will provide network users with a forecast of their non-daily metered off-takes from January 2016 as the methodology will be prepared by the end of 2015. Portugal and Romania foresaw potential issues in this respect.

Further details can be found in Annex VI table 6.4.





# 3.4 Daily imbalance charges (Chapter V of the BAL NC)

The main purpose of the daily imbalance charge mechanism is to incentivise shippers to balance their inputs and offtakes. Out of balance shippers are bound to pay or are entitled to receive (as appropriate) daily imbalance charges based on a marginal sell price or a marginal buy price, depending on their balancing position on a particular Gas Day. The principle for calculating the marginal buy/sell price is set out in the Code. Where the marginal sell/buy price cannot be calculated, interim measures apply.

Last year's report highlighted three main barriers to implement daily imbalance charges: 1) insufficient short term wholesale gas market liquidity to establish a market-based imbalance charge; 2) insufficient information provision regarding consumers without daily metering and inconsistent information exchange between TSOs and DSOs; and 3) difficulty identifying which network user causes imbalance in the system.

This year, short term wholesale gas market liquidity was reported to continue to be low in some countries (HR, PL), which could pose a risk in efficient balancing energy market (HR) or led to interim measures (PL)<sup>30</sup>. Another respondent (CZ) noted that there were ongoing discussions between the NRA and market participants regarding the level of the small adjustment to daily imbalance charges.

Most responses did not highlight specific issues. However, it is important to note that a number of countries are still in the early stages of implementing daily imbalance charges in line with BAL requirements. These development stages include: methodology yet to be approved by the NRA (ES, SK); interim measures under development (BG); overall balancing regime still under discussion prior to detailed implementation (PT).

#### Reduction of daily imbalance quantities to zero and publication of methodologies

The reduction of network users' daily imbalance quantities to zero each day (instead of rolling over to subsequent days) is a fundamental element of a daily balancing regime. Table 6 shows the implementation of this requirement, it also indicates whether the daily imbalance charge methodology has been published and provides a link to the relevant website where available. More information on the daily imbalance charges can be found in Annex VII, table 7.1.

<sup>&</sup>lt;sup>30</sup> Interim measures will be evaluated on a yearly basis.





Table 6: Overview of Daily Imbalance Charge

Country	Daily imbalance quantities reduced to zero each day?	Daily imbalance charge methodology published?
AT	Yes	<u>Yes</u>
BE	Yes	<u>Yes</u>
BG	No <sup>31</sup>	No (under development)
CZ	Yes	No
DE	Yes	<u>Yes</u>
DK	Yes	Yes
EE	No answer	Yes
EL	Yes	Yes
ES	Yes	No (under development)
FR	Yes	Yes
HR	Yes <sup>32</sup>	Yes: Gas market rules (Croatian) and Transmission network rules (English translation).
HU	Yes	<u>Yes</u>
IE	Yes	<u>Yes</u>
LT	Yes	<u>Yes</u>
LU	Yes	Yes.
NL	Yes	<u>Yes</u>
PL	Yes	<u>Yes</u>
PT	No <sup>33</sup>	No
RO	Yes	<u>Yes</u>
SE	Yes	No
SI	Yes	<u>Yes</u>
SK	Yes	No
UK-GB	Yes	Yes: <u>Daily Imbalance calculation</u> . <u>Default System Marginal Price statement</u> .
UK-NI	Yes	<u>Yes</u>

<sup>&</sup>lt;sup>31</sup> Neutrality methodology in Bulgaria under development.

<sup>&</sup>lt;sup>32</sup> Current methodology includes roll over (to next month) of negligible portion of cumulative daily imbalance of a balancing group not covered by activated balancing energy. Future methodology adjustments are under discussion.

 $<sup>^{33}</sup>$  A definitive balancing model to choose is still under evaluation. No decision has been taken yet.





# 3.5 Neutrality (Chapter VII of the BAL NC)

One of the main principles of the Code is that the TSO shall be neutral to the charges in relation to its balancing activities in order to ensure that it has no perverse incentive to intervene in the market or not. This means that the TSO shall pass any costs or revenues arising from balancing activities to network users.

As underlined in the first report, the majority of respondents (19) confirmed that provisions on neutrality are already in place or will be implemented before the end of 2016. Neutrality provisions are still under discussion in two countries (RO and SE) and are reported as not applicable by two countries (AT and NL), the details can be found in Annex VIII, table 8.1 The time of publication of the methodology for the calculation of the neutrality charge (and if available the related link) is indicated in Annex VIII, table 8.1

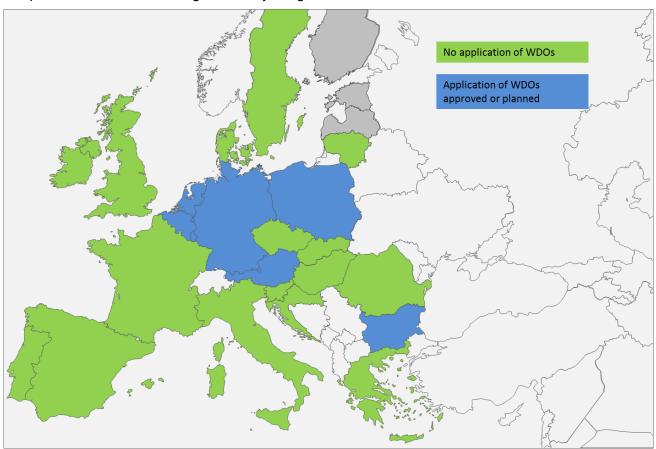
Only one country (Germany that applies the information model "variant 2") stated that the neutrality methodology provides for a separate neutrality charge for balancing in respect of non-daily-metered off-takes. More detailed information on the above issue and updated information on the neutrality charge mechanisms provided by NRAs and TSOs are described in Annex VIII, table 8.2.





# 3.6 Within Day Obligations (Chapter VI of the BAL NC)

Map 7: List of countries using within day obligations



Out of the 23 countries that do not hold a derogation, seven countries will or are planning to apply WDOs in their systems. In the last report five countries (AT, BE, DE, LU and NL) indicated the application of WDOs and one country indicated the potential application (SI). Since then, Bulgaria and Poland have decided or are planning to apply WDOs, while Slovenia has decided not to.

Subject to the approval of the relevant NRA, the BAL NC allows for the application of three different kinds of WDOs as specified in Article 25 of the Code. Accordingly, WDOs can either be 'system-wide', 'balancing portfolio' based or 'entry-exit point' based.

The Netherlands, Belgium and Luxembourg (the latter two in the framework of the BeLux market integration) will apply a system wide WDO according to which the balancing of the entire system is assessed (as an aggregate of the balancing positions of all network users) and WDOs will only lead to financial consequences for network user in cases where the total balancing position exceeds specified operational thresholds. In case the total balancing position of the market exceeds the operational thresholds, all network users who contribute to the imbalance are settled proportionately,





on the basis of their intra-day imbalance position in their respective balancing portfolio. In all three countries, network users are provided with portfolio and system information frequently during the day (hourly basis in Belgium and Luxembourg, near-real time in the Netherlands) in order to allow network users to act. The TSOs and NRAs in all the three countries have already consulted on these provisions.

Germany and Austria will apply a portfolio based WDO assesses the intra-day balancing position of an individual network user. In Austria, WDOs are applied on a TSO level and network users are incentivised to keep hourly intakes and offtakes balanced by being charged with a 'balancing incentive mark-up for hourly imbalances<sup>34</sup>. In Germany, network users are also charged with 'balancing incentive mark-ups for hourly imbalances, while certain tolerances are granted for hourly imbalances if supplying industrial consumers<sup>35</sup>. Portfolio imbalance information is provided to network users on an hourly basis in Austria and twice during the day in Germany. Consultations on the application of WDOs have been conducted in Austria and Germany.

In Poland the TSO has proposed to apply different WDOs to different parts of the system. At IPs with Non-EU countries, network users are required to nominate a minimum value and are subject to specified re-nomination right restrictions. Furthermore, there are tools planned to oblige network users in the high-calorific gas zone to keep hourly inputs and offtakes in balance in case of a threat to the gas transmission system integrity. Information on portfolio imbalances will be provided to network users according to the requirements of BAL NC. A consultation on the WDOs has been conducted by the Polish TSO and are pending NRA approval.

WDOs are planned in Bulgaria, however neither their specific functioning nor the framework in which they apply has been designed. A consultation has not been conducted yet.

The links to the published consultations on WDOs can be found in in Annex IX, table 9.1 and details on WDOs can be found in Annex IX, table 9.2.

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<sup>&</sup>lt;sup>34</sup> In Austria, the balancing incentive markup is only charged if the hourly Market Area is short and the hourly Balancing Group imbalance is short too. The markups are as follows starting from 1 November 2015:

a) hourly Imbalance:

<sup>&</sup>lt; 300 000 kWh/h -> 0,001 € (0,1 cent) per kWh;

<sup>&</sup>gt; 300 000 kWh/h -> 0,01€ (1 cent) per kWh;

b) monthly fees per Balance Group < 50 € are not charged.

<sup>&</sup>lt;sup>35</sup> In Germany the tolerance for daily metered consumers is 2% or 15% depending on the annual consumption of the customer and the structuring charge amounts to 15% of the mean value of the applicable reference price (see article 24 of Balancing Group Contract)

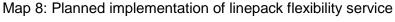


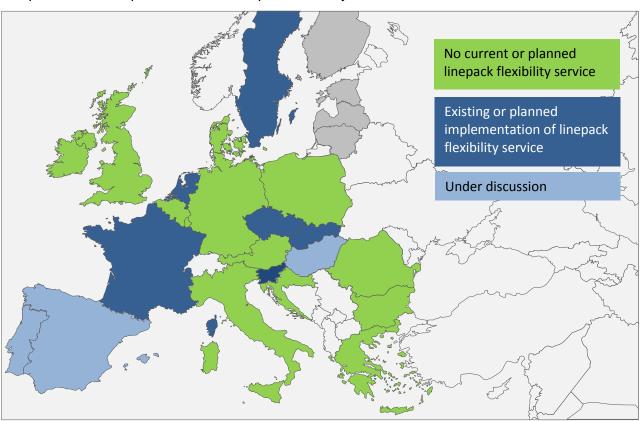


# 3.7 Linepack flexibility service (Chapter IX of the BAL NC)

The BAL NC provides the possibility to offer a linepack flexibility service<sup>36</sup> to shippers on the condition that the main terms and conditions are approved by the NRA. This service shall be consistent with the responsibility of the shipper to balance its inputs and off-takes throughout the gas day.

As can be seen in Map 8, nine countries already offers or are discussing whether to offer the linepack service in their systems (CZ, ES, FR, HU, IE, IT, NL, PT, SE, SI, SK); among these, four countries already offer this service (FR, NL, SE, SK). In Spain the service currently offered, linked to the booking of capacity, will disappear on 1 January 2016. The new service as required by BAL NC is still under discussion.





<sup>36</sup> Linepack flexibility is a commercial service which utilises the flexibility within the transmission system.





#### 3.7.1 Implementation practices

The Netherlands does not offer a linepack flexibility service, as a contract. There, linepack flexibility is considered as a system service delivered from the system linepack buffer. Therefore, the TSO only applies marginal costs, the service does not result in TSO revenues and consequently, the charge (currently 0.4% of the neutral gas price) is intended to incentivise network users to balance their portfolio at the end of the day, instead of being charged to cover TSO expenses.

In France the linepack flexibility service is offered as a contract since 1<sup>st</sup> October 2015, which is called "ALIZES" in the GRTgaz offer and "SET" in the TIGF offer.

The application of a linepack flexibility service in SK is under discussion.

In Sweden the linepack flexibility service is already offered, however amendments to comply with the BAL NC provisions might be necessary. In all the other countries the offer of the linepack flexibility service has either been agreed but not implemented yet (SI) or it is under discussion (CZ, ES, HU, PT).

Detailed information on the planned implementation of the linepack flexibility service can be found in, Annex X, table 10.1.





# 3.8 Interim measures (Chapter X of the BAL NC)

As mentioned in Chapter 3.1, the BAL NC provides countries with several alternatives concerning implementation timelines. Absent sufficient liquidity in the short term wholesale gas market, TSOs can implement interim measures until April 2019 in order to have more time to develop a more liquid and competitive short term market. The options for applying interim measures are laid down in Chapter x of the Code.

#### Interim measures consist of:

- the establishment of a balancing platform<sup>37</sup> or an alternative to a balancing platform for the purpose of balancing, as a substitute to the trading platform;
- the application of an interim imbalance charge, as a substitute to the daily imbalance charge;
- the application of tolerances.

The implementation of interim measures by TSOs is subject to market consultations and NRA's approval. It requires that all the other provisions of the BAL NC have to be implemented by October 2015 and excludes the application of the transitory period option (one-year extension). TSOs should have submitted to the NRA for approval the request for implementing interim measures by October 2014 and NRA approval should have been issued within six months from the receipt of the complete report.

Implementation of the interim measures shall also require the publication of an annual report submitted to the NRA outlining the reasons for the application of the interim measures and their potential continued use.

11 respondents (including EE) - three more than in the previous report - have indicated a planned use of interim measures (BG, DE, EE, EL, IE, LT, PL, RO, SE, SK, UK-NI). In Germany the majority of the BAL NC provisions will be in place by October 2015, while some changes introduced by "GaBi Gas 2.0" will be implemented by 1 October 2016 at the latest<sup>38</sup>. Furthermore, the NRA agreed to continue the use of the existing balancing platforms until April 2019 for locational products, as the existing local or point specific balancing gas requirements cannot be met with standardised exchange products and instead have to be met by the market area managers buying or selling local balancing products on the physical balancing platforms<sup>39</sup>. Poland will apply different interim measures for all its three balancing areas (high-calorific, low-calorific and the Polish section of Yamal pipeline).

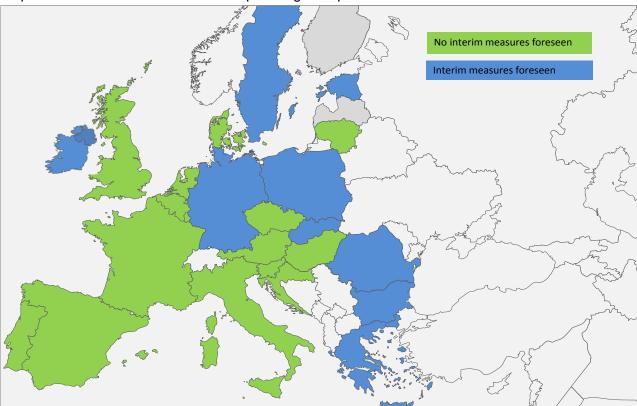
<sup>&</sup>lt;sup>37</sup> A balancing platform is a trading platform where the TSO is a trading participant to all trades. The establishment or confirmation of the balancing platform is an interim measure subject to NRA's approval and must end by April 2019 but can be extended by further 5 years by the NRA.

<sup>&</sup>lt;sup>38</sup> In those areas which are implemented by 1 Oct 2016, BNetzA reported that the current national rules already fulfil the requirements of NC BAL.

<sup>&</sup>lt;sup>39</sup> The exchange plans to integrate some locational products based on grid zones in the coming months. As reported by BNetzA, an action from the TSO at a specific point in the grid was in the past only required in peak demand situations.







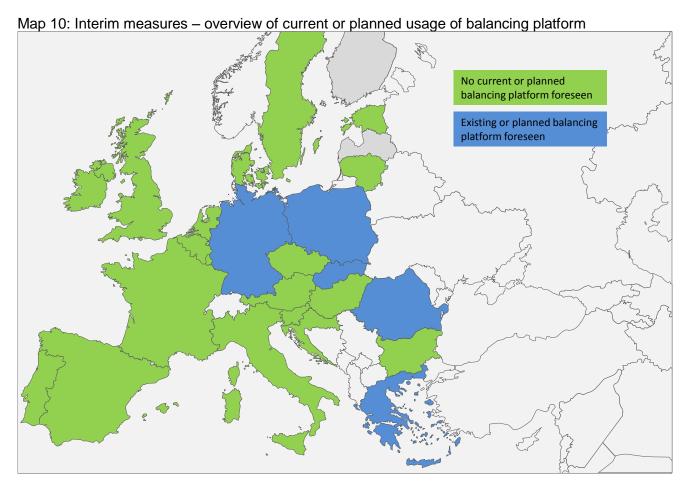
Map 9: Interim measures – Countries planning to implement interim measures

All TSOs have consulted on the application of interim measures, except for Lithuania. The link provided by the respondents to the TSO's consultation documents can be found in Annex XI, table 11.1. A motivated decision has not been issued yet by two NRAs in Bulgaria and Romania. Five respondents (DE, IE, PL, SE, UK-NI) provided with the link to the final decision issued. Further details on the consultation process can be found in Annex XI, table 11.1.

Five countries plan to establish or to continue to use one or more balancing platforms (DE, EL, PL, RO, SK). Map 10 below provides an overview of the current or planned usage of balancing platforms in Europe. Annex XI, table 11.2 provides reasons why balancing platforms are used.







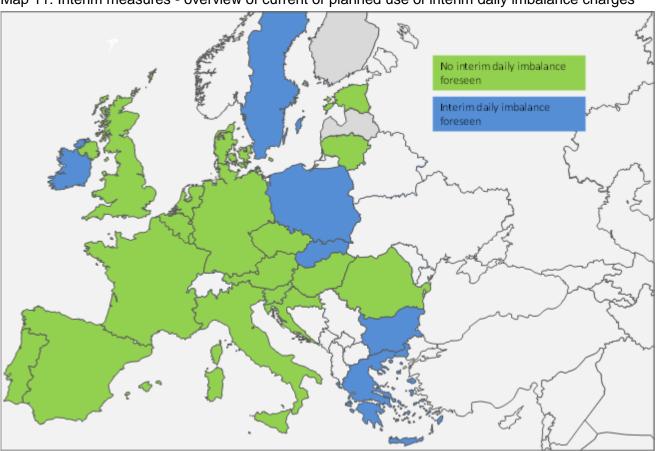
<sup>\*</sup> The above map should be looked at in conjunction with map 2 in section 3.2.1. The existence of a trading platform fulfilling all conditions in Article 10 of the BAL NC makes in principle unnecessary to establish a dedicated balancing platform. All countries with existing or planned balancing platforms do not have a trading platform, except Germany and Poland.





Six countries plan to establish or continue to apply an interim daily imbalance charge (BG, EL, IE, PL, SE, SK). Map 11 shows the countries expecting to use an interim daily balancing charge. Table 11.3 of Annex XI provides the reasons for the application of the interim daily imbalance charge identified.

Map 11: Interim measures - overview of current or planned use of interim daily imbalance charges

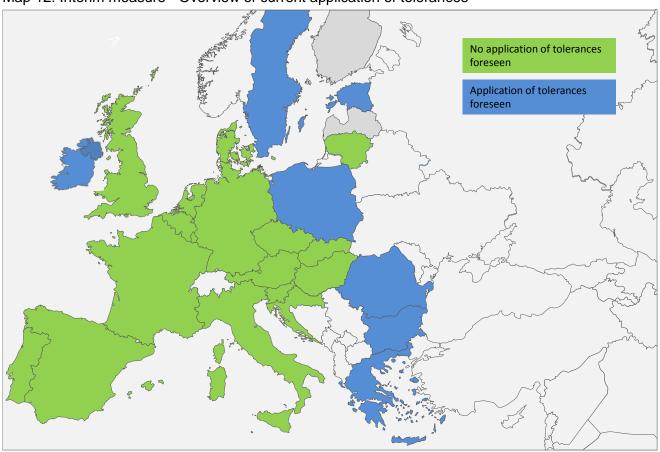






Eight respondents envisage the usage of tolerances (BG, EL, IE, LT, PL, RO, SE, UK-NI)<sup>40</sup> as shown in Map 12. Table 11.4 of Annex XI describes the reasons for the usage of tolerances.

Map 12: Interim measure - Overview of current application of tolerances

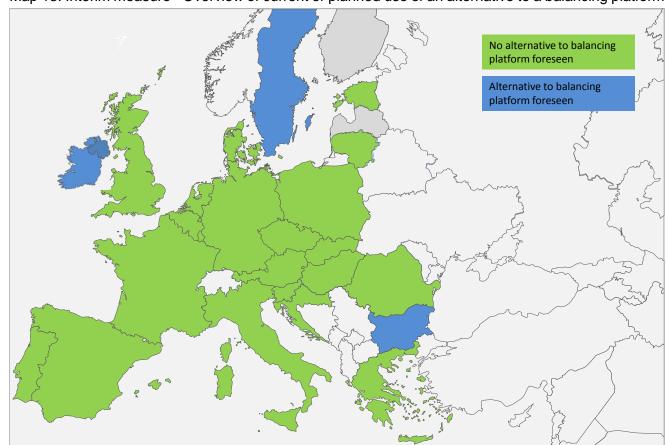


 $<sup>^{40}</sup>$  Estonia plans to apply tolerances, details are included in Annex XI, Table 11.4.





Four respondents plan to implement an alternative to a balancing platform (BG, IE, SE, UK-NI). Table 11.5 of Annex XI provides the reasons why they consider an alternative to a balancing platform to be necessary.



Map 13: Interim measure - Overview of current or planned use of an alternative to a balancing platform

#### 3.8.1 Overview on the implementation of interim measures

The main reasoning given by the respondents for not implementing all elements of the BAL NC as of 1 October 2015 or 1 October 2016 is the lack of liquidity in the market. The use of interim measures therefore aims at easing and facilitating the transfer from a non-liquid market into a market where network users are responsible for balancing their own portfolios and where the intention is to limit TSO trade to residual balancing.

#### The breakdown is as follows:

Four countries (EL, PL, RO, SK) out of ten countries implementing interim measures expect to
use balancing platforms in order to stimulate liquidity in the short term market and one country





uses it in order to procure specific products that cannot be procured on the trading platform currently in place (DE).

- Six countries (BG, EL, IE, PL, SE, SK) out of ten countries implementing interim measures plan to establish or continue to apply an interim daily imbalance charge.
- Tolerances are foreseen by eight (BG, EL, IE, LT, PL, RO, SE, UK-NI) out of eleven respondents implementing interim measures.
- Four respondents (BG, IE, SE, UK-NI) out of the eleven respondents implementing interim measures plan to continue the offer of the balancing services currently in place.

It is important that all the countries implementing interim measures have a detailed plan on how these measures work in practice and how full compliance with all BAL NC requirements will be reached. This plan should be transparent and clearly communicated to market participants, however the level of information provided in many cases suggests that more work is needed to ensure that sufficiently developed and well communicated plans are in place.









## 4 Annexes

# Annex I: List of abbreviations and country codes

Acronym	Definition
ACER	Agency for the Cooperation of Energy Regulators
ENTSOG	European Network of Transmission System Operators for Gas
NRA	National Regulatory Authority
TSO	Transmission System Operator
EC	European Commission
EU	European Union
MS	Member State
BAL NC	Balancing Network Code
IP	Interconnection Point
WDO(s)	Within Day Obligation(s)
MAM	Market Area Manager
STSP(s)	Short-Term Standardised Product(s)
DM / NDM	Daily metered / Non-daily metered

Acro nym	Country
AT	Austria
BE	Belgium
BG	Bulgaria
CZ	Czech Republic
DE	Germany
DK	Denmark
EE	Estonia
EL	Greece
ES	Spain
NL	The Netherland s

Acro nym	Country
FI	Finland
FR	France
HR	Croatia
HU	Hungary
IE	Ireland
IT	Italy
LT	Lithuania
LU	Luxembourg
LV	Latvia
SI	Slovenia

Acro nym	Country
PL	Poland
PT	Portugal
RO	Romania
SE	Sweden

Acro nym	Country
SK	Slovakia
UK-	Great
GB	Britain
UK-	Northern
NI	Ireland





#### **Annex II: General part**

Table 2.1: Expected implementation dates

Options	Ratio	Countries
Option 1: Already implemented 8		AT and NL
Option 2: Up to 1 October 2015		BE,DK, FR, HU, LT, LU, SI, , UK-GB
Option 3: Up to 1 October 2016	20%	CZ*, ES, HR, IT**, PT
Option 4: Up to 16 April 2019 (interim measures)	40%	BG, DE***, EE****, EL, IE, PL*****, RO, SE, SK, UK-NI

<sup>\*</sup> CZ foresees to implement the BAL NC by 1 July 2016.

Table 2.2: Countries indicating different implementation timings than the previous reported

Country	If the implementation timing indicated for question n.1 is different to the one indicated in your first report please describe the rationale for this.
CZ	NRA approved that the NC BAL will be implemented as of 1 July 2016.
DE	All requirements of the Network Code will be fulfilled by 1 October 2015. Some elements of the determination on gas balancing ("GaBi Gas 2.0") as the national implementation of NC BAL will be implemented by 1 October 2016 at the latest. Only for the existing balancing platforms the NRA has approved the continued use as an interim measure for a period of five years.
EE	Due to neighbouring TSO's (LV) derogation until April 2017.
IT	Both the NRA and the TSO are working to have the full set of rules implemented and completed by October 2015 as declared in the first ACER-ENTSOG report. However, as during the consultation process network users have asked for the possibility to have sufficient "learning period" to test the new rules/ICT systems, the full implementation of the new system is foreseen a few months later.
LU	The timing is the same as indicated in the first report from 2014, with one common balancing operator (Balansys) foreseen to manage the balancing for the BeLux integrated market (Belgium & Luxembourg). However, from 1st October 2015 until the delegation of balancing tasks from Fluxys Belgium to Balansys and the compliance programme and officer are in place for Balansys, Balansys will not be able to formally manage the

<sup>\*\*</sup> IT will complete and implement the full set of rules by October 2015 while the full implementation of the new rules/IT systems is foreseen a few months later to provide network users with enough time to test the new IT systems.

<sup>\*\*\*</sup> DE will implement the majority of the provisions of the NC by 1 October 2015 while some elements of the determination on gas balancing ("GaBi Gas 2.0") will be implemented by 1 October 2016 at the latest. Only for the existing balancing platforms the NRA has approved the continued use as an interim measure for a period of five years, in order to procure locational and temporal products that are not available on the trading platform.

<sup>\*\*\*\*</sup> EE will implement the BAL NC by April 2019 due to neighbouring TSO's (LV) derogation until April 2017.

<sup>\*\*\*\*\*</sup> In PL NRA has approved the interim measures report for one year duration. If Polish TSO foresees continuing to implement interim measures for a prolonged period (but no longer than 16 April 2019 without prejudice to Art. 47(3)) it shall prepare an updated report to resubmit it to the NRA for the approval.





	balancing for the BeLux zone. From 1st October 2015 until the final setup is put in place, Fluxys Belgium will continue to balance the Belgian network whereas Balansys, designated as balancing operator for Luxembourg by the Luxembourgish Ministry on 27 July 2015, will manage balancing for the Luxembourgish network only.
PL	The President of URE approved the interim measures report for one year duration. After this period, the whole process will be repeated in accordance with the Art. 46 (3) BAL NC. At present, it is difficult to state clearly how long the interim measures will be necessary in the subsequent years.
PT	At the time of the first report no decision had yet been taken. This topic was under discussion as it was dependent on the evolution of creation of an Iberian Gas Market. So, 2 possible dates were under evaluation at that time: 1 October 2016 or the implementation of interim measures, postponing full implementation date to 16 April 2019.

### **Table 2.3: Implementation barriers**

Country	Implementation barriers reported
BG	Such possibility exists due to the presence of one main source of gas supplies and one main supplies route (from Russia through Ukraine) for the time being and the low level of the local production, resulting in low level of market liquidity.
CZ	ERO is the main subject responsible for setting market rules in the Czech Republic while the NC BAL assigns more power to the TSO.
EE	Neighbouring TSO (LV) will not apply the NC before April 2017.
ES	Main barriers are referred to NRA's competences, which seems to be not clear for some stakeholders.
HR	Insufficient information provisions, a low liquidity of balancing energy market, lack of gas exchange and short-term standardised products.
HU	The DSO data provision (correctness and harmonization of data, responsibility of data provider) is a great risk of full implementation.
IE	The lack of liquidity at Irish Balancing Point suggests incentives be placed on shippers to balance. However, shippers are concerned about balancing incentives, given the lack of liquidity at the balancing point. It is a case of 'chicken and egg'.
ΙΤ	The implementation of the BAL NC requires significant improvements to the TSO's IT systems to manage the new business processes. The following aspects represent other potential issues related to a full functioning of the BAL NC provisions which the NRA and the TSO are working to solve: 1. Potential lack of liquidity, on the balancing market. 2. Required improvements of the metering and meter reading plants, not owned by the TSO, to comply with the definition of the gas day as foreseen in the European Regulations. 3. Management of collaterals.
PL	In the high methane gas balancing area in Poland the wholesale gas market has made a significant progress in development in recent years. Nevertheless, the liquidity of the short term wholesale gas market was insufficient in recent years. Additionally, the short-term products available at POLPX (Polish Power Exchange) were not fully adequate to the needs of TSO as concerns balancing (lack of locational products on the trading platform). What is more, the limited time of the operation of POLPX short-term gas markets during the gas day can prevent Shippers from taking balancing actions with respect to their contracts by the end of the current gas day. The advanced work is currently being conducted in order to remove above mentioned barriers. There is lack of short term wholesale gas market in the low-methane gas balancing area and Transit Gas Pipeline System (TGPS) balancing area.
PT	The major challenge will be build a true liquid Iberian gas market, that should be in place by October 2016 and this would be by far the greatest concern for all stakeholders, both Portuguese





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	and also Spanish. Domestically, the challenge will be update the communications and informatics
	systems to deliver all the information need to the market in compliance with the BAL NC.
RO	The insufficient market liquidity and lack of proper physical interconnections with adjacent
	transmission systems generate difficulties to the suppliers concerning natural gas acquisitions in
	order to balance on short term their own client's portfolio.
SE	The main barrier for Sweden for fully implementation of the Code is absence of sufficient liquidity
	for a short term market due to the limited size of the market with a small amount of consumers
	and very few active players.
UK-GB	The GB TSO has been working on its obligation to implement the EU Network Codes for a
	number of years. This has resulted in significant associated changes for GB systems. Making
	these changes alongside other GB and EU industry developments remains a key implementation
	risk which the GB industry continues to actively manage. This work has led to close collaboration
	between TSO and stakeholders throughout the GB regime, as well as adjacent TSO's and
	regulators. Full implementation still requires a number of items, from a wide range of
	stakeholders, to come together successfully and as such, the GB TSO as a prudent operator is
	leading the industry's contingency planning, to ensure that the 'operability' of the regime is
	maintained. Together, the GB industry and its adjacent stakeholders are aiming to deliver
	changes to processes, procedures & IT systems as well as new and amended contracts. Making
	these wide ranging changes whilst other EU Codes continue to be finalised and GB regime
	change continues as per business as usual has been challenging, highlighting how transparency
	and effective stakeholder engagement is key to successful implementation.
UK-NI	We have concerns that the Northern Ireland wholesale gas market will not develop sufficient
	liquidity to permit the TSO to effectively purchase balancing gas in the local market. The adjacent
	Great Britain wholesale market will therefore remain the source of such gas.

**Table 2.4: Transitional provisions** 

Country	Planned implementation date	NRA's final decision issued/published
CZ	By 1 July 2016	Request was submitted on 30 June 2015.
ES	By 1 October 2016	NRA approved implementation by 1 July 2016.  Request was submitted beginning of September 2014.  NRA's decision issued on 2 October 2014 and sent to ACER and the European Commission on 7 October 2014. The NRA's request has not been published, so no link can be provided.
HR	By 1 October 2016	Request was submitted on 22 May 2015 and amended 6 July 2015.  NRA's decision issued in September 2015. Link.
IT	By 1 October 2016	Request was submitted on 3 August 2015. <u>Link</u> to NRA's consultation. NRA's decision pending.
PT	By 1 October 2016	Request was submitted on 19 February 2015.  ERSE issued their final decision on April 2015. The motivated decision from ERSE was also sent to the EC and ACER.  Link to the NRA's decision.





Table 2.5: Link to the public consultations on the implementation timings or working plan

Country	Link to consultation on implementation timings or working plan
BE	Link1
	<u>Link2</u>
BG	<u>Link</u>
CZ	<u>Link</u> 1
	<u>Link2</u>
	<u>Link3</u>
DE	<u>Link</u>
EL	<u>Link</u>
ES	<u>Link</u>
FR	<u>Link1</u>
	<u>Link2</u>
	<u>Link3</u>
	<u>Link4</u>
	<u>Link5</u>
	<u>Link6</u>
IE	<u>Link</u>
IT	<u>Link1</u>
	<u>Link2</u>
LT	<u>Link1</u>
	<u>Link2</u>
LU	<u>Link</u>
PL	<u>Link</u>
PT	<u>Link</u>
RO	<u>Link</u>
SI	<u>Link</u>

Table 2.6: Description of the consultation on the implementation working plan or implementation timings

Country	Description of the consultation on the implementation working plan or implementation timings	
AT	According to the BAL NC provisions changes of the current system are consulted with the relevant stakeholders.	
BE	Yes, modifications to the current regulatory documents can be asked by shippers, NRA and TSO. Suggested modifications are discussed between the 3 parties during shippers/NRAs/TSO (balancing operator) information sessions. TSO or the balancing operator, as the case may be, in coordination with NRA, adapts the regulatory documents. During consultation period shippers can give their feedback. After consultation period NRA and TSO/balancing operator discuss the received feedback, if needed an additional consultation period will be installed. TSO/balancing operator (as the case may be) introduces to CREG final version of regulatory documents for approval. CREG approves / disapproves introduced documents and details its decision. As far as	





the balancing documents concern the integrated market, both TSOs, the balancing operator and **NRAs** are In order to come to the current Entry/Exit Model with daily Market Based Balancing using systemwide WDO (October 2012) and to evolve to the BeLux Market Integration Model with daily Market Based Balancing using system-wide WDO (October 2015), CREG started with a consultation on her proposal of some basic principles of a new transmission model in August 2010. CREG published on her website a consultation note and invited all concerned parties to share their considerations, comments and suggestions. This note was further elaborated during different working sessions with the regional regulators and Fluxys Belgium and was followed by market consultations and workshops organized by Fluxys Belgium from May 2011 till January 2012. The feedback received on the documents during the formal market consultations and workshops was presented to the parties during an information session. Based on the different comments received and exchanged during both the workshops and meetings, including dialogue with stakeholder organization and CREG, Fluxys Belgium submitted the regulatory documents to the CREG for approval. After the introduction of the new Entry-Exit model with daily Market Based Balancing using system-wide WDO, Fluxys Belgium organised several consultation periods to improve the service offer towards customer. In respect of CREG decision of 10th May 2012, Fluxys Belgium was requested to evaluate the functioning of the new transmission model and if necessary to adapt the operational rules in consultation with the market parties. Therefore Fluxys Belgium created amongst others an evaluation report of the first months of the new transmission model. In this evaluation report the observations of the first 9 months of the functioning of the daily market based balancing model using system-wide WDO, Electronic Data Platform, ARS capacity allocation and the trading services at ZTP (L) were handled. These topics have been changed the most with the introduction of the new transmission model and thus deserved an evaluation. These observations were also shared with the market parties and CREG during different consultation sessions. Fluxys Belgium engaged therefore stakeholders during 3 workshops, held in Brussels headquarters. During those workshops the performance analysis of Entry/Exit model was presented and discussed with stakeholders. During the third workshop, proposed amendments to briefly regulatory framework were detailed discussed. and Following this improvement cycle and as a further step, Fluxys Belgium and Creos Luxembourg, together with their respective regulators, the Commission for Electricity and Gas Regulation (CREG) and Institut Luxembourgeois de Régulation (ILR), engaged in a close collaboration to integrate their national markets from 1st of October 2015. This initiative, reflecting the European Union's ambition to create a borderless European gas market, will be the first market integration between two EU countries – a move that will provide the regulators and TSOs of both countries with an expanded pool of knowledge and experience for further integration with other neighbouring markets. This project starting on 1st of October 2015, Fluxys Belgium and Creos Luxembourg will take this opportunity to have the balancing model fully compliant with the Balancing Network Code. In order to present and discuss the BeLux Market Integration Model, Fluxys Belgium and Creos Luxembourg organized different working sessions for shippers. These working sessions have been followed by market consultations on proposed regulated documents organized by Fluxys Belgium in Belgium and ILR in Luxembourg. Based on the different comments received and exchanged during both the workshops and meetings, including dialogue with stakeholders, Fluxys Belgium resp. Creos Luxembourg submitted the capacity related regulatory documents for approval to CREG in Belgium and Creos Luxembourg to ILR for approval in Luxembourg. The balancing related regulatory documents will be submitted to CREG and ILR by Balansys, the balancing operator of the BeLux integrated market in the final setup configuration.

BG

The implementation plan is incorporated in the Report on interim measures application of that was submitted to the regulator for approval. The timeframe will be included in the second Annual Report. Below you can find the link for the public consultation that was conducted ahead of the submission:





	http://bulgartransgaz.bg/en/news/publichna_konsultaciya_na_proekt_na_doklad_za_prilagane_n a_vremenni_merki_po_reglament_es_312_2014192-c15.html
CZ	http://www.eru.cz/documents/10540/1073780/NC-BAL_navrh-koncepce-VKP.pdf (only in Czech) http://www.eru.cz/documents/10540/1158113/Proposal_Implementation_Model_NC_BAL_ENG.p df http://www.eru.cz/documents/10540/1158113/Proposal_Implementation_Model_NC_BAL_Appen
	dix+No+1_ENG.xlsx
DE	The implementation plan was part of the consultation of GaBi 2.0: http://www.bundesnetzagentur.de/cln_1421/DE/Service-Funktionen/Beschlusskammern/1BK-Geschaeftszeichen-Datenbank/BK7-GZ/2014/2014_001bis099/BK7-14-020_BKV/BK7-14-020_Einleitung%20Festlegungsverfahren_BKV.html?nn=360898 Market participants had the opportunity to give opinion on the implementation timing. The final result of the NC BAL implementation plan you can see in the table (see Annex 1): All market participants were informed transparently via the Bundesnetzagentur (BNetzA) website about the current status of the procedure and the received comments. Furthermore In addition, oral hearings were held with gas industry associations on 12 June 2014 and 10 October 2014, at which the key substantive elements of the consultation on the determination proceedings were discussed. Also the MAM as well as the associations have informed the DSO and network users on the upcoming modifications and the associated system changes.
DK	Energinet.dk had several consultations with shippers concerning implementation of the balancing model in Denmark. This has been through User Group meetings and Shipper Task Force work, where shippers and Energinet.dk have discussed the design of the model. DERA has participated as an observer. Please see the description of the balancing model here: http://www.energinet.dk/EN/GAS/Produkter-og-handel/Balance-model-fra-oktober-2014/Sider/default.aspx Follow this link to find presentations from shippers forum in Denmark: http://www.energinet.dk/EN/GAS/Det-danske-gasmarked/Sider/Aktoerforum.aspx
EL	TSO has put the 1st Interim Measures Report to public consultation from 23/12/2014 until 30/1/2015 (http://www.desfa.gr/default.asp?pid=654&rID=1547&la=1)
ES	The consultation took place at the same time than the public consultation of the rest of measures to be adopted. The public consultation was launched on 23 February 2015 and closed on 23 May 2015, and can be consulted at: http://www.cnmc.es/es-es/energ%C3%ADa/consultasp%C3%BAblicas/concluidas.aspx Additionally, according to Spanish Law, a draft written by the CNMC containing all the measures to be adopted was sent to "Consejo Consultivo de Hidrocarburos" (Hydrocarbons Consultative Board), the NRA's advisory body where all stakeholders are represented (37 representatives: public administrations, gas companies, DSOs, TSOs, users, consumers and oil companies). Representatives must send any consultation document to their represented stakeholders. Regarding other activities to inform market participants, as stated before, during the development of the different measures to adapt the Code, the NRA presented its line of work on several Fora, e.g., at the Follow-up Committee for the Spanish Gas System or the working groups for the Spanish Network Code Update.
FR	Since 2012, we have consulted market stakeholders at least once a year to inform them and to avoid any detrimental effect for competition. Our purpose was to implement as gradually as possible the network Code. http://www.cre.fr/en/documents/public-consultations/evolution-of-the-balancing-rules-for-the-gas-transmission-networks-as-at-1-october-2015 http://www.cre.fr/en/documents/public-consultations/evolution-of-the-balancing-rules-for-the-transmission-networks-of-grtgaz-and-tigf-as-at-1-may-2014 http://www.cre.fr/en/documents/public-consultations/proposition-of-grtgaz-exceptional-evolution-of-balancing-rules-on-its-network-for-winter-2013-2014 http://www.cre.fr/en/documents/public-consultations/evolution-of-grtgaz-s-balancing-rules http://www.cre.fr/en/documents/public-consultations/evolution-of-grtgaz-s-balancing-rules





	http://www.cre.fr/en/documents/public-consultations/evolution-to-the-balancing-systems-of-grtgaz-and-tigf
HR	BAL Task Force was established, first draft of implementation working plan is done. In December 2014, public consultations on new Market rules which set up transitional gas balancing model towards full implementation of BAL NC. Link: <a href="http://www.hrote.hr/default.aspx?id=278">http://www.hrote.hr/default.aspx?id=278</a> (only in Croatian).
HU	Questionnaire and interview based consultations of all market participants have been undertaken by an external advisor company (Mosaic Energy Kft.) on behalf of NRA. As part of the national Grid Code harmonization process market participants have been invited to take part on consultation and submit proposals.
IE	Consulted with shippers in the Code Modification Forum.
IT	Following Italian NRA indications, Snam Rete Gas has elaborated a work-plan for the activities needed for the implementation of BAL NC (see http://www.autorita.energia.it/allegati/docs/14/485-14alla.pdf) According to the work-plan, Snam Rete Gas launched the following consultations: • on February 2015, related to the BAL NC articles 13-15, 17, 32.1 e 32.3, 34-36 (proposal published on SNAM RETE GAS website at the following link: http://www.snamretegas.it/it/servizi/Codice_di_rete/Aree/aggiornamento.html) • on April 2015, related to the BAL NC articles 4, 6-9,19-23,29 e 32.2 (proposal published on SNAM RETE GAS website at the same link). On June 2015 Snam Rete Gas transmitted to the Italian NRA the proposals for the amendments of its Network Code About the information to market participants, Snam Rete Gas has organized on May 2015 a full day meeting. Other activities are planned in the near future. The NRA has performed a parallel consultation. The outcomes stressed the need to have in place a clear and comprehensive picture of the new rules (e.g. also criteria of TSO's intervention in the market, incentives mechanism, criteria used for setting the small adjustments, link with emergency situations etc). It was also highlighted the opportunity to keep instruments to foster liquidity already in place (CMP storage rules, linepack management, additional storage capacity), as well as the possibility to envisage a learning period for the application of the new rules.
LT	Some of the provisions of the Balancing Network Code are included in the AB Amber Grid Rules for Access to the Natural Gas Transmission System and AB Amber Grid Rules for Natural Gas Transmission System Balancing, which were discussed with the market participants during the public consultation. Link to the public consultation document: http://www.regula.lt/Puslapiai/naujienos/2014-metai/2014-11/viesoji-konsultacija-del-naujos-redakcijos-naudojimosi-amber-grid-gamtiniu-duju-perdavimo-sistema-ir-balansavimo.aspx The other requirements (like related to forecasting party) still have to be included in the aforesaid rules of TSO in the near future. As required by the provisions of the Balancing Network Code, there was also public consultation regarding the forecasting party: http://www.regula.lt/Puslapiai/naujienos/2015-metai/2015-06/komisija-skelbia-viesaja-konsultacija-del-prognozuojancios-salies-paskyrimo-gamtiniu-duju-balansavimo-tikslais.aspx Regarding the other activities, TSO organized the meeting with market participants on introduced changes in the rules due to BAL NC implementation and other reasons. Public consultation on the Rules was organized by NCC and will be organized for upcoming changes.
LU	Fluxys Belgium and Creos Luxembourg, together with their respective regulators, CREG ILR are engaged in a close collaboration to integrate their national markets from 1st October 2015. This initiative, reflecting the European Union's ambition to create a borderless European gas market, will be the first market integration between two EU countries – a move that will provide the regulators and TSOs of both countries with an expanded pool of knowledge and experience for further integration with other neighbouring markets. This project starting on 1st October 2015, Fluxys Belgium and Creos Luxembourg will take this opportunity to have the balancing model fully





	compliant with the BAL NC. In order to present and discuss the BeLux Market Integration Model, Fluxys Belgium and Creos Luxembourg organized different working sessions for shippers. These working sessions have been followed by market consultations on proposed regulated documents organized by Fluxys Belgium in Belgium and ILR in Luxembourg. Based on the different comments received and exchanged during both the workshops and meetings, including dialogue with stakeholders, Fluxys Belgium resp. Creos Luxembourg submitted the capacity related regulatory documents for approval to CREG in Belgium and to ILR in Luxembourg. The balancing related regulatory documents will be submitted to CREG and ILR by Balansys, balancing operator for BeLux integrated market in final setup configuration.  Documents consulted: http://www.ilr.public.lu/gaz/consultations/conspub020215/index.html
NL	There were ad hoc meetings (ca. 10) with representative organizations and shippers where the NRA was organizing party and/or present. TSO presented proposals, adjusted proposals, and implementation guidelines for shippers. The final implementation was generally favoured by the majority of market participants. The formal decision (with process description and role of market participants) of the regulator is published (in Dutch): https://www.acm.nl/nl/publicaties/publicatie/12879/Implementatie-NetCode-Balancing/
PL	TSO conducted workshop on the planned changes in the Transmission Network Code (TNC) resulting from BAL NC implementation. The implementation date was mentioned there: http://en.gaz-system.pl/centrum-prasowe/aktualnosci/informacja/artykul/201835/ Additionally, a link to the presentation from above-mentioned workshop (available only in Polish version): http://www.gaz-system.pl/fileadmin/centrum_prasowe/PREZENTACJA_3_Przekazywanie_danych_w_trakcie_trw ania_doby_gazowej.pdf TSO consults also the changes in TNC resulting from implementation of BAL NC. Link to the consultation documents: http://en.gaz-system.pl/strefa-klienta/iriesp/konsultacje-projektu-iriesp/
PT	ERSE and CNMC had carry out a joint consultation about the models for integration of the Spanish and Portuguese gas markets in a common Iberian Natural Gas Market. In this document, also available at ACER website, was asked to all the participants when and how the Balancing Network Code should be implemented to contribute to the goal of the Iberian market. As a result of public consultation the majority of the respondents considered that the full implementation of Balancing Network Code should be made soon as possible (2015) or by 2016. All the documents are available at http://www.erse.pt/pt/consultaspublicas/historico/Paginas/47_C.aspx
RO	The public consultation on the Report on interim measures was conducted between 31.07.15-17.08.15 and the link to the document is the following:





matters that emerge from the EU Codes being developed as part of the EU Third Package. The meeting encompasses the NRA, GB TSO, network users and other relevant stakeholders. Further individual workgroups are also setup for each of the modifications created, to provide a robust and transparent process to develop the changes required to the GB regime. For these specific regime changes, we formally consulted via the existing Code change process. Alongside this, individual IP Interconnection Agreements consultations are ongoing, each of which was launched with a specific industry information workshop. The sessions sought to explain the consultation process to stakeholders as well as the key changes for the IP, with opportunities for Questions and Answers. The GB TSO also held an EU Stakeholder workshop on 23rd January 2015 which sought to highlight the changes to the GB regime initiated by the implementation of the EU Balancing Codes (and also the Capacity Allocation Mechanism and the Interoperability and Data Exchange Codes). UK-NI TSO Consultation on Interim Measures Report published 10/11/14, approved by UR April 2015. http://www.mutual-energy.com/downloads/consultation/gas/gas6/interim-measures-report-forindustry-consultation.pdf This Report set out TSO Proposed Actions and Timelines for Interim Measures Approach and there will be ongoing annual reporting: 1) Introduce Trading Functionality and compliant Nominations Arrangements at IPs (Code Mod Effective October 2015) 2) Use Balancing Services for Residual Balancing (Ongoing, contract form to be amended for entry-exit regime as of October 2015) 3) Modify Balancing Tolerances & Charging for compliance with Interim Measures rules (Code Mod Effective October 2015) 4) First Report on interim Measures (UR Approval date April 2015) 5) Exit Review (including demand forecast information provision) (2016) 6) Assess/Analyse Market Development and Produce Annual Report

Table 2.7: Best practise identified in the implementation of the BAL NC

Country	Best practise identified in the implementation of the BAL NC	
BE	The introduction of the Entry/Exit Transmission Model (1 October 2012) and the BeLux Market Integration Model (1 October 2015) has been smooth and they allow the full compliance to the Balancing network Code. As the BeLux operators provide higher qualitative and quantitative information to their shippers than required in the NC BAL, it limits the residual balancing role of the balancing operator to the end of day operations. Additionally the balancing operator can directly relate the costs or revenues of a residual balancing action to the actual commodity market prices at the moment of such actions and can target those costs or revenues to the parties responsible for imbalances. We are open to share our experience on this with other TSOs/NRAs.	
ES	Regarding the Code implementation in Spain, two aspects can be considered as best practices: 1-Transparency in the implementation process. The implementation process included a public consultation on all the measures to be adopted (not only on those required by the Regulation) and meetings with agents (under agents' request). Moreover, along the making-decision process, the NRA presented the progress in several Fora in order to collect impressions and see which improved the model to be implemented. 2- Information to be provided to users The information provision model to be adopted in Spain is the base case. Additionally to the information which must be provided according to the Regulation, information on estimations and intraday metered flows at the transmission-distribution interconnection points will be provided, since user's balancing calculation in the Spanish gas system is based on this information. This data will be an extra tool, not considered in the Regulation, for users to help them keep their balance.	
LU	As from 1st October 2015, the BeLux Market Integration Model will allow alignment with the Balancing network Code (BAL NC) despite the derogation given to Luxembourg according to article 49(6) of directive 2009/73. As the BeLux operators (TSOs and the balancing operator) will provide a higher amount of qualitative and quantitative information to their shippers than required in the BAL NC, it will limit the residual balancing role of the balancing operator. Additionally the balancing operator will be able to directly relate the costs or revenues of a residual balancing action to the	





	actual commodity market prices at the moment of such actions and can target those costs or revenues to the parties responsible for imbalances. We are open to share our experience on this with other TSOs/NRAs.	
PL	The TSO and NRA consulted separately the selection of the model for information provision with network users, even it is not formally required according to Article 33(4) BAL NC. This gave the opportunity to take a broader view concerning selection of the model for information. Additionally, Polish TSO publishes all documents regarding implementation of BAL NC (report on interim measures, Transmission Network Code containing detailed provisions resulting from BAL NC mplementation). All documents are published in Polish and English language.	
UK-GB	In addition to the industry engagement described in response to question 1.6 we worked with IUK and BBL respectively to develop 'Concept Documents' which were subsequently consulted upon with customer and stakeholders. Whilst these documents were concerned with implementation of the EU Capacity Allocation Mechanism (CAM), this necessarily also described how TSOs intended to implement the Single Sided Nomination process which has interactions with the nomination process described in the EU Balancing Code (and indeed the matching process described in the EU Interoperability and Data Exchange Code). We consider that consultation and engagement with interested parties regarding proposed details of implementation represents best practice as this affords customer and stakeholders the opportunity to highlight any concerns in advance and thus achieve their 'buy in' to the new processes and procedures. IUK consultation: <a href="http://www.interconnector.com/media/92389/140408">http://www.interconnector.com/media/92389/140408</a> - concept document final.pdf BBL consultation: <a href="http://www.bblcompany.com/about-bbl/consultations">http://www.bblcompany.com/about-bbl/consultations</a>	

Table 2.8: Cross-border cooperation

Country	Cross-border cooperation	
AT	According to the BAL NC provisions we consult changes of the current system with the relevant stakeholders.	
BE	See annex 3. Firstly in the framework of the BeLux market integration project, intensive coordination efforts have been performed with Luxemburg TSO Creos and NRA ILR. Secondly regulated documents related to the BeLux market integration have been subject to consultation which creates openness towards adjacent TSO(s)/NRA(s).	
BG	Article 14 – Nomination procedure at interconnection points Article 15 – Re-nomination procedure at interconnection points Article 16 – Specific provisions at interconnection points Interim Measures	
DE	The German market area managers (MAM) and TSOs have conducted a consultation in January 2014 about the implementation of the NC BAL and have also asked adjacent TSOs and NRAs to participate. The results of the consultation are published on the websites of the MAMs. In April 2014 BNetzA has conducted a first consultation for adapting the balancing system as a result of the NC Balancing (GaBi Gas 2.0). The consultation document has been published on the website of BNetzA in German and English and also sent to the Gas Working Group (GWG). BNetzA received comments from adjacent TSOs/NRAs. Market participants were able to submit comments on the contents and on the intended proceedings. Following evaluation of the results of the first consultation round and of the discussion meeting, the Ruling Chamber drafted the intended operative provisions. This draft operative part was published on BNetzA website on 11 August 2014 in German and on 19 August 2014 in English, and was presented for consultation until 14 September 2014 ("second consultation"). The national regulatory authorities of the adjacent Countries were informed about the start of the second consultation on 11 August 2014 via the GWG. All NC BAL provisions which were relevant in the national implementation via GaBi 2.0 were part of those consultations.	





DK	Not at the moment, but Energinet.dk will later on coordinate further adjustment/implementation with our adjacent TSOs in Sweden and Germany.
EE	nominations, trading platform
EL	DESFA is in close collaboration with BULGARTRANSGAS (Bulgarian TSO) in order to implement some of the provisions of BAL NC mainly related to nomination / re-nomination procedures, in the framework of an Interconnection Agreement at the IP Kulata/Sidirokastro. RAE and Bulgarian Energy & Water Regulatory Commission (EWRC) are also in collaboration. All the above are reflected in the South - South East Gas Regional Initiative (GRI SSE) Work Plan 2015-2018 where the TSOs and the NRAs from Greece and Bulgaria participate in two pilot projects concerning BAL NC and CAM NC.
ES	Under the umbrella of the South Gas Regional Initiative of ACER, NRAs and TSOs have periodically informed on the Code implementation improvements and common approaches have been taken on issues like, e. g., nomination/renomination schedules.
FR	Fluxys has implemented within-day obligation on its network. We confirmed this should not have any important detrimental effect on our system to our CREG colleagues' who were requiring our opinion on this provision.
	Following a strong cooperation effort between TIGF, GRTgaz and our CRE colleagues, the GRTgaz sud and TIGF market places have been merged as of 1st April 2015 into the TRS (Trading Region South), while the balancing zones TIGF and GRTgaz sud remain in force. Therefore the balancing rules of TIGF and GRTgaz relating to their respective balancing zones GRTgaz sud and TIGF refer to the unique reference price of TRS market place.
	In particular, CRE approves the methodology to calculate shipper contractual imbalance. The total imbalance of each shipper will be calculated across the entire trading region. The principle of an individual contractual imbalance distribution key for each shipper is being calculated in the following manner:
	<ul> <li>Pro rata to allocation on delivery points if the shipper had delivery capacity in the GRTgaz South or TIGF zones;</li> </ul>
	<ul> <li>Pro rata of allocation an entry and exit points if the shipper has bought capacities from one of the TSOs;</li> </ul>
	- By location the entire imbalance on the GRTgaz network if the shipper only conducts transactions on the PEG.
IE	This distribution key be modified later, after sufficient feedback is received.
IT IT	Art. 9.3 of the BAL NC TSO to trade in adjacent balancing zone
11	Since autumn 2014, Snam Rete Gas informed all cross-border interconnected TSOs regarding the nomination, renomination and matching procedures implementation in line with the provisions of BAL NC. Relating to this, Snam Rete Gas has launched the activities aimed at updating the interconnection agreements and operational procedures with the EU TSOs and with Swiss counterparties.
	With reference to cross-border interconnected TSOs at non-EU points - Gela and Mazara del Vallo - the interconnected infrastructure operators have given their availability to collaborate to the
	alignment of (re)nomination procedures to European practices, provided that upstream contractual and operational frameworks would be accordingly revised. In this case, these operators will inform Snam Rete Gas. • Finally, it has to be highlighted that further coordination is required with non-EU Swiss TSOs in order to full implement the BAL NC. To enhance transparency on the above mentioned processes and to prepare operators and users to the required changes, Snam Rete Gas under AEEGSI request has published a report on TSOs coordination at the following link:
	http://www.snamretegas.it/export/sites/snamretegas/repository/file/Codice_di_rete/02_Area_Proposte_Aggiornamento/2015.04.24_Proposta_35/Documenti_collegati.zip).





LT	The transmission system, operated by AB Amber Grid is currently interconnected just with the natural gas transmission system of the Republic of Latvia which is not covered yet by terms of The Balancing Network Code due to derogation indicated in Article 49 of Directive No 2009/73. However, we will share the practice and experience of implementation of Balancing NC with Latvian counterparties once the process of implementation will begin in Latvia.
LU	Firstly in the framework of the BeLux market integration project, intensive coordination efforts have been performed with the Belgian TSO Fluxys Belgium and the NRA CREG. Secondly, regulated documents related to the BeLux market integration have been subject to consultation which creates openness towards adjacent TSO(s)/NRA(s). All provisions of the BAL NC were discussed (chapter IX & X not applicable).
PL	Yes, the BAL NC provisions concerning the gas day, units and nomination schedule (for matching purpose) have been coordinated with adjacent TSOs. Adjacent NRAs were consulted about the content of the first interim measures report.
PT	Collaboration with adjacent TSO (Enagás) is in progress on the following provisions: (1) Common rules on Nominations at IP; (2) Harmonized timings for Information Provision to Network Users. Furthermore, other critical regulatory issues that affect the implementation of the BAL NC in Portugal require a strong coordination with the Spanish TSO and NRA, in particular: - The implementation of an Iberian Hub compatible with Bal. NC; - Rules for the Implicit allocation of short term capacity in the interconnections regarding an eventual adoption of a market coupling of both balancing zones, which are waiting for government decisions.
RO	The Romanian TSO (TRANSGAZ) is collaborating with the adjacent Hungarian TSO (FGSZ) in order to implement the nomination and renomination procedures at RO-HU IP.
SE	Yes, Swedegas and Energinet are collaborating and they are looking at the possibility to have a common balancing zone for the two countries.
UK-GB	Principally to implement new IP nominations regime as required by Articles 12 to 18 and the associated Nominations Matching Process as required by the Interoperability and Data Exchange Code Article 8.





Table 2.9: Share of TSO balancing through short-term standardised products versus balancing services contract (daily average)

Country	Share of TSO balancing through short-term standardised products versus balancing services contracts (daily average).		
AT	Only short-term standardised products at the gas exchange, if necessary.		
BE	100% of balancing is done through short-term standardised products by the TSO – it will also be the case for the balancing performed by the balancing operator of the BeLux integrated market starting Q1 – 2016		
DE	The current share of short-term standardised products versus flexibility service products of NetConnect Germany balancing volumes is 93,93% (for GASPOOL 94,33%) for the period of October 2014 until June 2015.		
DK	Our TSO, Energinet.dk, has not observed a reduction in the balancing service contracts. The reason is lack of incentive for shippers to balance. The current model will be adjusted by 1 October 2015 to give shippers more incentive to balance in accordance with the physical needs for balance.		
LU	100% of balancing will be done through short-term standardised products.		
NL	Balancing services not used: 100% STSPs		
PL	In 2014, TSO has undertaken balancing actions, both via trading platforms (POLPX, EEX) and through the use of balancing platform – the Balancing Services Market (BSM). 66,48% of gas for balancing purposes was bought on POLPX, 33,50% on EEX, 0,02% on balancing platform (BSM).		
UK-GB	100% short term standardised products. The GB TSO does not procure any Balancing Services and procured the following Short Term Standardised Products in the period April 2015 to March 2015: • Title Trades 2,265 trades for an absolute value of £83,701,563 • Physical Trades 0 trades for an absolute value of £0 • Locational Trades 0 trades for an absolute value of £0 This data is as published by the GB TSO at the following pursuant the terms of Special Condition 8A of its Licence to Operate: <a href="http://www2.nationalgrid.com/WorkArea/DownloadAsset.aspx?id=40783">http://www2.nationalgrid.com/WorkArea/DownloadAsset.aspx?id=40783</a>		

Table 2.10: Physical day to day linepack change (optional)

Country	Physical linepack day on day changes on the difference between daily physical inputs onto and daily physical offtakes out of the transmission system- at the start and at the end of the day measured or estimated by the TSO (average change over the day
DE	We are of the opinion that this proposed indicator is not the best one to assess whether this is the case. The reason for this is that linepack is not only influenced by the portfolio status of network users but to a very large extent by technical parameters that are fully independent from the activities of network users in a specific system. It should also be considered that a high linepack change might often be the result of minimizing balancing actions by the TSO.
FR	From 1st January 2015 to 24th July, the daily average of linepack change is 15 GWh.
NL	Linepack is due to within day obligations always within operational limits, and in the Dutch system with socialised quality conversion, OBAs, etc., etc. not the best indicator for performance monitoring of the balancing regime.





UK-GB	Detailed information on linepack changes and neutrality can be found on the TSOs Market Information Data Item Explorer webpage under "Reports" or "Balancing": <a href="http://www2.nationalgrid.com/uk/industry-information/gas-transmission-operational-data/data-item-explorer/">http://www2.nationalgrid.com/uk/industry-information/gas-transmission-operational-data/data-item-explorer/</a>
UK-NI	None of these benefits have as yet been quantified. As previously stated the Northern Ireland regime is already very similar to that envisaged by the Network Code. In addition we will have a period of Interim Measures before full implementation.

Table 2.11: Neutrality cash flow analysis (optional)

Country	Balancing cash flow analysis (neutrality) per month. It is composed of income from TSO gas sales minus cost of TSO balancing gas purchases plus income from shippers' payment for gas via imbalance cash out short position minus shippers' payment for gas via imbalance cash out long position.
BE	Neutrality charge as from 1/10/2015 will be 0€/MWh.
DE	A balancing cash flow analysis as described in the questionnaire cannot be carried out. The reason is that in Variant 2 the TSO/MAM also buys and sells balancing gas due to the reason of differences between allocation and real offtake of NDM customers. This is why in DE also reconciliation (which settles the difference between allocation and real offtake on end consumer level) is part of Neutrality.
	In the other variants (base case and Variant 1) the TSO only buys and sells balancing gas due to the imbalance in the network users balancing portfolios. This needs to be taken into account if a balancing cash flow analysis should be done.
	Therefore the sum of all costs related to balancing gas in DE cannot be equal to the sum of all shippers' payments. All revenue and expenditure items generated or incurred in connection with the settlement of energy imbalances, quantity reconciliation processes, system balancing activities and interest payments are booked to a balancing neutrality account. Each month, the account's balance at the end of the previous month is published. For NetConnect Germany: <a "balancing":="" <a="" href="http://www2.nationalgrid.com/uk/industry-information/gas-transmission-operational-data/data-item-explorer/" or="" reports"="">http://www2.nationalgrid.com/uk/industry-information/gas-transmission-operational-data/data-item-explorer/</a>





### Annex III: Operational Balancing (STSPs, Balancing services, VTP)

Table 3.1: Short Term Standardised Products offered\*

Type of product	Country where it is offered	Country where it is planned or under study
Title products	AT, BE, DE, DK, ES, FR, IT, LT, LU**, NL, PL, SI, SK, UK-GB	HR, RO
Locational products	DE***, ES, IT, PL****, UK-GB	FR, HR, RO, SK
Temporal products	NL,	FR, HR, RO, UK-GB,
Temporal locational products	-	-
All the above products	HU	EL

<sup>\*</sup> In CZ and IE the type of products that will be offered is still to be determined. In PT, it is still under discussion. No provisions have been implemented so far with regard to the use of STSP as a trading platform is not yet created. In SE there are no plans for short term standardised products in the near future.

- \*\*\*\* In PL, the following products are currently offered on the balancing platform:
- Gas delivery (by network user) at the Virtual Exit Point (WD)
- Gas off-take (by network user) at the Virtual Entry Point (WP)
- Gas delivery (by network user) at Physical Entry Point (LD)
- Gas off-take (by the network user) at Physical Exit Point (LP)
- Gas delivery reduction at a Physical Entry Point and off-take of the same quantity of gas from TSO at the Virtual Entry Point (LZ)

Table 3.2: Use of balancing services

Country	Balancing services
DE, EL, IE*, LT, PL, SE, SI, UK-NI,	Already possible to use balancing services
BG, CZ, ES, FR, IE, IT, PT**, SE, SK,	Use of balancing services foreseen/ under discussion
AT, BE, DK, HR, HU, LU, NL, PL, RO, UK-GB	No plan to use balancing services

<sup>\*</sup> IE is operating balancing services under interim measures.

<sup>\*\*</sup> In LU title products are offered as of 1 Oct. 2015 within the BeLux integrated market.

<sup>\*\*\*</sup> In DE, the exchange offers products which provide global und quality effects. Additionally, the exchange plans to introduce products which offer an effect in a specific zone in the coming months. Apart from this there are no plans of the exchange to introduce products which offer an effect at a specific point in a grid. Therefore, the MAMs need their balancing platforms to be able to buy these products if the need arises.

<sup>\*\*</sup> In PT non provisions have been implemented so far with regard to Balancing Services, but this is a possibility that is not discarded at this point, depending, among other conditions, on the liquidity of the Iberian gas market in the near future.





Table 3.3: Characteristics of balancing services

Country	Characteristic of balancing service offered
BG	Bulgartransgaz EAD envisages to announce non-discriminatory and transparent procedures for purchase of gas for balancing, in accordance with Art. 8 of the Regulation. In addition, at this stage of market development, the linepack (within the tolerance) for compensation is envisaged to be used, as well as use of the TSO gas in UGS Chiren. In addition, at this stage of market development, the linepack (within the tolerance) for compensation is envisaged to be used, as well as use of the TSO gas in UGS Chiren.
DE	NetConnect Germany and GASPOOL currently use Long Term Options and Flexibility Services. Long Term Options are used for cases where liquidity in the spot market is insufficient and/or where short term standardised products will not or are not likely to provide the response necessary to keep the transmission network within its operational limits. Flexibility Services: In view of the fact that balancing actions are taken in accordance with physical requirements and that there may be situations where standardized products do not meet the balancing requirements imposed by the given physical circumstances the MAMs contract non-standardized long-term products for use in such cases. NetConnect Germany and GASPOOL procure balancing services via transparent and non-discriminatory bilateral invitations to bid. Each invitation to bid will be published on the website of the MAMs. The required quantity will be calculated in advance and procured in a price optimal manner after the bidding period.
EL	The balancing services provided so far by the TSO, concern the injection of re-gasified LNG to the transmission system. In order to fulfil its relevant obligations, the TSO stores limited LNG quantity in the Revythoussa LNG terminal tanks. For the supply of these quantities, the TSO holds annually an international tender for the pre-selection of the suppliers that will be able to supply LNG for balancing purposes, during the forthcoming year. Based on the tender's results the TSO signs a framework agreement with the pre-selected suppliers. In case LNG quantities are needed the TSO issues a request for supply to the pre-selected suppliers, specifying the LNG quantity and the delivery date and assigns the supply to the supplier that submitted the lower bid.
ES	The CNMC's Circular establishes the principles and conditions for TSO to select and apply balancing services. Before its use, TSO must justify the need for a balancing service, which will be acquired via market mechanisms (public auction).
FR	GRTgaz and TIGF still need balancing service contracts with storage operators (respectively Storengy and TIGF storage).
IE	Balancing services will continue to be used under interim measures; balancing services will be procured in accordance with Art. 8.3
IT	Balancing services are planned to be supplied in a market-based manner consisting in bilateral contracts selected through transparent and non-discriminatory public procedures or via competitive tenders for balancing supply resources open to network users. An evaluation on the balancing services which might be used by the TSO is currently under evaluation. Please make also reference to answer 12.7 for further details.
PL	At this stage of work on the implementation of BAL NC to the national network code the polish TSO does not use balancing services describe in art. 8 and art. 48. BAL NC. For the operational balancing TSO will be use: short term products from the Trading platform and in cause of a low liquidity on this platform the short products from balancing platform what is describe in "Report on the Interim Measures Planned for the Implementation by GAZ-SYSTEM S.A." approved by URE.
PT	No provisions have been implemented so far with regard to Balancing Services, but this is a possibility that is not discarded at this point, depending, among other conditions, on the liquidity of the Iberian gas market in the near future.
RO	Presently the TSO has daily/monthly natural gas acquisition from current production based on yearly contract with domestic producer; part of the acquired volume is stored at the UGS during the summer





	period and can be used during the cold season; additionally the TSO intends to promote in the gas market the concept of buying/selling balancing gas at a marginal price; TSO balancing include locational or temporal actions to resolve specific system constraints to ensure that NTS stays within its acceptable physical operational limits.
SE	Swedegas will keep using the weekly trade (network users place bids) as a balancing service.
SI	TSO ensures the balancing services through yearly public procurement procedure.
UK-NI	As part of the Interim Measures the TSO will continue to use Balancing Services these will be secured and operated in accordance with Article 9 of the Network Code. Balancing services will only be used where STSP will not or are not likely to provide the response necessary to keep the transmission network within its operational limits and as stated previously, STSP on a trading platform will not be viable in the NI Regime due to lack of liquidity.

Table 3.4: Implementation of a trading platform and possible TSO's trading of STSP in adjacent balancing areas

Country	Trading platform currently in place	Name of trading platform	Date for introduction of trading platform	Trading of STSP in adjacent balancing area is planned
AT	Yes	CEGH (for Market Area East)	Already in place	Yes: NCG for Market areas Tyrol and Vorarlberg
ВЕ	Yes	ICE-Endex	Already in place	Yes: NCG, in the framework of specific product for BeLux
BG	No	N/A	Foreseen in 2019	No
CZ	Yes	OTE	Already in place	Yes
DE	Yes	PEGAS	Already in place	Yes: TTF
DK	Yes	Gaspoint Nordic	Already in place	No
EE*	No	N/A	Within 2015	Yes: Set up of common Baltic (Finnish) gas market under discussion.
EL	No	N/A	Expected by April 2019	No
ES	No	MIBGAS	Foreseen for January 2016	No





Country	Trading platform currently in place	Name of trading platform	Date for introduction of trading platform	Trading of STSP in adjacent balancing area is planned
FR	Yes	PEGAS (Spot) by Powernext	Already in place	No
HR	No	N/A	Expected by 1 Oct. 2016	No
HU	Yes	CEEGEX	Already in place	No
IE	No	N/A	Being developed	Yes: NBP (under discussion)
IT	Yes	GME Trading platform	Already in place	No
LT	Yes	GET Baltic	Already in place	No
LU*	Yes	ICE-Endex	Already in place	Yes: NCG, in the framework of specific product for BeLux
NL	Yes	ICE-ENDEX	Already in place	No
PL**	Yes	TGE POLPX Polish power exchange	Already in place	Yes: EEX
PT***	No	N/A	Expected by 1 Oct. 2016	No
RO****	No		Date unknown for full compliance BAL NC	Yes
SE	No	N/A	Foreseen latest in 2019	Yes: Gaspoint Nordic (under discussion)
SI	No	N/A	1 Oct. 2015	No
SK	No	N/A	Under consideration	Yes: CEGH (under discussion)





Country	Trading platform currently in place	Name of trading platform	Date for introduction of trading platform	Trading of STSP in adjacent balancing area is planned
UK-GB	Yes	WebICE (also known as Eurolight Gas Trading Platform (OCM))	Already in place	No
UK-NI	No	N/A	Not foreseen	No

<sup>\*</sup> Holds derogation. Estonia plans to use GET Baltic in adjacent balancing market in 2015.

Table 3.5: Coordination with adjacent balancing zones to determine relevant STSP for balancing purposes (Answers)

AT STSP in Austria are the short-term products (intra-day Austrian VTP is already used by one adjacent TSO for ba	
Austrian VTP is already used by one adjacent TSO for ba	
	day-ahead) of the gas exchange. The
DE III Connection between Cross Luxembeurg & Elipsis Bolgin	ancing purposes.
BE, LU Cooperation between Creos Luxembourg & Fluxys Belgium	m in the framework of the BeLux Market
Integration Project.	
BG The use of the STSP from the Greek market (if any exis	) is under consideration with Greek TSO
DESFA in the process of the ongoing joint efforts for the E	AL NC implementation.
CZ There is no cooperation with adjacent TSOs regarding the	relevant STSP determination.
DE Not applicable for the currently used short term product	ts. When establishing further short term
products cooperation with the adjacent TSO will be sough	
ES The cooperation with adjacent TSO is taken place under the	ne South Gas Regional Initiative umbrella.
In this Forum, NRAs and TSOs are presenting their prog	ess on the Code implementation in each
country and coordinating those aspects that are considered	d necessary.
HR Under discussion	
HU The relevant STSPs are determined by the BAL NC itse	f, there is little room for TSOs to deviate
from this. As the products are all attributed to a certain e	ntry-exit zone (VTP of the E/E zone or a
network point of that zone), coordination in this regard has	a limited impact.
IE Operating under interim measures. TSO currently consider	ring the STSPs to be offered.

<sup>\*\*</sup> TGE POLPX is only operational for the high-calorific gas balancing area at present.

<sup>\*\*\*</sup> In Portugal no trading platform has been established so far. Depending on the evolution on the creation of the Iberian gas market, the use of a common trading platform between Portugal and Spain is the most probable option.

<sup>\*\*\*\*</sup>The trading platforms in Romania does not comply with all the criteria in Article 10.1 in the BAL NC. Romania will use only a balancing platform for its balancing purposes.





IT	A coordination has been put in place in order to support the application of Title and Locational products in the respective markets, also through the definition of OBA.
LT	There is not STSP traded in adjacent balancing zone. STSP are available only on Natural Gas Exchange GET Baltic.
NL	At the time cooperation was not possible, because neighbouring TSOs were not in the implementation phase yet.
PL	There are separate trading platforms in the neighbouring balancing areas (in neighbouring countries). The determination of STSP (foreseen in BAL NC) in balancing areas of GAZ-SYSTEM is based on the current state of short-term gas market development. The consultation carried out within the framework of regional initiatives and cooperation with neighbouring TSOs was a good experience and helpful during the decision on the STSP. It is worth mentioning that, TSOs from Visegrad region (V4) carried out a detailed comparative analysis of market products used for balancing purposes in the first half of 2014.
PT	This particular discussion among adjacent TSOs has not yet started.
RO	Cooperation with TSOs with adjacent balancing zones for the purpose of determination of the relevant STSP for balancing purposes has not been yet started.
SE	Swedegas and Energinet are currently discussing this matter.
UK-GB	The products used in the GB are long established and were introduced some years ago and consequently there was no practical reason or need engage adjacent TSOs. Through regular and well established engagement processes, GB shippers have had many opportunities to discuss such cooperation with the TSO, but none saw any requirement for it.
UK-NI	Due to adoption of Interim Measures approach, these products have yet been developed.

Table 3.6: Coordination with adjacent balancing zones to determine relevant STSP for balancing purposes (Reasons)

Country	Reasons for trading STSP in adjacent balancing zones and whether NRA has approved it
AT	Not in the Market Area East. But the Austrian Distribution Area Manager procures balancing energy through STSP in the NetConnect Germany market area for the Austrian Market Areas of Tyrol and Vorarlberg.
BE	In the framework of the BeLux Integrated Market, a solution has been developed at IP Remich (border between Luxembourg and Germany) in order to ensure the balancing of the BeLux area by securing the entering gas flow in Remich in case the consumption in Luxembourg exceeds the maximum physical capacity between Belgium and Luxemburg and if the capacity product in Remich is not sufficient. In practice, gas quantities can be procured on the German NCG in the framework of this solution. The description of this model is set out in the relevant regulatory documents.
DE	Currently, the MAMs in Germany already have the possibility to procure balancing gas in the respective other market area of Germany. In addition, NetConnect Germany and GASPOOL already procure balancing gas at the Dutch Virtual Trading Point TTF. The MAMs consider the procurement of balancing gas quantities within adjacent balancing zones to be an appropriate balancing action, as it provides them with an opportunity to achieve a local and/or quality-specific effect while taking advantage of the high liquidity of products traded on the VTP. Moreover, it can help reduce the risk of oligopolistic prices within individual sub-markets, as liquid trading hubs are used instead to procure the gas required for balancing actions. Generally, the procurement in other balancing zones requires sufficient transport capacities so that the gas can be transported into the balancing zone where balancing gas is required. In order to avoid restrictions on the access to capacity for other market participants the MAMs aim to primarily book short-term or interruptible capacity at the cross-border and market area interconnection points concerned (if offered). The process was discussed with the German regulator. The regulator already approved the trade of STSP within an adjacent market in





	the actual determination proceedings for redesigning the basic model for the balancing regime (GaBi Gas 2.0).
EE*	We are aiming at a common Baltic (Finnish) gas market. No approval.
FR	GRTgaz Sud and TIGF market zones were merged in April 2015 in a single market zone (Trading
	Region South). However two balancing systems remain inside this market zone using the same STSP at the same hub.
HR	Under discussion.
IE	Has been approved. This is necessary due to the lack of liquidity at the IBP, in conjunction with the importance of NBP in setting IBP price.
LU*	In the framework of the BeLux Integrated Market, a solution has been developed at IP Remich (border between Luxemburg and Germany) in order to ensure the balancing of the BeLux area by securing the entering gas flow in Remich in case of capacity constraint between Belgium and Luxembourg and if the capacity product in Remich is not sufficient. In practice, the balancing operator of the BeLux area could, in such case, procure gas quantities on the German NCG. This principle has been submitted to CREG and ILR approval end June / early July via the determination of the neutrality account.
PL	TSO is planning to trade within an adjacent market for balancing purposes. There will be request for NRA's approval for trading within an adjacent market for balancing purposes after 1st October 2015. Trading within the neighbouring balancing areas will be an alternative solution to locational products at entry points from EU Countries (currently there are no locational products on trading platform offered).
RO	This issue is still under assessment.
SE	The NRA has not approved these procedures yet because this is not done in the current situation but will possibly occur in the future. Only early discussions yet between Swedegas and Energinet. Nothing decided yet. The STSP on Gaspoint Nordic in Denmark are well suited for balancing gas trading.
SK	It is planned to trade in an adjacent balancing zone due to the low level of liquidity in Slovak market. NRA has not yet approved this procedure.

<sup>\*</sup>Derogation

Table 3.7: Incentive mechanism for TSOs to optimise their balancing actions

Country	Incentive mechanism for TSOs to optimise their balancing actions
AT	Physical balancing of TSOs has to be done primarily by the usage of linepack. If necessary the
	Market Area Manager procures volumes at the VTP to the best achievable market Price according
	to his GTC.
BE/LU	When a Within Day or End of Day event occurs, the balancing operator will purchase/sell gas on trading platform on a market-based manner on the virtual trading point ZTP. The balancing operator transaction is a reaction on the behaviour of the market, based on transparent fully accessible hourly information and forecasting data for all market participants. The market will create the price of the gas at the moment the settlement occurs. All operator transactions are done anonymously on the virtual trading point ZTP using the trading services provided by the market operator (no OTC allowed). As such there is no need to install an incentive mechanism for the operator. See further comment daily imbalance charges.
ES	The NRA's Circular obliges the TSO to make a proposal on the incentive mechanism in a six-month period once the Circular enters into force. The Circular indicates the requirements this mechanism must comply with. The mechanism will be approved by the NRA and may suppose an increase or decrease of the TSO's annual regulated incomes.
FR	The incentive mechanism does not specifically target the balancing expenditures. However, GRTgaz and TIGF are incentivized to reduce their OPEX, in particular their fuel costs and the cost the





	balancing services they have to subscribe. If they manage to spend less than expected in the tariff trajectory, they will keep a portion of the saved money.
UK-GB	To ensure the GB TSO does not incur excessive costs for the industry, the NRA already incentivises the GB TSO to balance and trade efficiently through 'Residual Balancing' Incentives. The TSO is incentivised in two ways: (i) To minimise the price spread of its balancing actions (to restrict the impact of such actions on the market price); and (ii) To minimise the change in the linepack volumes between the start and end of the day. By seeking resolve any system imbalances on the relevant day the costs of such are targeted to those responsible for the imbalance. Further information is available at the following: <a href="http://www2.nationalgrid.com/uk/industry-information/gas-system-operator-incentives/residual-balancing/">http://www2.nationalgrid.com/uk/industry-information/gas-system-operator-incentives/residual-balancing/</a>

Table 3.8: NRA application of operational limits for TSO balancing actions

Country	NRA application of specific operational limits for balancing actions
BE	As a matter of fact if you want a real market based balancing system limiting the role of the TSO is very important and market participants need to know when and how TSO is going to intervene taking into account the general principle art 4 point 1 NC BAL. See further comment WDO.
DK	The TSO only trades when the system is in the yellow zone (see below) as opposed to the green zone which is the zone where the system is physically safe (see below). The amount the TSO can trade is limited to 500 MW (based on the physical conditions of the system, a commercial green zone is calculated The green zone functions as a tolerance level for the total commercial balance position. When the expected balance of the gas day is outside the tolerance levels, Energinet.dk must intervene in the commercial market. Before and during the gas day, Energinet.dk calculates the expected aggregated balance position of all shippers end-of-day, based on nominations and on a forecast of offtake in the Exit Zone for the total gas day. This position is called Expected System Commercial Balance or E(SCB).If E(SCB) moves outside of the green zone into the yellow reaction zones, this will be a signal to the market that Energinet.dk will intervene in the market. Energinet.dk will only react on E(SCB) if it is in the yellow zone at five specific times during the day).
ES	The NRA's Circular establishes explicitly that the TSO can only undertake balancing actions in order to maintain the transmission network within its operational limits and achieve an end of day linepack position in the network different from the one anticipated. The operational limits which determine when the TSO is allowed to undertake balancing actions must be objective, transparent and non-discriminatory, they must be defined in cooperation with all the agents acting in the Spanish gas market and included in the Spanish Network Code.
FR	The need to intervene on the market is triggered by forecast of linepack level at the end of the day. This linepack level is published on an hourly basis. In this way, the shippers are aware when their imbalance may become costly (for themselves and the system). They are incentivised to balance their portfolio on their own, which minimize TSOs' balancing actions.
LU	See further comments on within day obligations.
NL	Network users can, day ahead, see the operational limits, published by the TSO on the website and through a customer portal. These limits (green/orange/red zones) together with the system imbalance (reflected in the System Balance Signal) indicate if the TSO is about to commence a balancing action. This mechanism has proved to be effective and appreciated by network users since April 2011.
SK	The details are under analysis.





## **Annex IV: Balancing system**

Table 4.1: Answers submitted regarding trade notifications

Country	Answers submitted regarding trade notifications
AT	Already implemented. The systems process trade notifications immediately after receipt. Physical delivery has a lead time of 2 hours.
BE	Trade notifications are already implemented; trade notifications can be sent by shippers and are accepted until 30 minutes before the considered hour. We are not facing any issue with the trade notifications.
BG	The balancing regime is under development in the new Gas trading rules. The VTP will be essential part of the regime with the possibility for network users to register and use it for trading of gas volumes with the other network users. There is still no liquid balancing market in the country neither intra-day market.
CZ	Trade notifications have been implemented. This information is provided by OTE (market operator in the Czech Republic) in accordance with existing gas market rules. Trade notifications are effective immediately after submission by network users.
DE	Details of the matching process according to NC BAL from 1st October 2015:
	It is recommended to submit day-ahead nominations of title transfers by 14:00 hrs on D-1. However, day-ahead nominations and re-nominations of trades are accepted until 05:29 hrs. on D-1, i.e. as long as a minimum lead time of at least 30 minutes prior to the next full hour is met. Intraday nominations and re-nominations of trades are also accepted if they are submitted with a lead time of at least 30 minutes prior to the next full hour. Day-ahead and intraday nominations and re-nominations are matched within 10 minutes upon receipt of the nominations/re-nominations whereby the matching process for day-ahead nominations does not start before 14:00 hrs on D-1. In addition, the day-ahead and intraday matching process in the market area of NetConnect Germany may also be triggered manually at any time depending on operational requirements. The intraday GASPOOL nominations and re-nominations are matched automatically by the system at least at xx:01 and xx:31. In addition, intraday business matching may also be triggered manually at any time depending on operational requirements.
DK	Energinet.dk has implemented a notifications service, where Energinet.dk notifies the market by text messages, e-mail and online, when Energinet.dk has to trade. Moreover, after Energinet.dk has traded, the result of the trading activities is published online. Please see the link to the online service: <a href="http://online.energinet.dk/data/Pages/System-Commercial-Balance.aspx?gasday=06-10-201">http://online.energinet.dk/data/Pages/System-Commercial-Balance.aspx?gasday=06-10-201</a> In the Danish system, there is a virtual point, where shippers can transfer gas between two
	portfolios. It is called Gas Transfer Facility (GTF). The lead time is two hours.
EE	Network users submit trade notifications in virtual trading point. Measurement units are still cubic metres. Problems - measuring data availability. Notifications (network users) by 11.00 EET and confirmation (TSO) by 15.00 EET.
EL	No trade notifications are implemented yet. April 2019 is the expected time for the implementation of the mechanism. Based on DESFA's Interim Measures Report, approved by RAE (Decision 274/2015), a balancing platform will be in operation, initially in a pilot mode, where quantities of balancing gas, will be purchased by DESFA or/and Shippers, within 2016.





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ES	Approval of the NRA's Circular implementing the measures to adopt the Code took place on 22 July and was published in the Official Gazette on 4 August (Circular 2/2015,(Circular 2/2015,, of the CNMC, establishing balancing rules in the transmission network of the gas system)).). The Circular considers the application of trade notifications, as well as nomination and renomination and information provision to users, as of 1 November 2015.
	Lead-time is 30 minutes, except for notifications sent the day before the gas day, for which the time to be processed will be 2 hours.
FI	Derogation
FR	The balancing network Code will fully implemented in October.
HR	Trade notifications are possible on Virtual trading point on day-ahead and intra-day basis. Lead-time for intraday trade notification is 2 hours. Future adjustments are under discussion.
HU	Trade notifications are part of the Hungarian balancing system since 2010, minor changes are being conducted in the regulation.
	According to the renomination cycle, i.e. T+2 hours.
IE	Trade notifications otherwise known as IBP trades were already allowed in the Code of Operations.
ΙΤ	Currently, notifications related to market trades are registered by the independent market operator (GME) at the virtual trading point (PSV) according to two time window (11:30 am on gas day D-1 and 4 pm during the gas day D). The system is going to be gradually improved to make possible a continuous download of the trades in order to provide users with complete information for evaluating their balancing status. The related proposal is under approval by the NRA. According with the Network Code provisions the trades will be performed in KWh starting from 1st October 2015. Snam Rete Gas IT systems (PSV) allows the recording of trade notifications without delay once delivered. Users' imbalances are calculated on daily basis also taking into account trades at PSV.
	Once registered the trades become immediately effective on PSV system and are uploaded in the balancing equation every hour.
LT	Requirements are implemented in such a way that market participants who sell the gas are required to provide trade notifications which are concerned with market participants who are purchasing gas. The trade notifications should be provided by 13:00 h on the working day preceding the balancing period (s). Final trade notifications should be provided - within one working day after the balancing period (s).
LU	Within the BeLux integrated market, trade notifications will be implemented; trade notifications can be sent by shippers and are accepted until 30 minutes before the considered hour. Such practices already in place in Belgium show there is no issue with these trade notifications.
NL	Implementation is completed on 3rd June 2014. Trade notifications are implemented as nominations on the virtual point TTF.
	30 minutes lead time. Renominations with 30 minutes lead time.
PL	The trade notifications were implemented in 2013. The schedule for submitting, withdrawing and amending trade notifications is the same as for nominations. Lower notification quantity applied in case of mismatched quantities. The allocated quantities are equal to the quantities specified in the trade notifications.
PT	Trade notifications are already implemented for bilateral trading in the Virtual Trading Point (VTP). Arrangements for processing timings are needed for full compliance. Currently, the lead time for making trade notifications effective is 2 hours, in line with the lead time for renominations. In future it is expected to implement lead times from minimum 30 minutes up to 2 hours.
RO	According to the proposed amendments to the Romanian Network Code (currently under public consultation), for the gas year 2015-2016, in addition to the interim measures to be applied, Network





	users will be allowed to submit: - day ahead trade notifications at virtual trading point; - within day nominations at entry and exit points; - within day trade notifications at virtual trading point. The lead time is 30 minutes before they become effective.
SE	Trade notifications between network users are today possible if a notification to the TSO is made at least two hours in advance by both counterparties.
SI	The IT solution has been developed and now it's in the testing phase; the user-workshop is foreseen in September 2015.
SK	Trade notifications are already introduced in Slovak TSO system in form of Title transfer nominations.
	The lead time to submit trade notifications before they become effective will be two hours. The Slovak TSO system structure permits to extend the time for processing up to two hours.
UK-GB	The Trading System Operator notifies the GB TSO of the acceptance of a 'Market Offer' within five minutes of such acceptance. The resulting 'Contract Nomination Time' (the effective time of the notification of the trade to the GB TSO) is the start of the hour following the receipt (by the GB TSO) of the notification issued by the Trading System Operator. It is worth noting that the 'Originating User' may also specify a 'Market Transaction Lead Time' i.e. the period in time (expressed in whole hours) required by the Originating User after the notification of the trade before the Originating User will modify the gas flow rate. See UNC TPD Section D Operational Balancing and Trading Arrangements:  Annex D1 for further information. <a href="http://www.gasgovernance.co.uk/sites/default/files/TPD%20Section%20D%20-%20Operational%20Balancing%20and%20Trading%20Arrangements_9.pdf">http://www.gasgovernance.co.uk/sites/default/files/TPD%20Section%20D%20-%20Operational%20Balancing%20and%20Trading%20Arrangements_9.pdf</a>
UK-NI	The existing Northern Ireland network Code has been modified to make provision for trade notifications. These modifications will be effective from 1 October 2015. No significant difficulties were experienced. The time from which a Trade Nomination is to be may be either 1 hour or 2 hours from the next Hour Bar after the Trade Nomination was submitted; and where a Shipper does not specify such a time under section 2.13.7 the Trade Nomination shall be deemed to be effective 1 hour from the next Hour Bar after the Trade Nomination was submitted. A Trade Nomination may be submitted no earlier than 30 Days before the Gas Flow Day and no later than 02:00 on the Gas Flow Day.





### **Annex V: Nominations**

Table 5.1: Details on implementation of nomination provisions (present and planned)

Country	Description on ongoing implementation of Nominations provisions and any issues/barriers. Description of mitigating measures taken, if applicable.
AT	Already implemented.
BE	Shippers are entitled to submit to the TSO a nomination for gas day no later than the nomination deadline on gas day D-1. The nomination deadline shall be 13h UTC (winter) or 12h UTC (summer) on gas day D-1. The last nomination received before the nomination deadline by the TSO shall be taken into account. TSO shall send the confirmations before 15h UTC (winter) or 14h UTC (summer) (confirmation deadline). No pre-renomination cycle will be installed. The shipper shall be entitled to submit re-nominations within the renomination period which starts immediately after the confirmation deadline and end no earlier than 3 hours before the end of gas day D (cycle starts every hour). TSO sends confirmation within 2 hours from the start of each renomination cycle
BG	At the moment the network users submit their day ahead nominations D-1 and receive confirmed day ahead nominations D-1. Currently, intraday re-nominations are not allowed. Bulgartransgaz is in the process of concluding Interconnection Agreement (IA) for the IP Kulata (BG)/Sidirocastro (GR) with the adjacent TSO, DESFA, and for the IP Negru voda/Kardam with adjustment TSO, Transgaz and will jointly set the procedures for nominations/renominations.
CZ	Co-existence of hourly and daily nominations at interconnection points and amendment of interconnection agreements accordingly.
DE	The TSOs basically fulfill the nomination and matching schedules according to the articles 12-18 of the NC BAL. Renomination is possible until 3:00 (CET) at day. Differences in the time schedules can be easily adapted to the regulations of the NC. Leadtime for the effectiveness of a (Re) Nomination is already current hour plus two. TSOs have already implemented the single sided nomination process within Germany. An implementation of the process including foreign TSOs is foreseen on the 1st of November 2015 based on the public consulted ENTSOG "Business Requirements Specification for the Nomination and Matching Procedures In Gas Transmission Systems" (NOM BRS) document. The implementation will be different to the national single sided nomination process and might cause some ineffectiveness. Furthermore IT-Systems have to be adapted to the new process on TSO as well on shipper side. A higher grade of complexity will be reached in shared pipeline assets. Hence German TSOs need to implement and especially test of single sided nominations with foreign TSOs until coming into force.
DK	already in line with the nomination requirements
EE*	National law requires cubic meters to be used as measurement units. There are plans to start using energy units (kWh) from 2016. Nominations time schedules do not match the NC requirements and gas day start/end are different from NC requirements.
EL	Ongoing discussions between DESFA and Bulgartransgas for the establishment of nomination and renomination procedures for bundled and unbundled products at IP Sidirokastro/ Kulata under the South East Gas Regional Initiative Work Plan 2015-2018.
ES	The NRA's Circular includes the nomination provision described in the Regulation.
FR	It will be fully implemented in October 2015/
HR	Nomination provisions are already in line with BAL NC provisions.
HU	From 1 October 2015, full compliance with BAL NC is implemented. Until then, balanced nominations are required and no within-day renominations are allowed according to the existing national rules.
IE	Sections of the Code of Operations relating to Nominations are completed.





IT	The implementation of nominations and renominations cycles foreseen by the BAL NC is ongoing
	and will be available by 1st of October 2015 at all points of the system in order to be compliant
	with BAL NC provisions. For this purpose, new ICT systems needed to be developed to support
	the new business processes.
LT	Procedure for Nomination submission is fully implemented. Note: Transmission system operator
	of the Republic of Latvia is not covered by terms of The Balancing Network Code due to derogation
	indicated in Directive No 2009/73 and therefore does not apply procedure for Nomination.
LU*	Within the BeLux integrated market, shippers will be entitled to submit to the TSO a nomination
	for gas day no later than the nomination deadline on gas day D-1. The nomination deadline shall
	be 13h UTC (winter) or 12h UTC (summer) on gas day D-1. The last nomination received before
	the nomination deadline by the TSO shall be taken into account. TSO shall send the confirmations
	before 15h UTC (winter) or 14h UTC (summer) (confirmation deadline). No pre-renomination cycle
	will be installed. The shipper shall be entitled to submit re-nominations within the renomination
	period which starts immediately after the confirmation deadline and end no earlier than 3 hours
	before the end of gas day D (cycle starts every hour). TSO will send confirmation within 2 hours
	from the start of each renomination cycle.
NL	Nominations are compliant with the NC.
PL	The nomination and renomination provisions are fully implemented.
PT	Nomination provisions are already implemented at domestic level. As for the VIP there are still
	restrictions for renominations that are expected to be solved by 1 November 2015.
RO	For the gas year 2015 – 2016 the principles provided by Chapter IV of the BAL NC will be applied
	for nominations and renominations at all entry and exit points.
SE	The implementation of Nominations provisions is introduced on the Swedish Gas Market.
SI	Plan to implement the requirements of the BAL NC with 1 October 2015
SK	Nominations provisions are implemented without any barriers.
UK-GB	NRA approval of the changes to the TSO/Network User Transportation Contract (UNC Modification
	0493) was provided on 16th June 2015. We are currently consulting with GB stakeholders on the
	associated changes to the Interconnection Agreement – in this context to implement the matching
	process between National Grid and its Adjacent TSOs. We are on target to implement the new
	arrangements with effect from gas flow day 1st October 2015. One of our adjacent TSOs will not
	be implementing functionality to manage Single Sided Nominations until gas flow day 1st
	November 2015 on the basis that the compliance date for CAM – which mandates the requirement
	to offer a single nomination process – is not until 1st November 2015.
UK-NI	The necessary modifications (in relation to Nomination/Renomination content and procedures at
	IPs), to the Northern Ireland network Code have been made and will become effective from 1
	October 2015. It was not difficult to make the necessary amendments as the existing Code
	includes similar provisions.

<sup>\*</sup>Derogation

Table 5.2: Details on consultation on co-existence of hourly and daily nomination regimes

Country	If hourly and daily nomination regimes co-exist, have TSO(s) or NRA consulted stakeholders to identify whether harmonised nominations and re-nominations should be submitted at both side of the Interconnection Point (Article 16(1))?
AT	No. But TSOs and NRA are in regular contact in order to implement harmonised re-/nomination rules at both sides of the IP; a consultation in any case is not excluded for the future.
BE	Yes.





T
It is always possible to consult, even if it is not really an issue today as only one adjacent TSO
works with daily nominations and stakeholders all well informed about it.
Yes.
Stakeholders were consulted and, especially those who nominate Interconnection points, would prefer hourly nominations. On the contrary, those with end customers and storage capacities would
prefer daily nominations.
No.
From our point of view, there was no reason to do that.
Nomination and renomination are aspects on which TSOs under the South Gas Regional Initiative umbrella have collaborated, in order to make them coherent on both sides of the borders.
Yes.
It is always possible to consult, even if it is not really an issue today as only one adjacent TSO works with daily nominations.
No.
The nomination schemes have already coexisted for many years. No issues have been reported.
No.
There were no stakeholder consultations in this subject. At the border between PL and CZ there
are different nomination regimes.
No.
Hourly nominations only.
Yes.
The GB TSO is connected with two TSOs which operate an hourly regime and has agreed a
solution with IUK and BBL respectively to enable the matching of hourly and daily nominations and
thus each TSO is able to retain its existing nominations frequency requirements. The solution
essentially provides for the IUK and BBL (as matching TSOs) to disaggregate a daily nomination
into hourly values, matching taking place at an hourly level and the Confirmed Quantities subsequently being re-aggregated to a daily granularity for communication to GB Users.





## **Annex VI: Information provision**

Table 6.1: Planned implementation of Information provisions (Art 32 of BAL NC)

Country	Up-to-date information on the implementation of Information provision, in particular please list the information made available according to Article 32 (1), (2) and (3).
AT	Implemented and published on the platform of the Market Area Manager.
BE	The operator is already providing much more information to the network users than defined in the NC BAL Article 32 (1) All data is available either on the ENTSOG Transparency Platform or the Electronic Data Platforms https://gasdata.fluxys.com/ or https://gasdata.balancing. fluxys.com/ - Article 32 (2) All balancing actions are published on the Electronic Data Platform https://gasdata.balancing. fluxys.com/ - Article 32 (3) Network users are provided with following hourly information which is provided within 30 minutes after the hour: • individual and market position based on hourly allocations in the past and confirmations and forecast in the future for all hours of the gas day • individual and market hourly settlements (past: allocations – future: confirmations and forecast) • detailed hourly allocations per (Interconnection points, storage, terminals, trading point, power plants, industrial clients and public distribution) All data are published on the Electronic Data Platforms https://gasdata.fluxys.com/ or https://gasdata.balancing.fluxys.com/
BG	The information under art 32 (1) and point 3.4 (5) of Annex I to Regulation 715/2009 is published on the Bulgartransgaz internet site on a daily basis. The information provision to the network users under article 32 (2) and (3) is in stage of development.
CZ	Data according to Article 32 (1) are already published on the TSO website. Article 32 (3): Network user's inputs and off-takes will be provided to the network users.
DE	The information requested in Article 32 has been provided by the MAM for years: • The overall status of the transmission network (1) • the transmission system operator's balancing actions (2) • the network user's inputs and off-takes for the gas (3)
DK	IDMS/DMS information provisions were implemented by 1st October 2014. NDMS forecasting will be implemented by 1st October 2015.
EE	Article 32 (1) - not provided Article 32 (2) - not provided Article 32 (3) - not provided
EL	All the aforementioned requested data are published at DESFA's website.
ES	The NRA's Circular establishes that TSO must provide users with: - Periodical information on the network status and the parameters and technical values that determine the need for a TSO's balancing action Before invoicing, information on TSO balancing actions (including the action undertaken, the technical requirements that justify its use, the cost and the result of the action). Additionally, every six months, TSO will inform NRA on the balancing actions undertaken during the six months period, and annually TSO will publish a report on the balancing actions undertaken during the previous year Requirement on information about the network user's inputs and off-takes for the gas day were already established in the Spanish Network Code.
FR	This information provision is in place since April 2014: -network status (linepack) -TSOs balancing actions -network user's inputs and off-takes
HR	Currently, transmission system operator provides information to balancing group leader: - by 10:00 hrs data for previous gas day: confirmed (re)nomination, initial allocated gas quantity, title transfer on VTP, and initial imbalance position, - by 10:00, 13:00 and 18:00 hrs data for current gas day: initial allocated gas quantity for specific exits to distribution systems, - by 10th day for each gas day in previous month: confirmed (re)nomination, final allocated gas quantity, title transfer on VTP, and final initial imbalance position Also, transmission system operator publish information (via web platform SUKAP, https://www.sukap.plinacro.hr/) aggregate imbalance position of all users at the





	start of each balancing period and the forecast of the aggregated imbalance position of all users
	at the end of each gas day. Future adjustments are under discussion.
HU	To (1): the overall status is updated on a daily basis, with balancing market offers (i.e. the actual balancing needs of the TSO) visible to all market participants real-time, to (2): from the trade positions of the daily balancing market, where the TSO has always positions, the size and the direction of the balancing actions can be followed real-time to (3): the position of network users will be published twice a day according to BAL NC from 1 October 2015.
ır	
IE	The Transporter publishes aggregate daily imbalance charges and aggregate balancing action charges. The TSO currently publishes a Monthly Report which includes a daily breakdown of daily imbalance charges and the volume of balancing actions taken by the Transporter
IT	The information to be provided to network users according to Art. 32 (1) of the BAL NC and referred to the Annex I of the Regulation (EC) No 715/2009 are already published on TSO website at the following link. These data are currently published at 3pm and updated twice a day during the gas-day. Starting from October 1st 2015 this information is going to be updated and published on hourly basis. With relation to the Art. 32 (2) and the information related to the TSO balancing actions, the already mentioned Snam Rete Gas proposal for network Code update (link reference number 35) foresees the following publications: 1) On monthly basis, aggregated costs and revenues related to the balancing actions performed by the TSO two months ahead the one of publication (month M-2); 2) At the beginning of each gas year and with reference to the previous gas year, the information related to the costs, frequency of activation and amount of the balancing services available to the TSO. Such proposal is under evaluation by the NRA. With relation to the Art. 32 (3) and the data related to network user's input and off-takes, the proposal for network Code update (link reference number 35: http://www.snamretegas.it/it/servizi/Codice_di_rete/Aree/aggiornamento.html) foresees to adopt the "Base Case" model to provide information referred to the BAL NC Articles 32-34.
LT	Information according to Article 32 (1) and (2) is published in TSO website: www.ambergrid.lt. Information regarding allocation of gas volumes is published in Electronic Transmission Service Booking and Administration System which is developed for each transmission system user.
LU	The information flow put in place provides much more information to the network users than defined in the BAL NC. Regarding article 32(1), all data is available on the ENTSOG Transparency Platform. Regarding 32(2), all balancing actions will be published on the Electronic Data Platform https://gasdata.balansys.eu/. However, from 1st October 2015 until the final setup in in place, Fluxys Belgium will provide the required information to the market players active in Luxembourg (see BE for the platform link). Regarding article 32(3), network users will be provided with following hourly information which is provided within 30 minutes after the hour: individual and market position based on hourly allocations in the past and confirmations and forecast in the future for all hours of the gas day; individual and market hourly settlements (past: allocations – future: confirmations and forecast); detailed hourly allocations per interconnection points, storage, terminal, trading point, power plants, industrial clients and public distribution. All market data will be published on the Electronic Data Platform https://gasdata.balansys.eu. However, from 1st October 2015 until the final setup is in place, Fluxys Belgium will provide the required information to the market players active in Luxembourg (see BE for the links of the platforms).
NL	Updates of the information on individual shipper apportionments and on system imbalance are delivered every 5 minutes. Balancing actions volumes and prices are reported instantaneously on TSO website and customer portal.
PL	Article 32 (1) - The overall status of the transmission network in accordance with point 3.4(5) of Annex I to Regulation (EC) No 715/2009 is published at TSO's website. Article 32 (2) - the transmission system operator's balancing actions referred to in Chapter III - will be published starting from 1st October 2015. Article 32 (3) - the network user's inputs and off-takes for the gas day referred to in Articles 33 to 42. – Information will be provided starting from 1st October 2015.





PT	The choice of the Information model is under discussion.	
RO	Starting with gas year 2015-2016, in the absence of a proper balancing IT platform, information obligations shall be fulfilled partially. Following the next gas year 2016 – 2017 all information requirements shall be fulfilled.	
SE	From 1 Oct 2015 DSOs will send data within day at two occasions which will help the network users in the nomination/renomination process and thereby stabilize the system.	
SI	The information will be made available at least 2 times a day.	
SK	32 (1) - is published on the Eustream website (aggregate imbalance position of all network users) 32 (2) - will be published on the Eustream website 32 (3) - will be provided to network users as requested by BAL NC	
UK-GB	Overall status Published via GB NTS 'Prevailing view' on National Grid's website: <a href="http://marketinformation.natgrid.co.uk/gas/frmPrevalingView.aspx">http://marketinformation.natgrid.co.uk/gas/frmPrevalingView.aspx</a>	
	SO Balancing Actions Quarterly and annual reports are published on National Grid's website in line with the GB TSO's Licence to Operate: <a href="http://www.nationalgrid.com/uk/Gas/OperationalInfo/operationaldocuments/ProcurementSystem-ManagementServicesStatementsReports/">http://www.nationalgrid.com/uk/Gas/OperationalInfo/operationaldocuments/ProcurementSystem-ManagementServicesStatementsReports/</a>	
	User's inputs and offtakes The GB TSO makes available to each User for a period of six month after the relevant day Each Network User the User's inputs (UDQIs) for each System Entry Point, outputs (UDQOs) for System Exit Points (by Exit Zone in the case of LDZ Supply Points) and Daily Imbalance as per UNC TPD E1.6.1(b) <a href="http://www.gasgovernance.co.uk/sites/default/files/TPD%20Section%20E%20-%20Daily%20Quantities,%20Imbalances%20and%20Reconciliation_18.pdf">http://www.gasgovernance.co.uk/sites/default/files/TPD%20Section%20E%20-%20Daily%20Quantities,%20Imbalances%20and%20Reconciliation_18.pdf</a>	
UK-NI	The information provided to network users by the transmission system operator shall refer to: (1) the overall status of the transmission network in accordance with point 3.4(5) of Annex I to Regulation (EC) No 715/2009; PTL publish on website the amount of gas in the transmission system at the start of each gas day (linepack) and the forecast of the amount of gas in the transmission system at the end of each gas day (forecast linepack) and the forecast of the aggregated imbalance position of all users at the end of each gas day. (2) the transmission system operator's balancing actions referred to in Chapter III; Network user's monthly bills detail the balancing actions that were required (3) the network user's inputs and off-takes for the gas day referred to in Articles 33 to 42. Detailed in the Network User's monthly allocation report.	

**Table 6.2: Model for information provision** 

Country	Information provision model
CZ, DK, ES, IE, IT, LT, FR, PL, UK-GB, UK-NI	Base case
BE, BG, HU, LU, NL, SE, SI	Variant 1
DE, EE, PT	Variant 2
HR, RO	No final decision taken yet
AT*, EL, SK	Not applicable / no answer

<sup>\*</sup> Information provision in relation to non-daily metered off-takes on transmission system level is not applicable in Austria, as there are no non-daily metered offtakes in the transmission system. In case a non-daily metered offtake point is connected to the transmission system, Austria will apply the "base case" model.





Table 6.3: Overview on expected time period for providing the final allocation and the final daily imbalance quantity

Country	Planned implementation of time period for providing the final allocation and the final daily imbalance quantity	
AT	Allocation notifications (ALOCAT) for D-1 until 12am D.	
BE	30 minutes after the closure of the gas day	
BG	Operational information on allocation for its inputs and the final daily imbalance quantity will be given on Day D+1 for the Day D. Final allocation and final daily imbalance quantity will be provided to network users up to 5 days after the end of the Gas month.	
CZ	At latest on the ninth calendar day or on the sixth working day.	
DE	The MAM provides each network user the final allocation for inputs up to the 14th of the following month. In cases in which a clearing of the allocation is needed, the final cleared allocation is sent no later than 10 working days before the end of the second month after the month of delivery. The final daily imbalance quantity is provided within the balancing group settlement no later than the end of the second month following the month of delivery.	
DK	Gas day plus one day. Final allocation is updated after one month, four months and fifteen months.	
EE*	On the 3rd day after the accounting period (month) according to standard terms and conditions of balancing contract.	
EL	It is already implemented following the corresponding provisions of the Greek Gas Network Code.	
ES	A first allocation will be provided before 12:00 the day after the gas day. This allocation will be used for the calculation of imbalance quantities. The allocations, as well as the imbalance quantities, will be revised after three months, once the non-daily metered off-takes metering (household consumption) is available.	
FR	Initial allocations are provided during Gas Day D+1 (before 1 pm). Final allocation is updated before the 10 <sup>th</sup> business day of M+1.	
HR	Already applied, but necessary adjustments under discussion.	
HU	D+1 10:00	
IE	D+5	
IT	According to the relevant national rules (Annex A to 229/2012/R/gas resolution - TISG) the TSO makes available to Shippers the final gas transportation balance no later than the 28th day of the month following the one to which the balance refers (postponed to the next working day in case of weekends or public holidays).	
LT	TSO provides each network user with the final allocation for its inputs and the final daily imbalance quantity no later than the third working day after the end of the reporting period.	
LU	30 minutes after the closure of the gas day within the BeLux integrated market	
NL	The accountable near real time allocation, which is available 15 minutes past the Gas Day counts as End-of-Day position for the calculation of the volume to be absorbed in the Linepack Flexibility Service.	
PL	The final allocations are provided by the TSO until 26th day of the next month (M+1).	
PT	Under discussion. This will depend on the information model to be implemented.	
RO	According to the proposed amendments to the Romanian Network Code, initial allocations and initial daily imbalances are provided during Gas Day D+1. During the following 24 hours, Network Users have the possibility to trade imbalances between them, using the Gas Transfer Facility. Then the initial daily imbalance is adjusted with the traded imbalances, the result being the basis for the application of the imbalance charges. Final allocations and final daily imbalance quantity is provided by the TSO to each Network User during month M+1, the possible differences between initial and final daily imbalances being subject to a reconciliation process.	
SE	At latest at the 25th the month after.	





SI	The information will be provided at 14:00 and 20:00 and then after the closure of the day.
SK	not yet approved by NRA
UK-GB	The UNC TPD Section E1.8 prescribes: the "Entry Close-out Date" as 24:00 hours on the 15th Business Day of the calendar month following the month in which the Gas Flow Day occurs; and the "Exit Close-out Date" is the 5th Day after the Gas Flow Day. From these points no revision shall be made for any purposes of the Code (including the determination of Users' Daily Imbalances and Energy Balancing Charges): after the Entry Close-out Date, to any quantity determined pursuant to the Code as being an UDQI (User Daily Quantity Input); or after the Exit Close-out Date, to any quantity determined pursuant to the Code as being an UDQO (User Daily Quantity Offtaken).
UK-NI	D+5

Table 6.4: Issues/barriers regarding DSOs' ability to deliver information at the right time

Country	DSOs' ability to deliver information
NL	As in the first report, no issues/barriers.
SE	The DSOs will hopefully be able to deliver the information within time.
BE	No issues/barriers identified, all data/systems are in place to provide shippers with a maximum of highly qualitative hourly data
UK-NI	The DSOs already provide the required information to network users on similar timescales to those set out in the Network Code.
HR	Transient model for final allocation based on consumption data is in place, in which DSO's report to TSO data on allocation by 8th day in a next month for each gas day in previous month. Necessary adjustments under discussion and project of standard load profiles design will be in tendering procedure soon.
LU	No issues/barriers identified, all data/systems will be in place to provide shippers with a maximum of highly qualitative hourly data in the framework of the BeLux integrated market
AT	None of the above mentioned issues were identified in the first report in Austria.
ES	Again, it must be underlined that the Spanish Network Code was, previously to the balancing Code approval, quite demanding regarding information provision by DSOs, so this will not be a significant barrier for the Spanish Gas System.
SK	Not applicable
PL	pending
HU	The information model of the DSO data provision is under regulatory revision.
CZ	Not applicable
DK	Energinet.dk benchmarks DSO's ability to deliver information at the right time and quality. The benchmarking is published.
PT	This is a major issue that is currently being tackled among involved parties. A definite assessment including the consequences for the effectiveness of the balancing regime is though not possible to make at present, as many options still remain open (e.g. the choice on the information model). The DSOs are involved, committed and aware of the efforts that are required to comply with NC BAL
DE	The described issues/barriers are not to be expected, as the implementation of NC BAL is very similar to the already existing balancing system. So the implementation effort was not substantial. Furthermore, in order to avoid high barriers for the market participants the process of consultation has been launched early which gave sufficient time for preparation and implementation.
IT	Concerning the collection of data please refer to previous answer 10.7 The NRA is evaluating the possibility of introducing an incentive system also for the DSOs, but a proposal does not exist yet.
RO	The ability of the DSOs to deliver the information at the right time is still a problem.





# **Annex VII: Daily Imbalance Charge**

Table 7.1: Planned implementation of the daily imbalance charge

Country	Information on the ongoing implementation of Daily imbalance charge provisions, in particular: methodology for calculating Daily imbalance charges; explanation of how small adjustment is established when weighted average prices are used to determine the marginal buy/sell price; definition of default rule when the marginal price cannot be calculated.
AT	Daily imbalances are settled at the exchange of the VTP by the Market Area Manager in the name and on behalf of the respective balance group responsible ("BGR") party, if the BGR do not balance themselves after receiving an imbalance notification from the Market Area Manager. Thus, the imbalance charge is the market price at the exchange.
BE	Methodology Within the BeLux integrated market (1st Oct 2015) at the end of the gas day, the operator will settle all grid users to zero. Grid users can either be long or short, but are also "causer" or "helper" of the end-of-day market imbalance. A "causer" is a grid user whose end-of day position is in the same direction of the market imbalance. A "helper" is a grid user whose end-of day position is in the opposite direction of the market imbalance, so this grid user makes it easier for the operator to balance its system and reduces the quantity to purchase or to sell. A marginal sell price and a marginal buy price shall be calculated for each gas day pursuant to the following: (a) a marginal sell price is the lower of: (i) the lowest price of any sales of title products in which the transmission system operator is involved in respect of the gas day; or (ii) the weighted average price of gas in respect of that gas day, minus a small adjustment. (b) a marginal buy price is the higher of: (i) the highest price of any purchases of title products in which the transmission system operator is involved in respect of the gas day; or (ii) the weighted average price of gas in respect of that gas day, plus a small adjustment.
	Small Adjustment In case the grid user is a "helper" of the market imbalance, the small adjustment will be equal to 0%. In case the grid user is a "causer" of the market imbalance, the small adjustment will be equal to 3%. These percentages are set up based on the results on the consultation process and have been submitted to regulatory approval.  Default rule
	It will always be possible to calculate the marginal price as there is always at least a weighted average price. If for whatever reason no weighted average price is available, the previous available weighted average price will be taken into account.
BG	Interim measure for interim imbalance charge proposed Methodology is under development.
CZ	Methodology Daily imbalance charge will be determined according to article 22 NC BAL.  Small Adjustment Small adjustment will be a floating rate between 2 and 5 % depending on the situation in the network.





	Default rule
	The weighted average price will be used.
DE	Methodology
	The differential quantity between inputs and offtakes (imbalance gas) shall be multiplied by a negative or positive imbalance price. So the MAM shall determine and settle the imbalance gas using the following methodology: The daily imbalance quantity shall be established for each balancing group on the basis of the net balance between daily inputs and offtakes using the finally allocated quantities. Allocating multiple balancing groups to one master balancing group is permissible. The daily positive imbalance price is the higher of the following two prices: "the highest price of all balancing gas purchases by the MAM for the gas day in question" or "the weighted average price of gas in respect of that gas day, plus a small adjustment of two percent". The daily negative imbalance price is the lower of the following two prices: "the lowest price of all balancing gas sales by the MAM for the gas day in question" or "the weighted average price of gas in respect of that gas day, minus a small adjustment of two percent". In order to determine the highest and lowest price of all balancing gas purchases and sales, only those balancing transactions shall be used that are carried out on a global or quality-specific basis via the relevant trading platforms with delivery at the virtual trading point. In order to determine the weighted average price of gas, the weighted average price formed at the relevant trading platforms with delivery at the virtual trading point shall be used.
	Default rule
	If it is not possible to determine the imbalance prices, the respective imbalance price of the previous day shall be used.
DK	Please see full explanation of the DK imbalance charge system at: <a href="http://www.energinet.dk/EN/GAS/Produkter-og-handel/Balance-model-fra-oktober-2014/Sider/End-of-day-settlement-and-pricing.aspx">http://www.energinet.dk/EN/GAS/Produkter-og-handel/Balance-model-fra-oktober-2014/Sider/End-of-day-settlement-and-pricing.aspx</a> .
EE	Fixed price from open supplier to TSO (per monthly quantity) is taken as the marginal sell/buy price and an adjustment is applied (minus for selling and plus for buying).
EL	The Daily imbalance charges are related to the imbalance position of each network user (deliveries minus offtakes adjusted by a part of daily UFG). In case the network user's Daily imbalance lays within the respective tolerance limits (+-10% of the maximum entry or exit booked capacity) the relevant charge / credit is calculated as the product of the Daily imbalance multiplied by the Daily Balancing Gas price, which is calculated as the weighted average supply price of the LNG stored in the terminal's tanks, for balancing purposes. In case the limits area exceeded certain penalties are imposed.
ES	NRA's Circular reflects Regulation's provisions on daily imbalance charges calculation: daily imbalance quantity will be user's inputs minus its off-takes. The daily imbalance charge will be the daily imbalance quantity multiplied by the applicable price, defined according to art. 22 of the Regulation. Small adjustment has been initially set as 2.5% of the weighted average price. This figure will be reviewed and modified if necessary.  NRA's Circular states that, in a six months period since the Circular enters into force, the TSO will propose the methodology to define the imbalance tariffs according to art. 22 of Regulation. This mechanism, which must be approved by the NRA, would include the default rule.
FR	Methodology  The calculation of the imbalance price, corresponding to the extremum of the average price or the marginal price of the day in question, be changed as follows:





	• for gas days during the week, the average price would be equal to the weighted average (by volume) of the prices obtained during all the within-day spot product transactions of the day in question;
	• for weekend gas days or holidays, the average price would become the weighted average (by volume) of the prices obtained during all the within-day spot product transactions of the day in question. <a href="http://www.cre.fr/en/documents/deliberations/approval/balancing-rules-grtgaz-tigf">http://www.cre.fr/en/documents/deliberations/approval/balancing-rules-grtgaz-tigf</a>
	Small adjustment
	+/- 2.5% of the weighted average price.
HR	Current methodology is based on allocation of cost of cumulative daily activated positive/negative balancing energy in a month with respect to a share of cumulative negative/positive daily imbalance of a balancing group in cumulative positive/negative daily imbalance of all balancing groups. Future methodology adjustments are under discussion.
	Currently balancing energy price is based on weighted average price of all activated bids. For balancing energy bids price cap floor and ceiling prices are calculated for each month by formula determined in methodology. Future methodology adjustments are under discussion.
HU	Currently, the daily imbalance charge is calculated applying the volume weighted average price.
	From 1 October 2015 on, the BAL NC method will be applied, i.e. marginal prices and small adjustments will be taken into account as well.
	In case of deviation from nomination exceeds a 2% threshold a balancing fee is applied on the quantity above.
IE	<u>Methodology</u>
	The Daily Imbalance Charge for each Shipper for a Day shall be determined as: DIC = (FTQ * FTIP) + (STQ * STIP) Where: DIC= The Shipper's Daily Imbalance Charge for the Day FTQ = The Shipper's First Tier Imbalance Quantity for the Day as set out in the Code of Operations 1.6.1 (a) FTIP = The First Tier Imbalance Price for the Day STQ = The Shipper's Second Tier Imbalance Quantity for the Day as set out in the Code of Operations 1.6.1 (b) STIP = The Shipper's Second Tier Imbalance Price
	Small adjustment
	95% of SAP when long less transport costs, or the National Grid-published System Marginal Sell Price for the day less transport costs; 105% of SAP when short plus transport costs or NG-published System Marginal Buy price plus transport costs. This will be approved to proceed to legal drafting in the coming weeks.
LT	<u>Methodology</u>
	Methodology applied for calculating the Daily imbalance charges is identified in AB Amber Grid Rules for Natural Gas Transmission System Balancing. Daily imbalance charges shall be calculated multiplying daily imbalance quantity by marginal gas price. If gas market participants cause imbalance to the system, they shall either buy the balancing gas (if caused shortage of gas in the Transmission System) quantity at a marginal buying price or shall sell (if caused surplus of gas in the Transmission System) the balancing gas quantity at the marginal selling price. Market





	participants are also required to pay the imbalance charge, if imbalance quantities exceed the imbalance tolerance.
	Small adjustment
	The small adjustment is equal to 10 percent of: - a lower price among the lowest gas price at which the TSO purchased gas during balancing period and the weighted average price of gas traded on the Exchange over the balancing period, if network users caused surplus of gas in the Transmission System a higher price among the highest gas price at which the TSO purchased gas during balancing period and the weighted average price of gas traded on the Exchange over the balancing period, if network users caused shortage of gas in the Transmission System.
LU	<u>Methodology</u>
	Within the BeLux integrated market, at the end of the gas day, the operator will settle all grid users to zero. Grid users can either be long or short, but are also "causer" or "helper" of the end-of-day market imbalance. A "causer" is a grid user whose end-of day position is in the same direction of the market imbalance. A "helper" is a grid user whose end-of day position is in the opposite direction of the market imbalance, so this grid user makes it easier for the operator to balance its system and reduces the quantity to purchase or to sell. A marginal sell price and a marginal buy price shall be calculated for each gas day pursuant to art 22 of BAL NC.
	Small adjustment
	In case the grid user is a "helper", the small adjustment will be equal to 0%. In case the grid user is a "causer", the small adjustment will be equal to 3%. These percentages are based on the results of the consultation and have been submitted to regulatory approval by CREG and ILR.
	Default rule
	It will always be possible to calculate the marginal price as there is always at least a weighted average price. If for whatever reason no weighted average price is available, the latest available weighted average price will be taken into account.
NL	<u>Methodology</u>
	All daily imbalances at the end of the day are charged as part of a linepack flexibility service. For each kWh imbalance a shipper will pay 0.4% of the weighted average market price of the last 72 hours. Because the Linepack Flexibility Service absorbs the final daily imbalance quantity, there is by default no Daily imbalance charge, and thus no marginal price or small adjustment needed.
	https://www.acm.nl/nl/publicaties/publicatie/12879/Implementatie-Netcode-Balancing/
	Small adjustment
	Not applicable.
	Default rule
	Not applicable.
PL	Methodology
	Currently, there are 3 separate balancing areas in Poland: 1) High-methane gas balancing area
	Marginal pricing mechanism will be introduced in high-methane gas balancing area. In addition, in the gas year 2015/2016 will be used 5% tolerance as interim measure. Marginal sell price (MSPE) - price determined for the calculation of daily imbalance charges in the high-methane gas balancing





area is equal to the lower of the two following prices: - lowest price of any sales of title products, in which the TSO is involved in respect of the given gas day, - weighted average price of gas in respect of that gas day, reduced by small adjustment. Marginal buy price (MBPE) - price determined for the calculation of daily imbalance charges in the high-methane gas balancing area, equal to the higher of the two following prices: - the highest price of any purchases of title products, in which the TSO is involved in respect of the given gas day, - weighted average price of gas in respect of that gas day, plus small adjustment. The weighted average price will be calculated based on transactions on trading session of the Intraday Market. 2) Low-methane gas balancing area Interim imbalance charge will be applied in low methane gas balancing area. The mechanism used under the interim imbalance charge is analogous to that given in BAL NC (marginal prices), however, the prices to settle imbalance will be set out on the basis of other than those specified in the BAL NC factors. Marginal sell price (MSPLw) in low-methane gas balancing area will be equal to the lower of the two following prices: - lowest price recorded in transactions concluded on the balancing platform for Lw low-methane gas balancing area, - weighted average price in transactions concluded on the balancing platform in relation to gas day n, reduced by 10%. Marginal buy price (MBPLw) in lowmethane gas balancing area will be equal to the higher of the two following prices: - highest price recorded in transactions on the balancing platform for low-methane gas balancing area, - weighted average price in transactions on the balancing platform in relation to gas day n, plus 10%. 3) Transit Gas Pipeline System (TGPS) balancing area: Interim imbalance charge will be applied in TGPS balancing area. The mechanism used under the interim imbalance charge is analogous to that given in BAL NC (marginal prices), however, the prices to settle imbalance will be set out on the basis of other than those specified in the BAL NC factors. The price spread will be established based on market indices for Day Ahead Markets on POLPX (DAMPOLPX) and EEX (DAMEEX) and the costs of gas transport through particular connection points to/from TGPS, so as to avoid any speculation on the price difference between EEX and POLPX on one hand and the platform operated within the TGPS on the other. The pricing will be driven directly by the actions the TSO needs to take in order to deliver or offtake gas to/from the TGPS in case of a Shipper's imbalance.

#### Default rule

PT

RO

The TSO suggested using the prices from the previous gas day in case the marginal price cannot be calculated. The final solution will be approved by URE (after consultations of transmission network Code).

Under discussion. A proper and complete set of rules for the Balancing regime to take place in Portugal is necessary prior to the elaboration of Daily Imbalance charges methodology.

According to the Interim Measures Report, starting with gas year 2015-2016 the following methodology will be applied for the calculation of the Daily Imbalance Charges: A reference price shall be applied to the final daily imbalance quantity. The reference price shall be determined as follows: A. For the days when TSO will trade gas in order to physically balance the system, the reference price will be the price at which the transaction was concluded (buy or sell price); B. For the days when TSO do not need to trade in order to physically balance the system, the reference price will be: the marginal sell price shall be lowest price of transactions notified at Virtual Trading Point for the respective Gas Day. If there were no transactions performed on the Romanian trading platforms for the respective Gas Day; the marginal buy price shall be highest price of transactions notified at Virtual Trading Point for the respective Gas Day. If there were no transactions notified at Virtual Trading Point, then the marginal buy price will be the highest price of all transactions performed on the Romanian trading platforms for the respective Gas Day For both marginal sell and buy prices, the default rule that will be applied in case there are no transactions in the respective





	Gas Day is: the marginal sell/buy price will be the lowest/highest price of the last transactions
	notified at Virtual Trading Point.
SE	Sweden plan to use Article 49.2 for calculating daily imbalance charges.
SI	Methodology
	The methodology is defined in the Network Code.
	Default rule
	When the marginal price cannot be calculated than the price from the balancing service contract is used.
SK	Not yet approved by NRA.
UK-GB	<u>Methodology</u>
	The 'final day imbalance' is determined pursuant to the following terms of UNC TPD E5.1 The Daily Imbalance for each User shall be calculated in respect of each Day as the difference between: (a) the sum of: (i) the aggregate of the User's UDQIs; (ii) the aggregate of the Trade Nomination Quantities under any Acquiring Trade Nominations made by the User; and (b) the sum of: (i) the aggregate of the User's UDQOs; (ii) the aggregate of the Trade Nomination Quantities under any Disposing Trade Nominations made by the User. UDQI and UDQI are, respectively, the quantity of gas treated as delivered to, and off taken from, the system. Network Users are incentivised to maintain a balance each day between the quantities it inputs to the system for that day and the quantity it offtakes from the system for that day. The incentive works by the GB TSO selling gas (for Network Users with supply in excess of demand) at a value below the system average price (System Marginal Sell Price); and purchasing gas (for Network Users with demand in excess of supply) at premium above the system average price (System Marginal Buy Price). These prices are set as follows: System Marginal Buy Price is the greater of: (i) the System Average Price plus the Default System Marginal Price; and (ii) the price in pence/kWh which is equal to the highest Balancing Action Offer Price in relation to a Market Balancing Buy Action taken for that Day; System Marginal Price; and (ii) the price in pence/kWh which is equal to the lowest Balancing Action Offer Price in relation to a Market Balancing Sell Action taken for that Day; The System Average Price is equal to a 'weighted average price' for the relevant day. 'Balancing Actions' are those undertaken by the GB TSO to maintain operational balance within acceptable parameters. See below for explanation of the 'Default System Marginal Price'.
	A 'default' adjustment (the 'Default System Marginal Price') is required when the GB TSO does not undertake any Market Balancing Actions within a day and accordingly a default marginal price is applied. The GB TSO publishes a default system marginal price by no later than August each year which is applicable for the forthcoming gas year (October to September). The default adjustment for GB currently outturns at between 1-2% of the System Average Price and is calculated as follows: Default System Marginal Price = {Annual Compressor Fuel Cost (£) x 100} + Average Forecast NTS Capacity Total System Demand (TWh) x 10 Charges (pence/kWh)
UK-NI	No answer





# **Annex VIII: Neutrality**

Table 8.1: Time of publication of the methodology for the calculation of the neutrality charge

Country	Date of publication of the methodology for the calculation of the neutrality charge
AT	Not applicable on TSO level
BE	Before 30 September 2015
BG	By the end of 2016
CZ	By March/April 2016
DE	Expected by 1 October 2015
DK	1 October 2014
EL	The methodology is already in place
ES	The NRA's Circular establishes the methodology for the calculation of the neutrality charges for balancing. As stated before, the Circular was approved on 22 July and was published in the Official Gazette on 4 August (Circular 2/2015, of the CNMC, establishing balancing rules in the transmission network of the gas system).
FR	January 2015 <a href="http://www.cre.fr/en/documents/deliberations/approval/balancing-rules-grtgaz-tigf">http://www.cre.fr/en/documents/deliberations/approval/balancing-rules-grtgaz-tigf</a>
HR	Expected by 1 October 2016. Currently addressed in tariff methodology for determining tariff items for gas transport through category of additional revenues. Future adjustments are still under discussion
HU	Published since 2010
IE	April 2015  http://www.cer.ie/docs/001027/CER15086%20Interim%20Measures%20report%20regarding%2  0implementation%20of%20EU%20Gss%20Balancing%20Network%20code.pdf
IT	November 2011 http://www.autorita.energia.it/it/docs/11/155-11arg.htm
LT	Neutrality is reflected in Price Cap methodology
LU	September 2015 <a href="http://www.ilr.public.lu/gaz/decisions_reglements/regles_acces_equilibrage/regles_equilibrage/index.html">http://www.ilr.public.lu/gaz/decisions_reglements/regles_acces_equilibrage/regles_equilibrage/index.html</a>
NL	Because of the linepack service there is by default no balancing charge. Therefor neutrality is by definition. The income from the LFS is 100% returned to the network users through a decrease of the transport tariffs.
PL	Works and discussion between URE and GAZ-SYSTEM S.A. on the final shape of the methodology for the calculation of the neutrality charges for balancing are currently ongoing. TSO consulted the methodology for calculation of the neutrality charges. The consultation document and the outcome are published on the website: <a href="http://en.gaz-system.pl/en/customer-zone/market-consultations/completed-procedures/2015-n/bal-nc/">http://en.gaz-system.pl/en/customer-zone/market-consultations/completed-procedures/2015-n/bal-nc/</a> . TSO submitted to URE the report with the proposed methodology.
PT	Expected by the end of Q1 2016
RO	Under assessment with the Romanian NRA
SE	When the Code is fully implemented
SI	This methodology is included in the Network Codes which were already published.
SK	Before 1 October 2015
UK-GB	January 2015 <a href="http://www.gasgovernance.co.uk/sites/default/files/TPD%20Section%20F%20-">http://www.gasgovernance.co.uk/sites/default/files/TPD%20Section%20F%20-</a>
	%20System%20Clearing,%20Balancing%20Charges%20and%20Neutrality_17.pdf
UK-NI	Neutrality already forms part of the Northern Ireland balancing regime and is set out in the existing network Code.





Table 8.2: Updated information on neutrality charge mechanisms

Country	Updated information on neutrality charge mechanisms
AT	Not applicable on TSO level. According to Article 2 & 11 of the BAL NC, Austria implemented in the Market Area East a balancing incentive mark-up charged by the Market Area Manager, under supervision of the NRA. The daily balancing of balance groups is done by the MAM by procuring balancing energy in the name and on behalf of the balance responsible party — no costs or revenues for the MAM, the balance responsible party pays/receives a market price to/from the exchange. Neither the TSO nor the Market Area Manager generates any profits resulting from the balancing incentive mark-up. In the distribution system the distribution area manager is responsible for the updates.
BE	Within BeLux integrated market, tariff is calculated ex ante, it includes all balancing costs and revenues, applicable on allocations at domestic exit points.
DE	The MAM are obliged to set up two separate neutrality charge accounts for balancing: for SLP exit points and for RLM exit points. No other points in the neutrality charge system shall be considered. All costs and revenues from the balancing gas and imbalance gas system shall be allocated to the two neutrality charge accounts. – The costs and revenues from negative and positive imbalance gas and the revenues from the within day obligations shall be allocated to the RLM neutrality charge account. – The costs and revenues from the settlement of the SLP incentive mechanism and therefore from SLP reconciliation shall be allocated to the SLP neutrality charge account The costs and revenues from the procurement or sale of external balancing gas shall be divided between the RLM and SLP neutrality charge accounts according to causation with a defined mechanism. The market area managers shall determine the neutrality charges using a forecast of the balance of the neutrality charge accounts by the end of the next contribution period without including the neutrality charge for balancing for the next contribution period, taking into account a liquidity buffer.
DK	According to national legislation for TSOs, the TSO is under a strict cost plus regime and cannot build up equity but has to repay over-recovery from transmission service to Network users via the transmission tariffs in respect of individual entry/exit points and in a way that is transparent and non-discriminatory. The neutrality principle for balancing (which is already an element in the transmission services) will be integrated into the existing neutrality principle for the TSO.
EL	DESFA keeps a separate account (Balancing Account) which is debited/credited with the amounts related to the DESFA's acts of balancing. The Balancing Account must be balanced at the end of each year.
ES	Basically, a monthly analysis of the economic results of the TSO will be carried out. If the TSO has gained money, this money will be discounted from its regulated incomes and used to reduce TPA tariffs. If the TSO has lost money, the lost quantity will be reimbursed by users with daily imbalance quantities during the month, proportionally to their imbalance quantities.
FR	http://www.cre.fr/en/documents/deliberations/approval/balancing-rules-grtgaz-tigf "CRE is in favour of the TSOs' proposal to redistribute the balance of the neutrality account in proportion to the quantities delivered. This new method is in compliance with Article 30 of the Network Code, which provides that "the neutrality charge for balancing shall be proportionate to the extent the network user makes use of the relevant entry or exit points concerned or the transmission network"
HU	The cost of balancing actions of the TSO will be aggregated and redistributed among network users according to their aggregated absolute imbalance position.





IE	Base case information model used. 1 balancing portfolio per shipper.
IT	The current neutrality methodology is in line with the BAL NC.
LU	Within BeLux integrated market, tariffs are calculated ex ante. They include all balancing costs and revenues, applicable on allocations at domestic exit points.
NL	Not applicable.
PL	The TSO consulted the neutrality charge mechanism with network users <a href="http://en.gaz-system.pl/customer-zone/market-consultations/actual-consultations/">http://en.gaz-system.pl/customer-zone/market-consultations/actual-consultations/</a> . The final neutrality charge mechanism will be subject of NRA decision.
PT	Discussion not started yet. The application of model variant 2 is currently being evaluated and is considered to be a good option for the Portuguese Balancing area, yet many specific provisions are still being analysed by the TSO, the DSOs and NRA at this point. Besides, the choice of a specific model needs to be first consulted upon. The rules regarding the neutrality charges are still open issues that need to be discussed in the coming months.
RO	Under assessment with the Romanian NRA.
SK	The methodology for the calculation of the neutrality charges for balancing is not yet approved and published.
UK-GB	The neutrality mechanism has existed in GB for a number of years. For each balancing period, GB TSO calculates: a net neutrality amount, which equates to all balancing payments made by the TSO less all receipts due to the TSO as part of the system clearing process (this can be a positive or negative value); a neutrality unit price, which equates to the net neutrality amount divided by the sum of the total physical gas throughput (all system inputs and outputs) for all network users; a network user's proportion of the neutrality costs (or revenues) shall be calculated by multiplying the neutrality unit price by the network user's total physical gas throughput (system inputs and outputs) in the balancing period. The mechanism is defined in UNC TPD 1.1.2(d) and (e) and its operation is further detailed within UNC TPD F4. <a href="http://www.gasgovernance.co.uk/sites/default/files/TPD%20Section%20F%20-%20System%20Clearing,%20Balancing%20Charges%20and%20Neutrality_17.pdf">http://www.gasgovernance.co.uk/sites/default/files/TPD%20Section%20F%20-%20System%20Clearing,%20Balancing%20Charges%20and%20Neutrality_17.pdf</a>
UK-NI	Excess Revenues/Costs in the Disbursement Account will continue to be redistributed to/shared amongst Shippers on a monthly basis, such that the NI TSOs shall be financially neutral to the Disbursement Account. The basis for sharing disbursement payments/charges will be the Shipper's share of the overall system throughput.





## **Annex IX: Within Day Obligations**

Table 9.1: Consultation material of the Countries applying Within Day Obligations can be found as follows

Country	Link
AT	http://www.e-control.at/recht/bundesrecht/gas/entwuerfe-archiv
BE	http://www.fluxys.com/belgium/en/Services/Transmission/MarketConsultations/Consultation
BG	-
DE	http://www.bundesnetzagentur.de/cln_1421/DE/Service-Funktionen/Beschlusskammern/1BK-
	Geschaeftszeichen-Datenbank/BK7-GZ/2014/2014_001bis099/BK7-14-020_BKV/BK7-14-
	020 Einleitung%20Festlegungsverfahren BKV.html?nn=360898
LU	http://www.ilr.public.lu/gaz/consultations/conspub020215/index.html
NL	https://www.acm.nl/nl/publicaties/publicatie/12879/Implementatie-Netcode-Balancing/
PL	http://en.gaz-system.pl/strefa-klienta/iriesp/konsultacje-projektu-iriesp/

**Table 9.2: Description on Within Day Obligation** 

Country	Please elaborate on:
	1. Whether you consulted on their continuation or introduction and with what result the consultation ended, please provide the link to the public consultation document;
	2. A list of all the WDOs with an explanation on their functioning: type, charges,
	consequences faced by network users or end consumers if they don't comply with the obligation;
	3. What kind of information is provided towards the grid users to follow their balancing position and which means do they have to manage their exposure;
	4. The steps taken or planned to be taken according to the approval procedure set in
	article 26 (4, 6, 7);
	5. How the benefits of introducing WDO in terms of economic and efficient operation of
	the transmission network outweigh any potential negative impacts thereof, including on liquidity of trades at the virtual trading point (Art 26(2) (f)).
AT	1. The system has been consulted in 2012 – implemented in 2013. All changes in the last years
	have been consulted and been published. The documents related to the latest change of the
	WDO can be found under: http://gasconnect.at/en/Market-Area-Manager/Downloads and
	https://www.e-
	control.at/recht/bundesrecht/gas/verordnungen#p_p_id_56_INSTANCE_10314A20226
	2. The explanation of the functioning of the WDO on TS level (which is the balancing incentive mark-up for the differences between hourly in- and offtakes of the balance groups) is
	described in detail in the GTC of the MAM: http://gasconnect.at/en/Market-Area-
	Manager/Downloads
	3. The system users receive at least hourly information on the status of their balancing
	portfolios, starting with the initial nominations at 2pm for the next gas day. Imbalances are
	communicated immediately (IMBNOT response) and the market participants have the
	possibility to balance themselves within the respective lead time. All information is provided
	to the system users in accordance with formats approved by the NRA ("Sonstige
	Marktregeln" chapter 3). Balancing on TS level is a pure ex-ante balancing in Austria. No
	customers are connected to this grid level. Thus, the responsible entities should be able to
	nominate correctly, which is very important due to the technical necessities of a transit
	country.
	4. The system was developed by the TSO, consulted publically and approved by the NRA.





RE and III	5. The introduced WDO provides an incentive for system users to be hourly balanced. Imbalances are not prohibited of course but could cause economical and physical problems for the MAM and the TSOs, especially in the Austrian system with massive transit flows, where the domestic system could not cope with high resulting imbalances. We do not see or experience a negative impact on the liquidity at the VTP since the implementation of the model in 2013.
BE and LU	<ol> <li>WDO were consulted in February 2015 as part of the balancing rules. More details are available on the websites from Fluxys Belgium in Belgium and from ILR in Luxembourg.</li> <li>During the gas day, as long as the market balancing position (aggregate of all the grid users' positions) remains within the predefined upper and lower market threshold, there is no intervention by the balancing operator. In case the market balancing position goes beyond the upper (or lower) market threshold, the balancing operator will instantly settle proportionally in respect of the grid user(s) causing the market excess or market shortfall via their grid user balancing position. The balancing operator will initiate a sale (or purchase) transaction on the commodity market for the quantity of the market excess (or shortfall) and will settle in cash that quantity with the grid user(s) contributing to such imbalance in proportion of their individual contribution. This transaction, once concluded, will set the reference price used at that time for refunding or charging shippers who caused the market excess or shortfall hence reflecting the market value for that residual natural gas at that time.</li> <li>On an hourly basis, all shippers will receive information on the market balancing position and on their own balancing position together with forecasting data for the remaining hours of the day.</li> <li>Balancing rules have been approved in Luxembourg &amp; Belgium</li> <li>The use of WDO reduces the need for a significant physical buffer, whose cost would have to be borne by grid users. In addition, the balancing system applied within the BeLux integrated market ensures that there is no cross-subsidization between the different end user profiles. Indeed, without WDO, it would not be possible to charge the costs of within day imbalances to the grid user causing these imbalances. Without WDO, these end users would not be incentivized to stay within reasonable limits during the day and would generate costs that wo</li></ol>
BG	<ol> <li>WDOs are still not consulted. We plan to apply after elaboration, we are in a process of evaluation of benefits against negative impacts.</li> <li>No list of WDOs and explanation provided.</li> <li>No description on the information provided to network users.</li> </ol>
	<ul> <li>4. No description on steps taken or planned to be taken according to the approval procedure set in article 26 (4, 6, 7)</li> <li>5. No description on cost benefit analysis provided.</li> </ul>
EE	<ol> <li>Plan to apply WDO. No public consultation carried out.</li> <li>Plan to use balancing portfolio WDO, but no details available yet.</li> <li>No description on the information provided to network users.</li> <li>No description on steps taken or planned to be taken according to the approval procedure set in article 26 (4, 6, 7)</li> <li>No description on cost benefit analysis provided.</li> </ol>
DE	In Germany there has been already an hourly incentive system since 2008, which is also compliant with NC BAL. The MAM are obliged to introduce new within day obligations by 1 October 2016. Their introduction was part of the consultation process of the GaBi Gas 2.0 determination: <a href="http://www.bundesnetzagentur.de/cln_1421/DE/Service-">http://www.bundesnetzagentur.de/cln_1421/DE/Service-</a>





	Funktionen/Beschlusskammern/1BK-Geschaeftszeichen-Datenbank/BK7-
	GZ/2014/2014_001bis099/BK7-14-020_BKV/BK7-14-
	020_Einleitung%20Festlegungsverfahren_BKV.html?nn=360898. The result is laid down in
	a decision by BNetzA: http://www.bundesnetzagentur.de/DE/Service-
	Funktionen/Beschlusskammern/1BK-Geschaeftszeichen-Datenbank/BK7-
	GZ/2014/2014_001bis099/BK7-14-020_BKV/BK7-14-
	020_Beschluss_englisch.pdf?blob=publicationFile&v=3
	2. For every hour within the gas day the MAM shall net the inputs into the balancing group that
	are relevant for balancing within that hour against the offtakes from the balancing group that
	are relevant for balancing. The hourly net total shall be cumulated over the gas day. If
	cumulating the hourly net totals results in a surplus or short supply after taking into account
	any allowable tolerance, the balancing group manager is obliged to pay the market area
	manager a flexibility charge in euros per MWh. For a detailed description see GaBi Gas 2.0
	determination operative part 4 (link above).
	3. See GaBi Gas 2.0 determination chapter 4.3.4.3.3. (link above).
	4. WDOs were already present in the German regime since 2011. No issues have been
	reported.
	5. See GaBi Gas 2.0 determination chapter 4.3.4.3.7. (link above).
NL	1. There were ad hoc meetings (ca. 10) with representative organizations and shippers where
	the NRA was organizing party and/or present. TSO presented proposals, adjusted
	proposals, also on use of WDOs, and implementation guidelines for shippers. The final
	implementation was generally favoured to the majority of market participants. The result is
	laid down in a decision by the NRA
	(https://www.acm.nl/nl/publicaties/publicatie/12879/Implementatie-Netcode-Balancing/).
	2. Within day obligations are implemented according to the network Codes Article 25(1). The
	TSO will, if the system threatens to go outside the operational limits, buy or sell gas on the
	within day market to keep the system within operational limits. The costs the TSO incurs will
	be paid for by the shippers who have caused the imbalance. The requirements in Article
	25(10) (a). (e) are met.
	3. Network users can monitor their individual 5-minute estimated position and the status of the
	system imbalance near real time through a customer portal and through a B2B-coupling.
	Network users can manage their position by buying on the exchanges, contracting balancing
	services or use of own means (reducing or increasing physical flows).
	4. WDOs were already present in the Dutch regime since 2011. No issues have been reported.
	5. No description on cost benefit analysis provided. In the decision from the NRA the criteria
	as mentioned in Article 26(2), including the benefits of maintaining the WDO in terms of
	economic and efficient operation of the transmission network and potential negative impacts,
	have been taken into discount.
PL	WDOs were consulted as a part of the Transmission Network Code (TNC).
	2. The administrative process is ongoing and probably will be completed at the turn of October
	and November this year. URE has not adopted the final decision on the shape of the WDOs
	in Polish gas system yet.
	3. Information provision is going to be implemented according to base case from BAL NC.
	4. The recommendation document was submitted to NRA for approval.
	5. No description on cost benefit analysis provided. The only reason for WDO is the system
	integrity and safety balancing.





## Annex X: Linepack flexibility service

## Table 10.1: Linepack flexibility service

Country	Description on how the criteria established in Article 44(1) are met and information on the ongoing implementation of Linepack provisions and on any issues/barriers faced in the implementation experienced
ES	NRA's Circular states that the TSO may offer the linepack flexibility service according to a methodology which will be approved by the NRA. When offering the linepack flexibility service, the TSO must comply with art. 44 (1) of Regulation. In particular, it must be offered in a transparent way and revenues will be designed to cover the services costs.
FR	Such a service is offered since October 2015. In a nutshell, the service reduces the shippers' imbalance price when TSOs have no need to intervene (either through the market or through balancing services), which means when the linepack is sufficient to make the system work (it optimises the use of linepack when it is available but it does not increase the TSOs balancing costs).
HU	Discussion is still ongoing in this question.
NL	(a) LFS is delivered from the system linepack buffer. (b) There is no resulting revenue for the TSO and only marginal cost. (c) LFS is delivered as a system service. (d) System service, so there is no need for contract and the charge is intended as incentive for network users to e in balance at EOD. No intention to cover cost. (e) LFS has no known impact on cross-border trade
PT	The TSO consider the offer of a linepack flexibility service as a possible tool to be implemented, but the specific criteria have not been duly analysed.  No implementation process is in place by the time being.
SE	Yes, such service exists today where the current conditions might have to be reconsidered in light of the provisions in the BAL NC.
SI	The linepack flexibility will be offered three months after the NRA's approval and only if conditions in the system will enable offering the flexibility service.
SK	No barriers.





### **Annex XI: Interim measures**

Table 11.1: Consultation process regarding interim measures

Country	TSOs' consultation on interim measures (Yes/No).
	Link to consultation document.
BG	Yes. http://bulgartransgaz.bg/en/news/publichna_konsultaciya_na_proekt_na_doklad_za_prilagane_na_vremenni_merki_po_reglament_es_312_2014192-c15.html
DE	Yes.
	https://www.gaspool.de/index.php?id=585
EL	Yes.
	http://www.desfa.gr/default.asp?pid=654&rID=1547&la=1.
IE	Yes.
	http://www.cer.ie/document-detail/EU-Gas-Network-Codes/1027/7571
LT	No
PL	TSO consulted and submitted to NRA the report according to Article 46. On 10 June 2015, the President of URE issued a decision approving the "Report on the Interim Measures Planned for the Implementation by GAZ-SYSTEM S.A. in connection with the entry into force of Commission Regulation (EU) No 312/2014 of 26 March 2014 establishing a Network Code on Gas Balancing of Transmission Networks." The consultation document and the NRA's decision are published here:  http://en.gaz-system.pl/strefa-klienta/konsultacje-z-rynkiem/zakonczone-procedury/2015/bal-nc/http://bip.ure.gov.pl/download/3/5973/20150610SprawozdaniedotyczaceplanowanychdowprowadzeniaprzezGAZSYSTEMSA.pdf http://en.gaz-system.pl/press-centre/news/information-for-the-
	media/artykul/202099/
RO	Yes.  The Romanian TSO has submitted an Interim Measures Report according to art. 46 on October 2014. Further to the observations and recommendations of the Romanian NRA, the Romanian TSO has reviewed the Interim Measures Report. The revised report was resubmitted to the Romanian NRA on 31 July 2015. The link to the public consultation document is the following: http://www.anre.ro/ro/gaze-naturale/legislatie/documente-de-discutie/reguli-piata-de-gaze/raport-punere-in-aplicare-masuri-provizorii-conform-prevederilor-regulamentului-ue-nr-312-2014&page=1
SE	Yes.  No link exists but Swedegas or Energimarknadsinspektionen (Swedish Energy Markets Inspectorate) can handle you the documents if needed. You can find a link to the motivated decision at Ei's web page http://www.ei.se/sv/Publikationer/beslut/beslut-rapport-om-interimistiska-atgarder-for-den-kortfristiga-grossistmarknaden-for-gas/
SK	Yes. https://tis.eustream.sk/TIS/#/?nav=gi.pob http://www.urso.gov.sk/sites/default/files/Sprava-o-uplatneni-predbeznych-opatreni_20-04-2015.pdf





Table 11.1: Consultation process regarding interim measures – NRA's motivated decision

Country	NRA's motivated decision (Yes/No)
	Outcome and link to the consultation documents
BG	No
DE	Yes. BNetzA has applied the continued use of the physical balancing platforms. The MAMs have submitted the report according to Article 46. BNetzA has determined a staged entry into force also in respect of interim measures. On 14 July 2014 BNetzA has taken a preliminary decision concerning Article 46 of NC BAL. This was confirmed by BNetzA in GaBi Gas 2.0 by 19 December 2014. <a consultation="" downloads="" gas="" gas6="" href="http://www.bundesnetzagentur.de/DE/Service-Funktionen/Beschlusskammern/1BK-Geschaeftszeichen-Datenbank/BK7-GZ/2014/2014_001bis099/BK7-14-020_BKV/BK7-14-020_Einleitung%20GABi%20Gas%202.0_final_Gesamt_EN_BF.pdf?_blob=publicationFile&amp;v=5&lt;/td&gt;&lt;/tr&gt;&lt;tr&gt;&lt;td&gt;EL&lt;/td&gt;&lt;td&gt;Yes.  RAE following the procedure for NRAs decision making, approved DESFA's first Interim Measures Report (RAEs Decision no. 274/2015).&lt;/td&gt;&lt;/tr&gt;&lt;tr&gt;&lt;td&gt;IE&lt;/td&gt;&lt;td&gt;Yes.&lt;/td&gt;&lt;/tr&gt;&lt;tr&gt;&lt;td&gt;&lt;/td&gt;&lt;td&gt;http://www.cer.ie/document-detail/EU-Gas-Network-Codes/1027/7571&lt;/td&gt;&lt;/tr&gt;&lt;tr&gt;&lt;td&gt;PL&lt;/td&gt;&lt;td&gt;Yes.  http://en.gaz-system.pl/press-centre/news/information-for-the-media/artykul/202099/  Motivated decision of NRA:  http://bip.ure.gov.pl/download/3/5973/20150610SprawozdaniedotyczaceplanowanychdowprowadzeniaprzezGAZSYSTEMSA.pdf&lt;/td&gt;&lt;/tr&gt;&lt;tr&gt;&lt;td&gt;RO&lt;/td&gt;&lt;td&gt;No&lt;/td&gt;&lt;/tr&gt;&lt;tr&gt;&lt;td&gt;SE&lt;/td&gt;&lt;td&gt;Yes.  No link exists but Swedegas or Energimarknadsinspektionen (Swedish Energy Markets Inspectorate) can handle you the documents if needed. You can find a link to the motivated decision at Ei's web page http://www.ei.se/sv/Publikationer/beslut/beslut-rapport-om-interimistiska-atgarder-for-den-kortfristiga-grossistmarknaden-for-gas/&lt;/td&gt;&lt;/tr&gt;&lt;tr&gt;&lt;td&gt;SK&lt;/td&gt;&lt;td&gt;Yes. NRA approved the report on interim measures.&lt;/td&gt;&lt;/tr&gt;&lt;tr&gt;&lt;td&gt;UK-NI&lt;/td&gt;&lt;td&gt;Yes and the Utility Regulator has informed both the Agency and the Commission, 3 April 2015, of its decision to permit the adoption of Interim Measures by the TSO. &lt;a href=" http:="" interim-measures-report-for-industry-consultation.pdf"="" www.mutual-energy.com="">http://www.mutual-energy.com/downloads/consultation/gas/gas6/interim-measures-report-for-industry-consultation.pdf</a>

Table 11.2: Planned use of the balancing platform

Country	Reasoning for use of balancing platform
DE	NetConnect Germany and Gaspool each already use a balancing platform. The German regulator already allowed a further use for at least the next five years till 16.04.2019.
EL	Due to the insufficient liquidity of the Greek NG market and the absence (as of today) of a trading platform, the establishment and operation by the TSO of a balancing platform will assure a minimum number of trades between the TSO and the network users, setting the basis for the





	establishment and operation of a trading platform in a subsequent phase. According to DESFAs report, the balancing platform will be in pilot operation within 2016.
PL	Taking into consideration the fact that the liquidity of the Polish wholesale gas market is was insufficient in recent years and the short-term products currently available at POLPX do not fully respond to the needs of TSO (the lack of possibility to enter into transactions for locational products on the trading platform), TSO plans to use the balancing platform as an interim measure for all three balancing areas. TSO will annually assess the effects of the functioning of individual interim measures and the conditions for their application. The results of the assessment will be presented to the President of URE in accordance with the procedure set out in Article 46(3) of the Regulation. The President of URE will annually evaluate the justification for further use of all interim measures.
RO	The balancing platform is under development and should be operational starting with the gas year 2016-2017.
SK	Balancing platform will be implemented due to low liquidity level in the Slovak market. It is planned to use the balancing platform until 2019. The final timeline will be determined based on development of the liquidity in Slovakia.

Table 11.3: Planned use of interim daily imbalance charge mechanism

Country	Reasoning, basis for price derivation and expected timeline for the use of interim balance charge
BG	As there is no liquidity trading platform meeting the criteria of Art. 10 of the Regulation, it is impossible to determine the weighted average gas price traded on the platform for each gas day. As a result, there is no way to determine the marginal sale and purchase prices of the gas for balancing. In this regard, Bulgartransgaz EAD proposes to introduce the measure "Interim imbalance charge." Interim imbalance charge for the respective day is envisaged as an equivalent to the market price related to provision of balancing services plus or minus a slight adjustment. The equivalent to the market price shall be determined in accordance with the terms and conditions of Art. 22, §6 of the Regulation.
EL	As long as balancing services are used the applied price will be based on the relevant LNG supply price, until the operation of the balancing platform.
IE	Trading platform feasibility study is under way by the TSO
PL	Yes, but only in low-methane gas balancing area and TGPS balancing area (in case of no connection in one balancing area with High-methane gas balancing area). Currently, there are no short term wholesale gas markets in both balancing areas. It should be emphasized that it is planned to launch the Virtual Trading Points in both balancing areas. The aim of this is to provide a basis for development of liquid short term wholesale gas markets in low-methane gas balancing area and TGPS balancing area as soon as possible.
SK	There is no trading platform on Slovak market providing gas price index. NRA has not yet approved the methodology of the price derivation calculation. Expected timeline - until 2019, subject of yearly evaluation in line with the report on interim measures.





**Table 11.4: Planned use of tolerances** 

Country	Reasoning, design of the tolerance level and expected timeline for the use of tolerances
BG	Bulgartransgaz EAD proposes to set tolerances on a daily basis for each month, for which the Transport contract of the respective user is in effect as +/- 5% of the nominated monthly quantities for transmission divided by the number of days in the month or as +/- 5% of the booked capacity for each day. It depends on the NRA's decision.
EE	Mainly because network users do not have access to sufficient information regarding their inputs and off-takes. Tolerance would probably be a percentage of the network user's portfolio volume. Tolerances would be used until daily remote metering is made mandatory for gas market.
EL	The imbalance position of each network user is calculated as deliveries minus offtakes adjusted by a part of the allocated to the network user daily UFG. The tolerance limits that amount to +-10% of the maximum entry or exit booked capacity. Tolerances will be gradually reduced during the next five years, until they are fully eliminated by April 2019 or sooner (if possible).
IE	Tolerances are being reduced for most customer categories; these will be implemented by October 1st. Sector/Size (Annual Quantity) Exit Tolerance % LDM>1,500,000,000 kWh (LDM1) 3.5 LDM>260,000,000 to 1,500,000,000 kWh (LDM2) 9 LDM>57,500,000 to 260,000,000 kWh (LDM3) 19 DM 30 of DM Exit Allocations NDM 2.5 of NDM Exit Allocations Inch Storage Exit Point 1.5 S/N IP 0 Sub-sea I/C >1,500,000,000 kWh (I/COff1) 3.5 Sub-sea I/C >260,000,000 to 1,500,000,000 kWh (I/COff 2) 9 Sub-sea I/C < 260,000,000 kWh (I/COff 3) 19
LT	Tolerance will be applied due to still low liquidity in wholesale gas market which we expect should increase in coming years due to regional market development and changing market environment.
PL	Only in high-methane gas balancing area. Taking into account the position expressed by some Shippers during public consultations and with a view to several reasons like:
	• limited access to gas sources that would meet short-term fluctuations of demand and supply, and
	• lack of the possibility to trade gas on short-term markets after receiving provisional information on imbalance status. TSO plans to implement a 5% imbalance limit in the gas year 2015/2016.
	The tolerance level will be updated as part of the annual report in the following years The change of the tolerance level will depend on the future development of the gas market in Poland, including the removal of the above mentioned barriers.
RO	The proposed level of tolerance is 2% and is designed considering the characteristics of the transmission system, which operates at relative low pressure.
SE	Network users do not have access to a short term wholesale gas market with sufficient liquidity. The network users have quite generous min- and max limits in which their balance account should be to avoid imbalance charges. The expected timeline is not decided yet.
UK-NI	Article 50 in the Interim Measures section of the Balancing Code requires that tolerances should only be used for as long as is necessary and depending on how the market develops it may be appropriate to phase out tolerances, and this is also something which the TSOs are required to keep under review. The use of Interim Measures and the provision of tolerances would be highly beneficial for NI Shippers in managing the transition from a small, relatively simple market to a new EU compliant gas transmission regime.





Table 11.5: Planned use of an alternative to the balancing platform

Country	Reasoning, overview of its functioning with the indication of the expected timeline for its use and link to the relevant documents published
BG	When a balancing platform does not result in increased liquidity of the short-term wholesale market and cannot enable the operator to carry out effective balancing actions, the Operator should use balancing services. According to item 7 of the Regulation's definitions, a balancing service is a service provided to a transmission system operator under a contract for gas required to meet the short-term fluctuations of gas demand and supply and which is not a short-term standardized product. Bulgartransgaz EAD is in the process of establishing a virtual trading point (VTP). All traders who sign a contract for participation in the VTP shall be published on the web site of the Operator, will be allowed to trade among themselves or with network users who have transmission capacity. The transactions between the users will be concluded bilaterally, without the participation of the TSO. The Operator will receive notifications (xml format) and record transfers in the daily imbalances of the two participants.
IE	Trading platform feasibility study is under way by the TSO
RO	Due to the fact that the balancing platform is not operational yet is proposed that the alternative to the balancing platform will consist in the use of: - Imbalanced nomination; - Gas Trading Facility; - Tolerances;
	As per reviewed Interim Measures Report.
SE	Swedegas will continue using the weekly trade.
UK-NI	PTL intend to initially use Balancing Services as an alternative to a balancing platform this is due to the lack of liquidity in the Northern Ireland gas wholesale market that currently exists. These balancing services will be procured and operated in accordance with the Network Code. Balancing services are currently used by the TSO so implementation will be immediate.
	Link: <a href="http://www.mutual-energy.com/downloads/consultation/gas/gas6/interim-measures-report-for-industry-consultation.pdf">http://www.mutual-energy.com/downloads/consultation/gas/gas6/interim-measures-report-for-industry-consultation.pdf</a>