

Operating Manual of Gasunie Deutschland Transport Services GmbH, Hanover

as of July 1, 2008

Introduction

This operating manual shall form part of the “General Terms and Conditions Transport for Grid Access to the Market Area H-Gas Northern Germany of Gasunie Deutschland Transport Services GmbH” or “General Terms and Conditions Transport for Grid Access to the Market Area L-Gas Northern Germany of Gasunie Deutschland Transport Services GmbH” as of 1. July 2008 or of the “General Terms and Conditions Transport for Grid Access to the Market Area H-Gas Northern Germany of BEB Transport GmbH” or “General Terms and Conditions Transport for Grid Access to the Market Area L-Gas Northern Germany of BEB Transport GmbH” as of 1. October 2007 (respectively hereinafter referred to as “GT&Cs Grid Access”) or as of 1. October 2006 (respectively hereinafter referred to as “GT&Cs Grid Access 2006”) or, as the case may be, shall form part of the “General Terms and Conditions of BEB Transport GmbH for Transmission of Gas in BEB’s Gas Transmission System” as of 1. February 2006 or 1. February 2005 (hereinafter referred to as “GT&Cs Old”).

If this operating manual forms part of the GT&Cs Old, as the case may be, any reference to balancing group manager in this operating manual shall be considered as reference to portfolio manager and any reference to balancing group shall be considered as reference to portfolio.

The purpose of this operating manual is to specify operational interfaces, interactions and processes between Gasunie Deutschland Transport Services GmbH (hereinafter referred to as “GUD”) and balancing group manager that shall be the contract partner of the balancing group contract in accordance with Section 13 of the GT&Cs Grid Access and that shall act as an agent and as an authorised receiving agent on behalf and on account of shipper in accordance with Section 18 of the GT&Cs Grid Access 2006 or Section 8 of the GT&Cs Old respectively. The balancing group manager shall perform as a reasonable and prudent operator with due regard to the integrity of GUD's facilities.

The definitions as set forth in the GT&Cs Grid Access or the GT&Cs Grid Access 2006 or the GT&Cs Old respectively shall apply. References to the singular include the plural and vice versa unless otherwise explicitly stated or result from the context.

No deviations from this operating manual shall apply unless such deviations are expressly agreed by GUD in writing.

I. General Provisions

1. GUD and balancing group manager shall act in a prudent and effective manner with respect to providing interfaces, interactions and processes determined under this operating manual for transmission of gas quantities and services related thereto within the balancing group, in particular by providing each other with information which may affect the gas specification or pressure specification of the gas at an entry point or exit point.
2. GUD and balancing group manager shall be reachable twenty-four (24) hours a gas day and every gas day of the gas year by communication systems which are agreed by GUD and balancing group manager. GUD and balancing group manager shall agree only on electronically communication systems which enable automatic data processing (e.g. by FTP, SMTP in edig@s- or XML-format (latter to be generated by GUD by the nomination

explorer)). Balancing group manager shall adhere to all instructions arising from GUD in the event of executing the emergency procedure plan, as GUD has in place.

3. GUD shall provide for each balancing group a balancing group code and as the case may be a GUD shipper code to the balancing group manager as defined in balancing group contract.
4. GUD and balancing group manager shall inform each other as soon as reasonable possible about any hindrances in providing interfaces, interactions and processes determined under this operating manual. In case balancing group manager is temporarily not able to use agreed communication systems, e.g. because of system malfunctions, balancing group manager may request GUD to temporarily exchange the established communication systems by other communication systems. GUD shall determine if such a request can be awarded and shall confirm such request if the requested communication is acceptable for GUD. As a reasonable and prudent operator, balancing group manager shall, as soon as possible, take appropriate action to restore its ability to use the initial agreed communication systems. As soon as the initial agreed communication systems are restored the balancing group manager shall send all not automatic processable messages which were sent by the alternative, temporarily established communications systems again as automatic processable messages by using the respective agreed communication systems without undue delay.
5. Activities undertaken by GUD, which in GUD's reasonable opinion may affect transmission of gas quantities and services related thereto under the balancing group contract shall only be undertaken after consultation with balancing group manager unless there is not sufficient time to do so. In such case, GUD shall inform balancing group manager without undue delay thereof.
6. All data shall be in kWh, unless described otherwise in this operating manual. All documents, notices or other information required under this operating manual shall be transferred by secure means agreed by GUD and balancing group manager.

II. Communication Test

1. Before concluding a balancing group contract, GUD is entitled to perform a communication test in accordance with Section 20 sentence 3 of the GT&C Grid Access or Section 18 paragraph 1 sentence 2 of the GT&Cs Grid Access 2006 or Section 8 paragraph 2 of the GT&Cs Old respectively. In such communication test, GUD checks if balancing group manager is able to handle messages, e.g. balancing group codes, sent by or to be sent to GUD in accordance with Section I. of this operating manual and meets GUD's communication requirements (e.g. twenty-four (24) hours reachability). A communication test requires at least one (1) business day and not longer than five (5) business days.
2. As long as the designated balancing group manager has not passed such communication test, such designated balancing group manager may not be appointed as balancing group manager for said balancing group. GUD has the right at any time during the contract term to perform the communication test again, if GUD has reasonable doubt regarding the ability of balancing group manager as set forth in paragraph 1. If balancing group manager does not pass such communication test, nominations from balancing group manager shall be deemed to be zero (0) for the gas days following the date at which balancing group manager has not passed such communication test.

III. Nomination Procedure

1. Balancing group manager shall inform GUD of the amount of the gas quantities for each entry point at which gas can be fed in the gas transmission system of GUD or the gas

transmission system of another market area spanning network operator of the Market Areas H- and L-Gas Northern Germany and for each exit point at which gas can be offtaken from the gas transmission system of GUD or the gas transmission system of another market area spanning network operator of the Market Areas H- and L-Gas Northern Germany and/or for each virtual entry point and each virtual exit point combined in the balancing group per gas day in kWh/h (nomination of hourly and daily quantities) and related to CET or CEST, whatever is applicable. Nomination shall not exceed 100 % of the entry capacity and/or exit capacity brought into a balancing group contract at the respective entry point and/or at the respective exit point. For the avoidance of doubt, any nomination that is sent by transmission customer itself shall be null and void. Nomination shall be carried out daily in whole kWh units; the daily nomination divided by twenty-four (24) shall result in a whole number. Balancing group manager shall nominate in the following way:

Daily nomination: Balancing group manager shall nominate by 14:00 at the latest on each calendar day of the week for the following gas day.

Balancing group manager is entitled to agree another nomination with GUD.

2. Balancing group manager is entitled to alter the nominated quantity ("renomination") with full two (2) hours' notice as often as wanted ("unlimited renomination right").
3. In the case of nominations and/or renominations sent by e-mail, balancing group manager automatically receives an acknowledgement of receipt from GUD's nomination mailbox. If this acknowledgement of receipt is not forthcoming, balancing group manager shall notify GUD in case of nomination by 14:15 at the same day at the latest or in case of renomination immediately that it has not received an acknowledgement of receipt. In such case, GUD and balancing group manager shall agree on the further procedure on a case by case basis.
4. If the nomination is not made at all or is late, the hourly gas quantities shall be deemed to be zero (0) for the following gas day.
5. The nomination shall take the form prescribed by GUD (see nomination layout in section IX.) and shall be made using the means of telecommunication prescribed by GUD.
6. Solely one e-mail or business message address of balancing group manager is permitted as the originator of the nomination.
7. To enable correct allocation of the gas quantities to be delivered or redelivered at the entry points and exit points, balancing group manager shall notify GUD on demand of GUD at least ten (10) business days before transmission service commences which shipper code of the adjacent network system ("upstream shipper code") shall be used to take the gas quantities at the entry point and which shipper code of the adjacent network system ("downstream shipper code") shall be used to redeliver these gas quantities at the exit point. The notification of shipper codes does not apply for transmission within one market area.
8. When nominating the gas quantities, shipper code pairs shall be shown in the order upstream shipper code-downstream shipper code for all entry points and exit points (see nomination layout in section IX.).
9. Regarding to the change from CET to CEST GUD reserves its right to apply special rules for the nomination of the gas day within the change from CET to CEST takes place. Currently twenty-three (23) consecutive hourly values shall be nominated for each entry point and each exit point by the balancing group manager.
10. Regarding the change from CEST to CET GUD reserves its right to apply special rules for the nomination of the gas day within the change from CEST to CET takes place.

Currently twenty-five (25) hourly values shall be nominated for each entry point and each exit point by the balancing group manager.

IV. Confirmation, Prematching, Matching and Operational Flow Order

1. GUD and balancing group manager shall use reasonable endeavour to ensure co-ordination of all dispatching and operational matters with the adjacent network operator.
2. Balancing group manager shall ensure that identical nominations for all entry points and all exit points of balancing group are made to GUD and to the adjacent network operator.
3. Where applicable, GUD shall apply the rules of the EASEE-gas CBP 2003-002-01 for the harmonisation of the nomination and matching process (see also file "nominating and matching process" published on GUD's website). Where the above mentioned EASEE-gas CBP is not applicable GUD shall to the extend agreed in grid connection agreements, operational balancing agreements or other applicable agreements confirm with adjacent network operator at the entry points and exit points the nomination or renomination received from balancing group manager ("matching"). After the nomination or renomination has been checked and if it does not match ("mismatch"), GUD will usually notify the balancing group manager of the mismatch or reject the nomination or renomination within a full two (2) hours period after receipt of the nomination or renomination. The nomination or renomination may be rejected if the nominated figures do not comply with the conditions as set out in contract or if the gas transmission system and/or adjacent network system are totally or partially unavailable.
4. If the nomination or renomination made under the same shipper code pair to GUD and the adjacent network operator - or to GUD in case of a nomination or renomination at a virtual entry point and/or virtual exit point - does not match and GUD has not rejected the nomination or renomination in accordance with paragraph 3 of this Section, the nomination or renomination for the lower amount of gas quantities shall generally be deemed to be agreed for the respective entry point or virtual entry point and for the respective exit point or virtual exit point. The procedures agreed between GUD and the adjacent network operator in grid connection agreements, operational balancing agreements or other applicable agreements shall apply for the respective entry point or exit point.

Deviating from sentence 1, if a nomination or renomination at a virtual entry point or virtual exit point does not match the nomination or renomination made under the same shipper code pair by the balancing group manager whose balancing group exclusively contains a virtual entry point and a virtual exit point then the nomination or renomination of such balancing group manager shall be deemed to be agreed at the virtual entry point or the virtual exit point provided that GUD and such balancing group manager have agreed in such procedure and GUD has published the respective agreement on its website. Gas quantities may only be transferred between another balancing group and such balancing group if the procedure set out in the previous sentence is confirmed in writing by the balancing group manager of the other balancing group to GUD prior the execution of such transfer.

5. Notwithstanding GUD's rights and obligations under the GT&Cs Grid Access or GT&Cs Grid Access 2006 or GT&Cs Old, GUD shall have the additional right to issue an operational flow order to the balancing group manager when in its reasonable judgment based on good pipeline and engineering practice, expected operating conditions may threaten the safety or operational integrity of the gas transmission system or render GUD unable to continue to meet its commitments under the contract due to:
 - a) Insufficient or excessive operating pressures in the gas transmission system;
or

- b) Events or circumstances which endanger the safety or integrity of the gas transmission system including the need to perform unplanned maintenance operations; or
 - c) An event of Force Majeure.
6. GUD will use reasonable endeavours to first apply operational flow orders to those balancing groups, if any, whose balancing group managers' acts or omissions have resulted in the need for operational flow orders. If those balancing groups are unknown or their balancing group managers have insufficient ability to remedy the need for operational flow orders, GUD will apply operational flow orders in an equitable manner to all balancing groups whose entry points and/or exit points are relevant to the need for the operational flow orders.
 7. GUD shall as soon as reasonable practicable prior to the time on which the operational flow order becomes effective, provide written notice of the operational flow order to the balancing group manager.
 8. Each operational flow order shall contain the following information:
 - a) Time and date of issuance; and
 - b) Time that operational flow order is effective; and
 - c) Duration of operational flow order (if none specified the operational flow order will remain in effect until further notice); and
 - d) A description of the entry points and/or exit points for which the operational flow order is in effect; and
 - e) The specific actions required of the balancing group manager at the entry points and/or exit points in order to comply with the operational flow order; and
 - f) The reason for issuing the operational flow order; and
 - g) Any other information relevant to the operational flow order.
 9. Balancing group manager shall take the actions requested by GUD in the operational flow order. If balancing group manager is not able to comply with operational flow order, balancing group manager shall immediately notify GUD by giving reasons thereof.
 10. Without limiting GUD's available remedies, if the balancing group manager fails to comply with an operational flow order, GUD shall alter the respective nominations as if balancing group manager has complied to operational flow order.
 11. Transmission customer and/or balancing group manager shall not be liable for any hourly capacity overrun charge or imbalance charges in respect of balancing group manager's compliance with an operational flow order or in respect of an alteration of nominations in accordance with paragraph 10 of this Section IV.
 12. Any liability of GUD regarding monetary damages resulting from the execution of an operational flow order or from an alteration of nominations in accordance with paragraph 10 of this Section IV is excluded.

V. Changes to Layout or Means of Communication

1. GUD may waive nomination and renomination deadlines at any time at its discretion.
2. Balancing group manager and GUD shall communicate to the extent necessary to allow GUD to change nomination procedure as set out in section III. of this operating manual in a timely fashion to ensure compatibility with those of adjacent network system.
3. GUD shall inform balancing group manager of any changes to the layout or means of communication with regard to nomination with at least one (1) month's prior notice.

VI. Online Flow Control Service

If online flow control service is contracted as set out in Section 22 paragraph 1 of the GT&Cs Grid Access or Section 20 paragraph 1 sentence 3 of the GT&Cs Grid Access 2006 or Section 13 of the GT&Cs Old, balancing group manager shall be released to nominate the source and any other entry point or exit point of the OFC balancing group, to the extent GUD receives the necessary online data for those points in accordance with section VII. of this operating manual.

VII. Online-Data Provision / Replacement Value

1. If online flow control service is contracted, balancing group manager shall provide to GUD reliable online metering data with respect to all entry points and exit points within the OFC balancing group which are not nominated by balancing group manager. Balancing group manager shall provide identical online metering data to the adjacent network operator for allocation and steering purposes if necessary, e.g. in order to provide to GUD and to the adjacent network operator online metering data of end consumer in the adjacent network system. Online metering data are not included in the matching procedures between GUD and adjacent network operator as described in section IV. of this operating manual
2. The integration and use of online metering data shall be in line with, if any, grid connection agreements, operational balancing agreements or other applicable agreements with the adjacent network operator for the relevant entry points and exit points.
3. Online metering data shall be transmitted at least every 3 minutes.
4. The connection type of online metering data to GUD's facilities shall correspond to technical standards, currently e.g. TASE2 connection and shall be established between GUD and balancing group manager. If TASE2 connection could not be established between GUD's facilities and transmission customer's facilities, GUD shall use reasonable endeavour to support balancing group manager in establishing another connection type suitable to GUD's technical requirements.
5. GUD shall on a reasonable endeavour basis agree with adjacent network operator on procedures to be applied if errors are detected during the transfer of the online metering data, e.g. which procedure shall apply for generation of replacement values.

VIII. Dispatching Addresses

1. GUD Dispatching

Address: Gasunie Deutschland Services GmbH
Dispatching Centre
Husumer Str. 37
49685 Schneiderkrug
Germany

24h Hotlines

Telephone: +49 (4447) 809-511 (Contract Dispatcher)
+49 (4447) 809-216 (Grid Dispatcher)
Fax: +49 (4447) 809-306 (Dispatching Centre)

2. Balancing group Manager

Balancing group manager shall timely provide GUD with its relevant addresses and inform GUD without undue delay of any changes thereof.

IX. Nomination Layout

Example of a NOMINATION LAYOUT

GUDNominationExplorer
v1.1 **gasunie**

customer:

customer-ID / DVGW-Code:

contract-number:

message-ID:

on behalf of:

on behalf of (ID):

type:

profiles:

grid operator / recipient:

operator ID:

eMail-adress to ...:

eMail-copy cc ...:

eMail-subject:

save + send via Outlook

save + copy to clipboard

timezone (period):

message date:

begin of period (date):

begin of period (time):

message number:

revision number:

nomination period from:

to:

next period

change message number

change revision number

day week month

GUD - Shippercode

BSAABBCC

nomination quantities

station

flowdirection

BEB-NetCode of location

foreign shippercode

unit

daily quantity

entry - exit diff	station entry	station exit					
	H000	H000	KWh	KWh	KWh		
	SC...	SC...					
0	0	0	0	0	0		
06:00 - 07:00	0	0	0	0	0		
07:00 - 08:00	0	0	0	0	0		
08:00 - 09:00	0	0	0	0	0		
09:00 - 10:00	0	0	0	0	0		
10:00 - 11:00	0	0	0	0	0		
11:00 - 12:00	0	0	0	0	0		
12:00 - 13:00	0	0	0	0	0		
13:00 - 14:00	0	0	0	0	0		
14:00 - 15:00	0	0	0	0	0		
15:00 - 16:00	0	0	0	0	0		
16:00 - 17:00	0	0	0	0	0		
17:00 - 18:00	0	0	0	0	0		
18:00 - 19:00	0	0	0	0	0		
19:00 - 20:00	0	0	0	0	0		
20:00 - 21:00	0	0	0	0	0		
21:00 - 22:00	0	0	0	0	0		
22:00 - 23:00	0	0	0	0	0		
23:00 - 00:00	0	0	0	0	0		
00:00 - 01:00	0	0	0	0	0		
01:00 - 02:00	0	0	0	0	0		
02:00 - 03:00	0	0	0	0	0		
03:00 - 04:00	0	0	0	0	0		
04:00 - 05:00	0	0	0	0	0		
05:00 - 06:00	0	0	0	0	0		

remark:

signature: