OPERATIONS MANUAL

APPENDIX B

to

STANDARD TERMS AND CONDITIONS

for

TRANSPORTATION

of

GAS

In the

OFFSHORE PIPELINES

to

the Danish West Coast

Date: 01 October 2023

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1 APPLICABILITY

This Appendix B does not regulate all operational issues, which can arise as a result of any Transportation Agreement and the Standard Terms and Conditions, but is exclusively intended for regulating operational issues, which may occur on a regular basis.

2 NOMINATIONS AND RENOMINATIONS

2.1 Format Requirements

The Shipper shall submit Nominations and Renominations in the Edigas message NOMINT encoded in an XML standardised format by using the AS4 protocol.

A submission of Nominations and Renominations shall contain the following information per Shipper Code Pair:

• 24 numerically positive integer values (or zero) covering each Hour in a Gas Day. However only 23 values on Gas Days with transition to summer time and 25 values on Gas Days with transition to winter time. In case of Renominations only information related to future Hours (with due consideration to the nomination lead time) is needed. The values represent kWh.

The Operator shall submit Approved Nominations in the Edigas message NOMRES. A submission of Approved Nominations shall contain similar information per Shipper Code Pair as valid for Nominations/Renominations.

2.2 Nominations

No later than 14:00 hours LET on each Gas Day, the Operator shall have received Nominations from the Shipper with information on the Quantities of Gas, expressed in kWh, that the Shipper requests to be redelivered at the Redelivery Point each Hour of the immediately following Gas Day. The Nominations shall be made per Shipper Code Pair.

If the submitted Nominations do not comply with the format requirements in Article 2.1, the Operator will use the Shipper's latest submitted Nominations that comply with the format requirements.

Before 16:00 hours LET on each Gas Day, the Operator will notify the Shipper of the Approved Nominations for the immediately following Gas Day.

The Approved Nominations may differ from the Nominations due to the check procedures described in Article 3.

2.3 Renominations

The Shipper has the right to revise all or part of its Approved Nominations with two full hours lead-time by submitting Renominations to the Operator, e.g. Renominations received by the Operator at 18:25 hours LET shall be valid from 21:00 hours LET on the same Gas Day.

The deadlines for the Operator to have received such Renominations shall be the last minute in any full Hour between 15:00 hours LET on the Gas Day prior to the Gas Day covered by the Renominations and until 03:00 hours LET on Gas Day covered by the Renominations.

If the Renominations do not comply with the format requirements in Article 2.1, the Operator will reject the Renominations.

The Operator will endeavour to submit the Approved Nominations to the Shipper within 50 minutes after lapse of the Hour in which the Operator has received the Renominations.

The Approved Nominations will at latest be submitted to the Shipper within 2 hours after lapse of the Hour in which the Operator has received the Renominations.

The Approved Nominations may differ from the Renominations due to the check procedures described in Articles 3.

2.4 Suspension of Shipper's Right to submit Renominations

In circumstances with malfunctioning of the Operator's IT-system or the IT-system of the operator of the Transmission System, malfunctioning of the IT-communication line between Operator and operator of Transmission System or circumstances beyond the Operator's control, the Operator may suspend the Shipper's right to submit Renominations.

Such suspension shall be notified by the Operator to the Shipper - cf. contact details in the Framework Agreement - and shall have immediate effect upon such notice.

The Operator may at any time cancel the suspension upon notice to the Shipper and such cancellation shall have immediate effect upon such notice.

2.5 Automatic Procedure

All handling of Nominations and Renominations are fully automatically handled by the Operator's IT-system. Therefore, the Operator cannot meet the Shipper's extraordinary request for changes in Nominations, Renominations or Approved Nominations hereof.

The Shipper is, on a best effort basis, obliged to check the Approved Nominations, and shall in due time try to correct all errors by submitting Renominations to GPMS.

3 REDUCTIONS OF NOMINATIONS AND RENOMINATIONS

3.1 Capacity Check

In the processing of Nominations and all Renominations received by the Operator, the Shipper's Nominations/Renominations added up for all Shipper Code Pairs are for every Hour compared with Shipper's pooled Booked Hourly Capacity.

If such comparison shows that the Shipper's Nominations/Renominations exceed its Booked Hourly Capacity in any Hour, the Nominations/Renominations for such Hour will be reduced on a proportional basis for all Shipper Code Pairs, i.e. Nominations/Renominations for each Shipper Code Pair will be reduced by the same percentage necessary for the Shipper to reduce its accumulated Nominations/Renominations for all Shipper Code Pairs to the Booked Hourly Capacity for the Hour in question.

3.2 Limitation of envisaged overdraft of the Gas Balance Account

In the beginning of every Hour (denoted h+1) the balance of the Shipper's Gas Balance Account is estimated by the end of the third Hour (denoted h+3) based on the assumption that:

- The Preliminary Hourly Delivery Allocation, cf. Article 4.1 for the previous Hour (denoted h) will continue to be delivered and subsequently allocated for the next three (3) Hours (denoted h+1, h+2 and h+3) and;
- The Preliminary Hourly Redelivery Allocation, cf. Article 4.1 for the next two (2) Hours h+1 and h+2 equals the Approved Nominations for the Hours in question and;
- The Shipper's latest Nomination for Hour h+3 will be approved as an Approved Nomination and subsequently allocated as Preliminary Hourly Redelivery Allocation for Hour h+3

If the estimated balance of the Gas Balance Account after lapse of Hour h+3 is negative and numerically larger than the Under-delivery Flexibility valid for Hour h+3, the Shipper's Nomination valid for Hour h+3 will be reduced by a portion required for the estimate to numerically exactly match the Gas Balance Account of exactly the Under-delivery Flexibility by the end of Hour h+3.

In case the Operator at its sole discretion assess that the deliveries at the Delivery Point(s) will be negligible for the next three (3) Hours h+1, h+2 and h+3, the Operator is entitled to set the estimated Preliminary Hourly Delivery Allocations for the Hours in question to zero (0).

The calculation of the reduction of the sum of the Nomination valid for the Hour h+3 (denoted *NomCut* h+3) follows the equation:

```
Est. Gas Balance Account_{h+3} = Gas \ Balance \ Account_h - AppNom_{h+1} - AppNom_{h+2} - NOM_{h+3} + \sum_{x=1}^{3} MAX(PHDA_h + BHC_{h+x} - BHC_h; 0) + HourlyCorrection_{h+1} + HourlyCorrection_{h+2} + HourlyCorrection_{h+3}
```

IF Est. Gas Balance Account_{h+3} < 0 THEN

$$NomCut_{h+3} = MIN[NOM; (-Est. Gas Balance Account_{h+3})]$$

ELSE

 $NomCut_{h+3} = 0$

END IF

Where:

Est. Gas Balance Account h+3 equals the estimated balance of the Gas Balance Account after the lapse of the Hour h+3

Gas Balance Account h is the calculated balance of the Gas Balance Account by the end of the Hour h.

AppNom $_{h+1}$ and AppNom $_{h+2}$ are the Approved Nomination for the Hours h+1 and h+2, respectively

PHDA h is the Preliminary Hourly Delivery Allocation for the Hour h

HourlyCorrection h+1, HourlyCorrection h+2 and HourlyCorrection h+3 are the Hourly Corrections for the Hours h+1, h+2 and h+3 respectively as further described in Article 4.2 second bullet.

BHC h+3 is an abbreviation for Booked Hourly Capacity for the Hour h+3

 NOM_{h+3} is the result of the capacity check in Article 3.1

MIN[x; y] means the minimum value of x and y

The Shipper's reduced nomination (denoted *RedNom* $_{h+3}$) is calculated by applying the following formulae:

 $RedNom_{h+3} = NOM_{h+3} - NomCut_{h+3}$

The *RedNom* h+3 will be subject to matching in accordance with Article 3.3

The calculation is made every hour, normally no later than 30 minutes after the lapse of the Hour denoted h and valid for the Hour denoted h+3

3.3 Matching

Subsequent to the Operators possible reduction of Shipper's Nominations or Renominations due to non-compliance with - or the Operator executing its rights in accordance with - any Transportation Agreement or the Standard Terms and Conditions including its Appendices, the Nominations or Renominations will be submitted to the operator of the Transmission System for matching against (comparison with) (re)nominations submitted by the Shipper's counterpart shipping Gas in the Transmission System.

The matching procedure is conducted by the operator of the Transmission System and follows the procedure applicable at any time according to the Danish Network Code.

The current procedure performs matching for every Shipper Code Pair and applies the following methodology:

The Shipper Code Pair identifies the Shipper in the Transportation System and the Shipper's counterpart in the Transmission system. A similar shipper code pair submitted by the Shipper's counterpart to the operator of the Transmission System identifies the Shipper in the Transportation System and the shipper in the Transmission System.

Upon match between the Shipper Code Pair and the shipper code pair in the Transmission System, matching of the Nominations/Renomination are performed for every Hour in accordance with the 'lesser rule' principle as recommended by EASEE-gas in its Common Business Practice CBP 2003-002/02.

Upon no match between the Shipper Code Pair and the shipper code pair in the Transmission System, the Shipper's Nominations/Renomination will be reduced to zero for every Hour.

In addition hereto matching will be based on the Shipper's and its counterpart's intention, which means that matching due to Renominations/renominations from either of the two, will be based on the other part's latest Nominations/nominations

or Renominations/renomination and not the other part's latest Approved Nominations/approved nominations.

E.g. if the Shipper's latest Nominations of 250 has been reduced to 200 in accordance with the 'lesser rule' principle as a result of lower nominations from its counterpart, matching as a result of a subsequent renomination from the counterpart of 250 will therefore be based on the Shipper's original Nominations of 250, giving Approved Nominations of 250.

3.4 Approved Nominations

The result of the matching procedure as described in Article 3.3 shall constitute the Approved Nominations.

3.5 Maintenance etc.

The Operator may reduce the Shipper's Booked Hourly Capacity fully or partially in the Maintenance Period and in periods with Reduced Capacity.

4 ALLOCATIONS

4.1 Hourly Sequence

By the end of each Hour (denoted h) the Operator shall before the end of the subsequent Hour (denoted h+1) inform the Shipper via e-mail (MARSIT 95G message) about:

- Preliminary Quantity ("Preliminary Hourly Delivery Allocation") of Gas allocated in total during the previous Hour h to the Shipper at the Delivery Point(s) by all the Shipper's suppliers of Gas based on information which has been send electronically to the Operator by the operator of the fiscal measurement facilities at the Delivery Point(s) used for measuring deliveries to the Shipper.
- Preliminary Quantity ("Preliminary Hourly Redelivery Allocation") of Gas allocated during the previous Hour h to every Shipper Code Pair at the Redelivery Point. The allocation procedure at the Redelivery Point follows the procedure applicable at any time according to the Danish Network Code. The current procedure for determining Preliminary Hourly Redelivery Allocation for every Hour and for every Shipper Code Pair is according to the following methodology:

The latest Approved Nominations will be allocated as Preliminary Hourly Redelivery Allocation.

The Operator has the right to estimate the Shipper's Preliminary Hourly Delivery Allocation in a situation where the information has not been received in due time by the Operator or the information is assessed as erroneous by the Operator.

By the end of each Hour h the Operator shall before the end of the subsequent Hour h+1 inform the Shipper via e-mail (MARSIT 94G message) about:

• Balance of the Shipper's Gas Balance Account, cf. Article 5.1.

4.2 Daily Sequence

The Operator shall before 12:00 hours LET on each Gas Day (denoted d+1) inform the Shipper via e-mail (MARSIT 14G message) about:

- The Shipper's Storage Gas volume at 06:00 hours LET by the end of Gas Day d
- The Shipper's Surplus Gas volume at 06:00 hours LET by the end of Gas Day d.
- The delivery correction which is the following difference:
 - o a revision of Gas allocated in total on the previous Gas Day to the Shipper at the Delivery Point(s) based on information which has been send electronically to the Operator by the operator of the fiscal measurement facilities at the Delivery Point(s) used for measuring deliveries to the Shipper (Preliminary Daily Delivery Allocation).

minus

 the sum of all Preliminary Hourly Delivery Allocations for the previous Gas Day.

which will be added (with sign, i.e. plus or minus) to the Gas Balance Account over 24 Hours during the Gas Day which time-wise coincides with the third Gas Day as 24 equal bits.

4.3 Manual corrections

The Operator shall as soon as possible inform the Shipper via e-mail about:

 Revised preliminary Quantity ("Preliminary Hourly Redelivery Allocation") of Gas allocated each Hour on a Gas Day d to every Shipper Code Pair at the Redelivery Point. The revision is the result of a comparison with subsequent adjustments (if relevant) of all the Gas Day's Preliminary Hourly Redelivery Allocations with similar data held by the operator of the Transmission System. The Shipper will be consulted if an adjustment is significant and any adjustment will be announced to the Shipper with i.a. information on which coming Hours in the Hourly Corrections to be affected by the adjustment.

4.4 Monthly Sequence

The Monthly Sequence consists of three elements, which may result in monthly adjustments of the Shipper's Gas Balance Account:

- Difference between the Final Delivery Allocation and the sum of all Gas Days' Preliminary Hourly Delivery Allocations
- Allocation of the Shipper's share of the Fuel & Flare quantities
- Allocation of the Shipper's share of the Tyra Energy Imbalance and/or the South Arne Energy Imbalance

4.4.1 Final Delivery and Redelivery Allocations

The Operator shall at latest on the 15th day in any calendar month inform the Shipper via e-mail (Final allocation report delivered as two Microsoft Excel spread sheets, cf. attachment 1, sheet a and sheet b) about:

Sheet a:

- Preliminary Hourly Delivery Allocations (accumulated per Gas Day) allocated on every Gas Day during previous Month, cf. Article 4.1 first bullet.
- The delivery corrections on every Gas Day during previous Month (denoted "difference" in sheet a) - i.e. the value denoted CORRECTION in Article 4.2 last bullet plus delivery corrections announced to the Shipper via email during the previous Month (if any) – which have already been corrected for in the Gas Balance Account
- Final Quantity ("Final Delivery Allocation") of Gas allocated in total on every Gas Day during previous Month at the Delivery Point(s) by all the Shipper's suppliers of Gas provided such information has been submitted to the Operator by the operator of the fiscal measurement facilities at the Delivery Point(s) used for measuring deliveries to the Shipper.
- The accumulated difference (one value positive or negative) which has not yet been corrected for in the Gas Balance Account due to the final allocation settings (Final Delivery Allocations). This accumulated difference is calculated as:
 - The sum of all Gas Days' Final Delivery Allocations (third bullet above)
 minus

The sum of all Gas Days' Preliminary Hourly Delivery Allocations (first bullet above)

minus

o The sum of all Gas Days' delivery corrections (second bullet above)

This accumulated difference will be added (with sign, i.e. plus or minus) to the Gas Balance Account on a specified future Gas Day, which is announced to the Shipper, cf. attachment 1, sheet a. The Gas Balance Account will in all Hours on the specified Gas Day be affected by equal bits.

Sheet b:

- Revised Preliminary Hourly Redelivery Allocations allocated to every Shipper Code Pair every Hour during the previous Month, cf. Article 4.2 first bullet.
- Any further corrections per Shipper Code Pair per Hour during the previous Month as a result of a final comparison of all previous Month's revised Preliminary Hourly Redelivery Allocations with similar data held by the operator of the Transmission System. The sum of the revised Preliminary Hourly Redelivery Allocations (first bullet) and any further corrections constitutes the final Quantity ("Final Redelivery Allocation") of Gas allocated for every Hour and for every Shipper Code Pair during the previous Month at the Redelivery Point.

The accumulation of all further corrections for all Shipper Code Pairs and all Hours during the previous Month will be added (with sign, i.e. plus or minus) to the Gas Balance Account on the same specified future Gas Day and in the same manner as described above (in last bullet under Sheet a).

4.4.2 Allocation of Fuel & Flare

The Operator shall in the subsequent calendar month (m+1) inform the Shipper via e-mail (report delivered as one Microsoft Excel spread sheet, cf. attachment 2) about:

• The Shipper's share of the Fuel & Flare quantity for Month m

This calculated share will be subtracted from the Gas Balance Account on a specified future Gas Day, which is announced to the Shipper. The Gas Balance Account will in all Hours on the specified Gas Day be affected by equal bits.

4.4.3 Allocation of Energy Imbalance

The Operator shall in the subsequent calendar month M+1 inform the Shipper via e-mail (report delivered as one Microsoft Excel spread sheet, cf. attachment 3) about:

 Allocation of the Shipper's share of the Tyra Energy Imbalance and/or the South Arne Energy Imbalance in Month M

This calculated share will be added (with sign, i.e. plus or minus) to the Gas Balance Account on a specified future Gas Day, which is announced to the Shipper. The Gas Balance Account will in all Hours on the specified Gas Day be affected by equal bits.

5 GAS BALANCE ACCOUNT ETC.

5.1 Balance of the Gas Balance Account

The balance of the Gas Balance Account is calculated after the lapse of every Hour (denoted h) as:

 The balance of the Gas Balance Account after the lapse of the previous Hour (denoted h-1)

plus

- Preliminary Hourly Delivery Allocation for the Hour h, cf. Article 4.1 first bullet minus
- Preliminary Hourly Redelivery Allocation (accumulated for all Shipper Code Pairs) for the Hour h, cf. Article 4.1 second bullet plus
- o the Hourly Corrections (negative or positive) for the Hour h, cf. Article 5.2.

5.2 Hourly Corrections

The Hourly Corrections valid for a Gas Day (denoted d) consist of a correction to the Gas Balance Account for every Hour of Gas Day d. Such corrections will be added (with sign, i.e. plus or minus) to the Gas Balance Account at the end of the Hour as described in Article 5.1. The Hourly Corrections will always include the sum of corrections described in Article 4.2 and denoted CORRECTION.

Furthermore the Hourly Corrections may include manually inserted corrections due to i.a. corrections described in Article 4.3 fourth bullet and described in Article 4.4.

6 MAINTENANCE

The Operator shall at least with 30 days' notice prior to the Maintenance Period notify the Shipper of the following:

- The number of Gas Days, where the aggregated transportation capacity in the Transportation System is expected to be affected by Planned Maintenance.
- The expected Reduced Capacity available to the Shipper during the Gas Days affected by Planned Maintenance.
- A two Month time window during which the Maintenance Period is expected to take place.

The Shipper shall within 10 days after receipt of such notice have submitted its duly substantiated view and comments to the Operator's tentative maintenance plan as notified to the Shipper above. The Operator shall to a reasonable extent take the Shipper's comments into consideration before finalising the maintenance plan.

The Operator shall prior to the third Monday in the Month immediately prior to the Month in which the Operator decides to place the Maintenance Period notify the Shipper of the following:

- The number of Hours, where the aggregated transportation capacity in the Transportation System will be affected by Planned Maintenance.
- The Reduced Capacity available to the Shipper during the Hours affected by Planned Maintenance.

The Operator shall further prior to the second last working day in the Week immediately prior to the Week in which the Operator decides to place the Maintenance Period update the Shipper of the following detail:

• A revised number of Hours, where the aggregated transportation capacity in the Transportation System will be affected by Planned Maintenance.

The Operator shall further prior to the last working day before the Gas Day in which the Operator decides to place the Maintenance Period update the Shipper of the following detail:

• A revised number of Hours, where the aggregated transportation capacity in the Transportation System will be affected by Planned Maintenance.

7 ATTACHMENTS

The content of Excel files to be interchanged with the Shippers in the monthly sequence regarding the Final Delivery and Redelivery Allocations, the Shipper's share of Energy Imbalance(s) and the Shipper's share of Fuel & Flare, is shown here.

Attachment 1, sheet a

Name of chinner				
Name of shipper				
April 2015				
inal Delivery Allocations				
	Date	Preliminary Delivery Allocations	Corrections Final	Delivery Allocations
	Date	kWh	kWh	kWh
		KVVII	KVVII	KVVII
	01-apr-2015	1.712.937	7.046	1.719.982
	02-apr-2015		9.365	3.263.851
	03-apr-2015		8.595	2.918.233
	04-apr-2015		10.029	2.932.844
	05-apr-2015		14.461	2.798.634
	06-apr-2015		13.421	2.507.549
	07-apr-2015		-349.654	2.909.402
	08-apr-2015		22.792	3.084.109
	09-apr-2015		24.653	3.422.599
	10-apr-2015		100.078	3.406.317
	11-apr-2015		22.589	2.811.534
	12-apr-2015		26.469	3.131.957
	13-apr-2015	2.963.263	27.222	2.990.485
	14-apr-2015	3.041.590	25.083	3.066.673
	15-apr-2015	1.494.948	76.577	1.571.525
	16-apr-2015	2.864.764	24.800	2.889.564
	17-apr-2015	2.720.849	207.065	2.927.914
	18-apr-2015	2.669.772	12.424	2.682.196
	19-apr-2015		12.594	2.604.170
	20-apr-2015	2.799.817	16.362	2.816.179
	21-apr-2015		5.733	2.919.954
	22-apr-2015	2.017.097	206.007	2.223.104
	23-apr-2015	1.901.438	6.074	1.907.512
	24-apr-2015	2.157.124	15.048	2.172.172
	25-apr-2015	2.401.459	19.726	2.421.185
	26-apr-2015		14.866	2.635.662
	27-apr-2015		6.062	1.305.217
	28-apr-2015		1.602	1.980.733
	29-apr-2015		36.989	1.886.849
	30-apr-2015	2.152.671	10.425	2.163.096
Total Preliminary Delivery Allocatio	n	77.435.795		
Total Corrections			634.500	
				78.071.198
Accumulated difference				902

Attachment 1, sheet b

ar	ne of shipper			
oril	2015			
ede	livery			
			OS000999-DS00088	88
	D 4	F: 10	1.11. All 2	
	Date	Final Re	delivery Allocations	Corrections
			kWh	kWh
	01-apr-2015 06:00		124.000	(
	01-apr-2015 07:00		41.802	
	01-apr-2015 07:00		41.002	
	01-apr-2015 09:00		69.124	
	01-apr-2015 10:00		124.000	
	01-apr-2015 10:00		124.000	
	01-apr-2015 11:00		124.000	
	01-apr-2015 12:00		124.000	
	01-apr-2015 13:00 01-apr-2015 14:00		124.000	
	01-apr-2015 15:00		124.000	
	01-apr-2015 16:00		124.000	
	01-apr-2015 17:00		124.000	
	01-apr-2015 17:00		124.000	
	01-apr-2015 19:00		26.849	
	01-apr-2015 13:00		20.043	
	01-apr-2015 21:00		63.330	
	01-apr-2015 22:00		89.363	
	01-apr-2015 23:00		120.220	
	02-apr-2015 00:00		104.903	
	02-apr-2015 01:00		47.167	
	02-apr-2015 02:00		92.606	
	02-apr-2015 02:00		105.678	
	02-apr-2015 04:00		000.070	
	02-apr-2015 05:00		66.888	
	02-apr-2015 06:00		85.453	
	02-apr-2015 07:00		104.297	
	02-apr-2015 08:00		72.839	
	02-apr-2015 09:00		142.000	
	02-apr-2015 10:00		142.000	
	02-apr-2015 11:00		142.000	
	02-apr-2015 12:00		142.000	
	02-apr-2015 13:00		142.000	
	02-apr-2015 14:00		142.000	
	02-apr-2015 15:00		142.000	
		edelivery	(+)	

Attachment 2

	-
	_
.718.320.000	kWh
109.654.766	kWh
337.071.680	kWh
11,9%	
753.111	kWh
2.923.750	kWh
504.584	kWh
2.923.750	kWh
3.428.334	kWh
408.630	kWh
	408.630

Attachment 3

