NC TAR 2018-07-06 Swedegas AB

Consultation summary of the Network Code on Tariffs (NC TAR)

Scope and Background

On the 30th of April the public consultation was announced according to Article 26 in COMMISSION REGULATION (EU) 2017/460 of 16 March 2017 establishing a network code on harmonized transmission tariff structures for gas (TAR NC). The consultation lasted two months and ended on the 30th of June. This document is a summary of the consultation responses together with comments by Swedegas.

All references in this document are to TAR NC unless otherwise stated.

All Swedish market players were welcomed to provide responses to the consultation by E-mailing NCTAR@swedegas.se. 12 market players provided responses; 4 DSOs, 2 suppliers/balance administrators and 6 end consumers seen in Table 1 below.

Market Player(s)	Description	Appendix
EON Gas Sverige AB,	DSOs located in the southern	1
Kraftringen AB and	part of the system. Provided a	
Öresundskraft AB	joint statement	
Göteborg Energi Gasnät AB	DSO in the northern part of	II
	the system	
Ørsted	Balance administrator/gas	III
	supplier	
Göteborg Energi AB	Balance administrator/gas	IV
	supplier	
St1	Industrial end consumer	V
	located in the northern part of	
	the system	
AkzoNobel	Industrial end consumer	VI
	located in the northern part of	
	the system	
Borealis AB	Industrial end consumer	VII
	located in the northern part of	
	the system	
Uniper and its subsidiary	CHP plant located in the	VIII
Sydkraft Thermal Power AB	southern part of the system	
Preem AB	Industrial end consumer	IX
	located in the northern part of	
	the system	
Perstorp Oxo AB	Industrial end consumer	X
	located in the northern part of	
	the system	

Description of this document

The summary is structured into the different topics that the consultation responses cover. Attached to the summary are appendixes with original comments in English from the parties that participated in the consultation.

Cursive text is cited from the responses and normal text is written by Swedegas.

1 Reference price method

In this chapter the consultation responses regarding the proposed reference price method (RPM) are summarized. The proposed reference price method is the Postage Stamp methodology (PS).

1.1 Reproducibility

According to Art.7 (a) the RPM should aim at "enabling network users to reproduce the calculation of reference prices and their accurate forecast".

1.1.1 Comments from the market

EON Gas Sverige AB, Kraftringen AB and Öresundskraft AB – DSOs in Southern Sweden

The market players are of the opinion that "The Postage Stamp Methodology proposed by Swedegas is admittedly easy to understand and to calculate itself, but the parameters defined inside the model are difficult to reproduce and predict."

The parameters that the PS consist of are the Allowed Revenue, Forecasted Contracted Capacity and Entry/Exit split. The market players believe that the Allowed Revenue and the Forecasted Contracted Capacity are hard to predict, the following reasons are given for their opinion:

Allowed revenue

- "1. The historically allowed revenue doesn't cover predictions into the near future;
- 2. Swedegas revenue cap has been reassessed in court and remitted to the NRA, increasing the transmission grid lifespan from 65 to 90 years and changing the WACC from 6,26 % to 6,91 % as compared to the decision in 2014. This increases Swedegas revenue cap in RP1 with 10 %, from 1 826 to 2 014 MSEK in the monetary value of 2013;
- 3. The fact that indexation from 2013 to 2019 needs to be addressed adds a factor of some additional 5-10 % to the allowed revenue, depending on how the Swedish CPI and Transmission Index develops onwards;
- 4. The revenue cap will later be reconciled since the decision was made in 2014 and was based on several preliminary projections on Swedegas business development. These need to be updated in real time to give a realistic figure on the present revenue cap. This is an unmanageable task for the DSOs;
- 5. Swedegas has divided the revenue cap evenly over all four years, resulting in an allowed revenue of 1826/4 = 456 MSEK as input in the RPM. Swedegas has in fact not distributed the revenue evenly over all years in RP1 and is unlikely to do so onwards;
- 6. Swedegas pricing normally follows a gas year (October-September), whereas the regulatory period covers four calendar years (January-December) at a time. A regulatory period therefore overlaps five different gas years, whereas a single gas year can overlap two different regulatory periods, making allocation of revenues among gas years hard to predict;
- 7. Swedegas does not fully utilize its revenue cap, meaning that real revenues are not actually related to the allowed transmission service revenue."

Forecasted Contracted Capacity

The market players believe that the information on how the forecasted capacity is determined is not enough to able market players to predict the development of the parameter, and consequently, the reference price.

"Without further information on the forecast procedure, it's impossible for the individual DSOs to guess what trends Swedegas foresee and what changes in consumption Swedegas expect on the national gas market as a whole."

1.1.2 Comment by Swedegas

There is some uncertainty regarding input parameters (allowed revenue and forecasted contracted capacity) that exists independent on chosen RPM.

The NC Tar consultation is based on the published revenue cap decision at the start of the consultation. There was an appeal process regarding the revenue cap of RP1 which resulted in an updated revenue cap decision from the NRA in June 2018. This have clarified the conditions for the regulatory framework and the revenue caps of RP1 and RP2.

Forecasted contracted capacity is based on the current market situation and incorporate trends and expected future events in the forecast. The aggregated historical bookings are published in the form of a graph four times per year and provides a view of the current market.

The reference price is calculated assuming that 100 % of the revenue cap is utilized. Since Swedegas does not utilize 100% of the revenue cap, the indicative one-year firm capacity product is in turn obtained by multiplying the reference price with a factor, resulting in an indicative one-year firm capacity product that will be lower than the reference price.

Gas has a low market share in Sweden (2-3 % of the total energy mix), many end users have substitution possibilities and hence gas faces competition from other energy sources. Therefore, Swedegas have chosen not to utilize 100 % of the revenue cap.

1.2 Cost reflectivity

According to Art.7 (b) the RPM should aim at "taking into account the actual costs incurred for the provision of transmission services considering the level of complexity of the transmission network".

1.2.1 Comments from the market

EON Gas Sverige AB, Kraftringen AB and Öresundskraft AB – DSOs in Southern Sweden The market players believe that the PS fails to fulfill the requirements for cost reflectivity.

See page 4-5 in Appendix I.

Uniper and its subsidiary Sydkraft Thermal Power AB — CHP plant operator and owner located in southern Sweden

"The tariffs do not reflect the costs occurring from gas consumption in southern Sweden. Since distance is a fundamental cost driver for transmission services, using the CWD method rather than the proposed postage stamp method would lead to a more cost reflective reference price and, at the same time, bring balance in the allocation of costs between the different offtake areas."

1.2.2 Comments from Swedegas

Allowed Transmission service revenue is a relevant parameter in the PS methodology (as well as in the CWD methodology) since the aim of the reference price, and the resulting indicative tariffs, is to distribute the cost for operating the transmission system.

The allowed revenue is included as a parameter in the PS methodology, it affects the reference price and is therefore used to allocate the revenues together with the forecasted contracted capacity, which is a cost driving factor. The Postage Stamp method fulfills the requirements for cost reflectivity.

The CWD is also cost reflective considering that distance is a relevant parameter and is used to allocate the costs based on distance.

However, more factors than cost reflectivity have to be taken in regard when choosing an RPM, such as replication of result, discrimination and having a functioning market. Overall taking all aspects into account, the PS has a clear advantage over the CWD and is therefore chosen as RPM.

The PS method is applicable with TAR NC and the Swedish Natural Gas Act. It has been used for a long time and has been approved by the NRA with the Natural Gas Act in mind and its principles regarding cost reflectivity.

1.3 Discrimination

According to Art.7 (c) the RPM should aim at "ensuring non-discrimination and prevent undue cross-subsidisation including by taking into account the cost allocation assessments set out in Article 5".

1.3.1 Comments from the market

EON Gas Sverige AB, Kraftringen AB and Öresundskraft AB – DSOs in Southern Sweden

"PS is not unique in the sense of non-discrimination as compared to CWD. Just as Swedegas has observed, prevention of cross-subsidisation is naturally guaranteed since the transmission system does not transit gas."

ST1- Industrial end consumer in the northern part of the system

"Our view is that since the only entry point for natural gas to Sweden is in the south namely via Dragör, the price should be equal and independent of location of consumer. There should be no difference in price whether the consumer is situated whether the consumer is situated in the beginning or at the end of the pipeline. The methodology must be completely neutral between all costumers"

"A RPM based on distance will create different business environments purely based on their location"

Akzo Nobel - Industrial end consumer in the northern part of the system

"Tariffs should not be discriminatory"

"Users have no influence on how the system is fed. The Stamp model secures non-discrimination. A capacity distance model does not"

Borealis - Industrial end consumer in the northern part of the system

"The tariff system shall ensure non-discrimination. We as users have no (or at least little) influence on how the system is fed. The post stamp method ensures that no one is discriminated based on decisions about connections / supplies, a capacity-weighted distance method does not."

Preem - Industrial end consumer in the northern part of the system

"We have no possibility to impact decisions regarding supply and connections and 99,5% of all gas comes by Exit Dragör. Postage stamp method secures that nobody is being discriminated"

Göteborg Energi Gasnät AB – DSO in the northern part of the system

"The tariff system shall ensure non-discrimination. We as users have no (or at least small) impact on how the system is fed. The stamp method ensures that no one is discriminated based on decisions about connections / supplies. A capacity-weighted distance method does not."

Perstorp - Industrial end consumer in the northern part of the system

"The tariff should be non-discriminating. We consumers have no influence on how the system is fed with natural gas. Post stamp method makes sure no one is discriminated based on decisions on connections/supply, the capacity-distance method does not do this."

1.3.2 Comments from Swedegas

Ensuring non-discrimination is an important requirement for the RPM according to the code but also according to the Swedish Natural Gas Act. In the Swedish system there are competing industries connected to the grid as well as CHP plants. It is therefore important to have a tariff that do not provide unreasonable cost deviations geographically or impose sudden and drastic changes negative to any parties.

1.4 Harmonization

1.4.1 Comments from the market

Borealis - Industrial end consumer in the northern part of the system

"The purpose of the code is to harmonize the tariff structure in EU. The post stamp method is the clearly dominant method used in European gas systems."

Perstorp - Industrial end consumer in the northern part of the system

"The suggested method is the same as in the majority of the European systems"

Ørsted – gas supplier and balance administrator

"...efforts to establish a joint balancing zone between Denmark and Sweden is an element in the considerations"

1.4.2 Comments from Swedegas

Market harmonization is an important goal of the code.

A majority of the TSOs in Europe currently apply the PS methodology. Having the same RPM as adjacent TSOs increases harmonization.

1.5 Sector coupling

1.5.1 Comments from the market

Akzo Nobel - Industrial end consumer in the northern part of the system

"The [postage] stamp model is used for electricity."

Borealis - Industrial end consumer in the northern part of the system

"The [postage] stamp method is used as a principle for electricity distribution in Sweden. It is reasonable that network tariffs are built according to the same principles for different energy carriers."

Preem - Industrial end consumer in the northern part of the system

"The Postage stamp method is used for electricity distribution and it is logical to use the same principle for different energy carriers."

Göteborg Energi Gasnät AB – DSO in the northern part of the system

"The stamp method is used in electricity distribution and secures a fair and easy [way] to understand model for cost splitting. It is reasonable that network tariffs are built according to the same principles for different energy carriers. It is also the dominating principle in the European distribution systems."

Perstorp - Industrial end consumer in the northern part of the system

"Post stamp method is used in the distribution system for electricity and it is reasonable that the same principals are used for different energy systems."

1.5.2 Comments from Swedegas

It is positive if the chosen RPM is well known and easy for the customers to understand.

1.6 Market effects

The market effects of the proposed RPM are discussed here.

1.6.1 Comments from the market

EON Gas Sverige AB, Kraftringen AB and Öresundskraft AB – DSOs in Southern Sweden

The market players disagree that the CWD would result in a high risk of negative volume effect. They emphasize that the whole system and all tariffs must be taken in regard when determining the market effect of the RPM. They believe that the CWD results shows that the grid is more efficient in the south than in the north – having a uniform reference price sub optimizes the total market economy.

Uniper and its subsidiary Sydkraft Thermal Power AB — CHP plant operator and owner located in southern Sweden

"We miss in the consultation material a clear presentation of data to support the statement that the CWD method would lead to a "decrease in market volumes and a higher reference prices for the remaining transmission customers". Majority of consumption is located in southern Sweden, amongst others with our power generation consuming e.g. in average 39 000 Nm3/h/y during the years 2010-2011. Consumption decreased during the last years, due to low electricity prices and gas transmission costs significantly above the level in other European countries."

"[The PS method] leads to an unfair cost allocation that decreases the competitiveness of natural gas in southern Sweden, with the risk of overall negative volume effects."

"In European comparison the general level of the transmission tariff in Sweden is significantly high. This applies both to the basic tariff and to the factor for daily bookings. Corresponding power plants in other parts of Europe have basic tariffs below 1/3 of the present level in Sweden..."

"...As this Swedish gas tariffs are having a distortive influence on electricity markets and Sweden based electricity production.

Reasons for these significant deviations in tariffs and the underlying regulated income limitations in European comparison have not been studied by us in this statement. However they seem key to an open market."

Ørsted – gas supplier and balance administrator

Ørsted agrees with Swedegas on how to structure the tariff methodology in a market of relatively limited size.

Göteborg Energi AB – gas supplier and balance administrator

"We would like to express our concern if a future fee for transportation is not based on the postage stamp method.

The reference method CWD would make it very much harder to use natural gas for the purpose of District heating. "

ST1- Industrial end consumer in the northern part of the system

"A RPM based on distance will create different business environments for different consumers purely based on their location. There is also a potential risk for a change to other energy sources if a too large part of the cost is put on some of the consumers"

Akzo Nobel - Industrial end consumer in the northern part of the system

"A change in model will challenge usage of natural gas at some location, if cost would go up dramatically."

Borealis - Industrial end consumer in the northern part of the system

"A large difference in distribution costs between regions affects the development of natural gas network. A less utilized natural gas network leads to higher cost per unit, and makes the future for and development of the natural gas infrastructure uncertain."

Preem - Industrial end consumer in the northern part of the system

"There are alternatives to natural gas in case natural gas is too costly"

"The Swedish network is a relatively short pipeline, and large differences in distribution cost between different part of the that line as imposed CWD method will negatively impact the development of natural gas use and lead to higher price per delivered MWh."

Göteborg Energi Gasnät AB – DSO in the northern part of the system

"A large difference in distribution costs between regions affects the development of natural gas use and the industry's ability to compete. A less utilized natural gas network leads to higher costs per unit."

Perstorp - Industrial end consumer in the northern part of the system

"Large differences in the distribution costs in the system would effect the use of natural gas and a gas net that is less utilized would have higher cost per transported unit."

1.6.2 Comments from Swedegas

As the TSO we need to take a view of what is best in total for the entire market. It is our clear view that the market as a whole benefits from a uniform tariff which the postage stamp method provides. The potential negative effect in the northern part of the system by far outweigh the potential positive effect in the southern part if the CWD is applied. As mentioned earlier, Swedegas does not currently fully recover the revenue cap since we assess the risk of demand destruction to be too large if we would do so. The CWD would have the same consequences for the northern part and hence we consider it not relevant to implement.

Regarding the CHP segment, gas-fired CHPs have suffered from a negative spark spread since 2011 and several plants in Europe have been mothballed/closed in recent years. These plants are in regular connected to TSO systems in Europe with lower tariffs, but have despite that been unprofitable. Swedish CHPs have relied on a heating contract in a market with negative spark spread and have not operated solely for power production in recent years.

2. Comparison against CWD

2.1 Comments from the market

EON Gas Sverige AB, Kraftringen AB and Öresundskraft AB – DSOs in Southern Sweden

The market players are of the opinion that adding distance as a parameter does not make the RPM less reproduceable and predictable compared to the difficulties they experience with the PS methodology. They believe that the Swedish system is uncomplex and static.

"Given the average lengths for the inputs and exits, the task of calculating CWD is an easy task. Compared to the difficulties of the already suggested parameters in PS, adding distances hardly makes reproducing and predicting the reference price any more difficult or complex."

"Considering the uncomplex and static nature of the transmission grid, confirming and keeping the lengths updated should not imply any difficulties for Swedegas or for any other external part. Based on present values for average distances, projections into the future will regardless be sufficiently precise given that the transmission grid has hardly changed at all for the last 10 years."

They also have opinions on how the comparison was performed

"The deviancies between PS and CWD aren't as large as may seem in the consultation material, since the comparison should be made against the counterfactual CWD50/50 according to Article 8. The discussion in the consultation material is invalid since it compares the suggested RPM with a CWD0/100. This neglects the balancing effect of the entry tariff and dramatizes the perceived market impact of CWD."

2.2 Comments from Swedegas

Adding distance as a parameter would make the RPM slightly more complex. Clustering the exits into four exit zones would however simplify the reproducibility of the CWD method. Distances need to be updated when the transmission network is expanded and new customers are connected.

The resulting reference prices from CWD 50/50 can be seen in Figure 3 and Figure 4 in the main consultation document. Comparing PS and CWD 0/100 is more relevant since that split is the most relevant for Sweden considering how the Natural Gas Act is written.

The advantages of PS over CWD still apply whether comparing with 50/50 or 0/100 splits.

3. Other proposed RPMs

3.1 Comments from the market

EON Gas Sverige AB, Kraftringen AB and Öresundskraft AB – DSOs in Southern Sweden

They propose a CWD method that results in the same reference prices seen in the CWD 50/50 entry/exit split without having entry tariffs. The proposed RPM can be seen in Appendix I page 7 and its Attachment.

3.2 Comments from Swedegas

The resulting reference obtained from the proposed RPM would still result in substantial differences in reference price for different offtake areas. High risk of negative volume effect. The price difference would be a factor of two between the southernmost outtake area and the northern outtake area. The tariffs for the northern outtake area would increase by 26 % using the proposed methodology which is highly likely to result in an overall negative volume effect.

4. Non-transmission services

4.1 Comments from the market

EON Gas Sverige AB, Kraftringen AB and Öresundskraft AB – DSOs in Southern Sweden

"Administration [charge] and pressure reduction [service]...favour the northern market when comparing total transmission costs in relation to contracted/technical capacity or volume."

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4.2 Comments from Swedegas

The parameters for the non-transmission services are objective and non-discriminating. All according to TAR NC and the Natural Gas Act.

5. Comments that were out of scope of the consultation

Some consultation responses were out of scope of the consultation. Those responses are listed here

5.1 Transmission services

EON gas Sverige AB, Kraftringen AB and Öresundskraft AB – DSOs in Southern Sweden

The opinion is stressed that Swedegas tariff structure implies that:

"...southern consumers are, on the contrary to CWD, currently faced with relatively higher transmission costs since tariff components for extra capacity, capacity distribution, administration and pressure reduction, as well as discounts for interruptible capacity favour the northern market when comparing total transmission costs in relation to contracted/technical capacity or volume"

Uniper and its subsidiary Sydkraft Thermal Power AB – CHP plant operator and owner located in southern Sweden

"The additional tariff component "Extra Områdeskapacitet" is not representing factual cost and is discriminating. While being a major cost somponent It is not addressed or explained by Swedegas in the consultation documents. On the presentation of consultation documents on the 9th of May, Swedgas has on request stated its intention to continue applying "Extra Områdeskapacitet unchanged."

"The additional tariff components "Kapacitetstilldelningsavgifter" and "Dygnsbokningsavgift" are not mentioned in the consultation documents. They represent a hinder to new market entries and discriminate customers with irregular operation"

5.2 Multipliers

Uniper and its subsidiary Sydkraft Thermal Power AB — CHP plant operator and owner located in southern Sweden

"...the multiplier for daily bookings in Germany are for example around 1.2-1.3 rather than 3.5 as is the case in Sweden. As this Swedish gas tariffs are having a distortive influence on electricity markets and Sweden based electricity production."