

Nordic CCM SH Meeting – meeting minutes

March 27, 2023, 9.30-16.00

(Hybrid event - Clarion Hotel Arlanda airport Stockholm and MS Teams)

Participants	
Total physical participation: 50	Total online participation: 59

Text in non-italics are comments, statements, questions or claims from the stakeholder(s), interpreted by the CCM project.
Text in italics are answers or comments provided by the Nordic CCM project.

1. Welcome and opening words (9.30-9.40)
2. Status update and overall timeline (09.40-10.00)
<p>Question: What's the implementation status of long-term CCM? What is the format of the LT CC? CCM project: <i>In progress. It is foreseen to go live after 1 year of the FB go-live. The format is the ATC format (i.e. capacity to be provided on the bidding zone border level).</i></p> <p>Question: Is the data being published the same as the data after go-live? CCM project: <i>The FB parameters will be published after the FB go-live as they are being published now. Please note the NTC information will not be published, as they will not be used any longer after the FB go-live.</i></p> <p>Question: Of all the published data, what are the days with good quality, and what are those days without good quality? The quality of the results are essential to forecast the future. CCM project: <i>Please refer to the disclaimers of each weekly market report, as they capture the most important data quality issues for the SHs to be aware of for that particular week. Please also be reminded that the EPR is a learning-by-doing process. The TSOs provide inputs to the FB CC process and observe the results. If quality issues are observed from the results, the TSOs will improve the input quality accordingly.</i></p> <p>Question: What's the relationship between the Bidding zone review and the Nordic CCM EPR? CCM project: <i>There is no direct relationship between the two projects. The bidding zone review project is in progress. Indeed, it takes years to prepare and implement the suitable bidding zone configuration in the Nordics. The Nordic CCM project has its own timeline to go live, which is foreseen earlier than the realization of the BZ reconfiguration. As far as the CCM project is concerned, the BZ review simulations also contain the FB CC.</i></p>
3. NRA KPI elaboration and 3-month reporting, approval process (10.00-10.20)
<p>Question: The market reports indicate the water value based on the NTC orderbook shows benefits in the FB method? Did the NRA provide any comments on this point? CCM project: <i>It is a known issue when performing the FB MC using the NTC orderbook. The NTC orderbook is the only qualified and factual orderbook that can be used in the EPR. The Nordic TSOs do not plan to create an opinionated FB orderbook and draw conclusion upon the opinionated FB orderbook. The NRAs are aware of the issue and have not expressed any comments on this point.</i></p> <p>Question: The SHs are interested in forecast the future, e.g. the price after go-live. Can you maybe do the same as in the Core/CWE by clustering the yearly days into different types, SPAIC days representing different grid topology/situations? CCM project: <i>No, it is not within the scope of the EPR to create SPAIC days. The Nordic TSOs understand the need of the SHs to forecast the price during the EPR for better preparation towards FB go-live. To facilitate the SHs, the TSOs advise the SHs to examine the EPR result along the EPR progress. The published results and market reports contain the improved quality from all aspects, e.g. input data quality, process stability, IT stability, more insightful elaboration on results.</i></p> <p>Comment: The better utilization of grids should mean more trades, e.g. more flows from low price BZs to high price BZs. CCM project: <i>The better utilization of the transmission grids is reflected by higher socio-economic welfare as the market coupling outcome. The commercial flows from low price BZ to high price BZ is not optimized by the SDAC algorithm.</i></p> <p>Comment: There should be a wider discussion on the EU market design. CCM project: <i>A wider discussion on the EU market design may be helpful but is not within the scope of the Nordic CCM EPR.</i></p>
4. Public consultation elaboration (10.20-10.35)
<p>Question: Will the KPIs and the EPR result elaboration be published as part of the consultation? CCM project: <i>Yes.</i></p> <p>Question: What is the consequence of the consultation? In other words, if the SHs are not happy and provide comments accordingly, will they make any impact on the TSOs and NRA decision? CCM project: <i>The TSOs consider the SH feedback very seriously and the feedback from this consultation is no exception.</i></p> <p>Question: How do TSOs convince the political parties about the non-intuitive flows and the electricity market being functioning well? CCM project: <i>The TSOs facilitate the market design and an overall functioning electricity market. For the CCM EPR, the TSOs perform simulations, report and elaborate results based on mathematics, physics and market mechanism to the NRAs and all SHs according to the simulation observations and facts.</i></p> <p>Comment: Can we go to (C)NTC like other CCRs? CCM project: <i>It is not possible to continue with the current NTC method. Between the FB and CNTC as two viable options towards the future allowed capacity calculation methodologies, the Nordic NRAs approved the FB methodology to be applied within the Nordic CCR.</i></p>

5. Result elaboration: DA (10.35-11.25)

Question: The price converges in Sweden but at a higher price level. This is a bad result. How can Svk reason with the SE consumers?

CCM project: The reason of the price increase in the southern Sweden is related to FB increasing the available capacity between SE3-NO1 and SE3-DK1 compared to NTC, the modelling difference of the series compensation, and that the counter-trade is taken into account in NTC and not in FB.

Comment: How to understand the consumer surplus loss at -20 million euros on the SDAC level?

CCM project: The TSOs plan to publish the detailed SDAC welfare information for the SHs to better understand the welfare (re-)distribution of the SDAC regions. Conceptually, it is also no economic theory/proof that the consumer surplus of all bidding zones should increase when the transmission capacity increases. Please refer to the slides at <https://nordic-ccc.net/wp-content/uploads/2023/03/Theoretical-change-in-SEW.pdf> for the conceptual understanding of the SEW (re-)distribution and elaboration in the upcoming NRA evaluation report, ready for the public consultation before 17/04.

Question: Is the 10-week period too short?

CCM project: The 10-week is the KPI evaluation period, requested by the NRAs. The EPR continues until at least Q1 2024 (i.e. the tentative FB go-live date).

Comment: It is difficult to go deeper with the price formation without the detailed orderbook per bidding zone. Currently, the orderbooks are aggregated and available on the bidding zone level.

CCM project: Agree.

Question: Did the CCM project simulate the Nordic system price?

CCM project and NordPool: Simulation of the system price is not within the scope of the Nordic CCM EPR. NordPool is performing the in-house system price simulations and is in discussion with the TSOs on some pending technical topics.

Question: SE2 decreases the green energy, instead, SE3 and SE4 increase the fossil fuel and nuclear production. What changes before the winter break and now?

CCM project: There are two aspects to consider. 1. To review the SE2 production (The TSOs will get back to the SHs) 2. The counter-trade is used in NTC, allowing more flows in the grid. In other words, when Svk provides more NTC capacities to the DA market coupling and will activate the counter trade when needed. This operational setup in NTC started in December 2022 and is not yet available in the FB simulations. From the 1st of March and onwards, Svk applies a setup of the series compensator at the SE2-SE3 border in FB that is more aligned with the setup in NTC, which has an effect on the flows on the border as well as the net position in SE2.

Also, the prices in NO1 and DK1 are high. The SDAC algorithm does reduce the prices of these bidding zones. However, the price decrease does not compensate the consumer losses (in southern Sweden).

Comment: KPIs are not green from the SHs' opinion.

CCM project: The TSOs report the simulation facts and KPIs according to the criteria jointly agreed among the TSOs and the NRAs. According to the KPI definition, all KPIs are qualified to be green as they are all below the allowable thresholds.

Comment: The TSOs and the SHs are not on the same boat because of the knowledge difference on the FB methodology.

CCM project: The CCM project aims at improving the knowledge transfer to mitigate the knowledge gap and better facilitate the SHs to be ready for the FB go-live.

Comment: What are the hours that the FB congestion income is less than the NTC congestion income?

CCM project: The large CI in FB comes from SE2. Via better modelling of the series compensator for instance, the CI on SE2 is expected to decrease. Also, the TSOs will look into publishing the CI information.

Additional presentation: a conceptual example to illustrate that it is possible for the consumer to experience the welfare losses even with the increase transmission capacity.

Comment: it is difficult to link the conceptual example to the SE3, SE4 welfare loss situation, because the conceptual example indicates that the consumer loss requires a very large producer surplus to begin with. The SE3 and SE4 are deficit areas.

CCM project: This conceptual example is not a 1:1 projection to the SE3 and SE4 situation. Instead, the example shows the possibility of consumer loss even when the transmission grid capacity increases. The aim of this example is to raise the SH awareness that not all consumers will benefit from the transmission capacity increase.

Comment: The FB results show the curtailment of the production and the price increase as consequence. This is the same as producer withdrawing the power from the DA market. The FB results indicate that the FB method is responsible for the producer surplus increase and the consumer surplus decrease.

CCM project: The TSOs do not agree with this conclusion and will elaborate in the NRA evaluation report.

Comment: It is difficult to reason with the political party and/or the (Swedish) consumers.

CCM project: CS is one aspect of the total welfare picture. Producers, consumers, NEMOs, i.e. all market participants, are the important SHs to the TSOs. The TSOs perform the capacity calculation to provide capacities to the market and the market participants provide bids for the NEMOs to construct the orderbooks. The SDAC algorithm maximizes the total welfare of PS, CS and CI, based on the offered capacity and the orderbooks. In this process, the TSOs are unbiased and have no interest to favour producers or consumers.

Question: Will you provide the Nordic SEW gain in percentage against the total SDAC NTC welfare?

CCM project: The TSOs will get back to you on this question. The SEW gain in the Nordics is foreseen very small to compare to the total SDAC NTC SEW.

6. Result elaboration: ID (10.35-11.25)

Question: Will the TSOs publish the NTC_initial as NTC_final, knowing that the ID validation still needs to be developed and the potential arbitrage possibilities? The market participants will use arbitrage possibilities that will have big impact on the physical flows. In general, the market participants need the final ID ATC values for the internal evaluation.

CCM project: Yes. The Nordic TSOs have designed the ID ATCE methodology such that relaxations are applied in the ATCE process in order to provide as much ID capacity to the market participants as possible – from an operational security point of view. As a result of this, the resulting ID ATC values for the ID gate opening trades are always larger than or equal to zero, and capacity may be released on CNECs that was not available at the DA stage.

Like in any coordinated capacity calculation process, a TSO domain validation is applied where capacities may have to be reduced – in case potential overloads resulting from the ID ATCE cannot be coped with.

Question: For the duration curve in the presentation, are non-intuitive flows included?

CCM project: Yes

Question: You are planning to launch a consultation in two weeks?

CCM project: Yes, both DA and ID will be consulted in the same consultation.

Question: There has been suggested to set the ID capacities to zero when there is non-intuitive flow in the DA market. When will the operators be included in this?

CCM project: See the TSO answer above.

Question: Do you have KPIs for ID?

CCM project: No, there are no numerical KPIs for ID capacities.

Question: What will happen if the BZ level lock-in appear?

CCM project: The current results of 10 weeks do not indicate any BZ level lock-in situation. In case it happens at the gateopening, it is foreseen to be relaxed during the ID reassessment, e.g. better grid, wind, load forecast may release some DA reliability margin on the CNECs for the ID trades.

Question: What is the plan for the ID reassessment?

CCM project: The approved Nordic DA/ID CCM art. 21.2 describes the condition of the ID reassessment. 'Reassessment of intraday cross-zonal capacity shall be done at the frequency the CGM for the intraday timeframe is made available in accordance with the CGM methodology developed in line with Article 17 of the CACM Regulation, for each intraday auction pursuant to methodology developed in accordance with Article 55(3) of the CACM Regulation and in case of a fault in the power system. The latest available CGM is applied in the reassessment of cross-zonal capacities. Any change in cross-zonal capacity due to a reassessment shall be released to the intraday market without undue delay.' The TSOs will perform ID reassessment according to this CCM article, i.e. when the CGMs for the ID computations are available and when a fault occurs.

7. TSO feedback (13.00-13.30)

Question: Any progress on the Swedish CNEC anonymization discussion with the NRAs?

CCM project: The SHs are advised to understand and acknowledge the process of the transparency between Svk and the SE NRA. Svk shares the CNEC data with full disclosure with the SE NRA, including ones that do not fulfil the 70% criteria. Both Svk and the SE NRA are performing the respective roles according to the Swedish legislation.

Question: Some information is missing in the JAO data publication, e.g. substation from, substation to?

CCM project: Yes, the TSOs are aware of the missing information and are working on providing them as soon as possible.

Question: Do market participants have access to the control center data for ID?

CCM project: No.

Question: Will the TSOs include the physical flows, scheduled exchanges, buy/sell volumes, to all published data?

CCM project: Yes.

Question: Will you publish the non-intuitive flows for a longer period, which border and how much of CI on the border?

CCM project: general non-intuitive flow information is already published in the market reports. In the NRA report, percentage of time with intuitive and non-intuitive flows are included.

Question: When will the TSOs publish the EPR handbook?

CCM project: Aim: end of this week. Please note that this is the first draft and the improvement is foreseen along the EPR. Latest update from the TSOs: the first version of the EPR handbook is available: <https://nordic-rcc.net/wp-content/uploads/2023/03/CCM-EPR-Handbook.pdf>

Question: Is the scheduled exchanges still useful in the FB world?

CCM project: No. The TSOs recommend the SHs to use the FB market outcome induced border flow instead of the scheduled exchanges. The FB market outcome induced border flow is computed by $z2sPTDF$ (of border CNECs) * FB market outcome in the format of NP. Seen from the equation applied, the induced border flow reflects the physical property of the transmission grid in a more accurate way.

Question: When will the go-no-go decision be made?

CCM project: We have two layers of decisions to consider. First is the NRA decision. The TSOs expect the decision from the NRA, based on the 3-month EPR evaluation report, in mid-July 2023. In the meantime, the TSOs are preparing a go-live plan, to be shared after the NRA decision.

Question: What do you think about the over-the-counter trades?

CCM project: They are included in the IGM basecase creation step. In the concrete FB terms, it is part of the F0 that captures the internal and loop flows.

8. Breatout session (13.30-14.30)

Skipped due to time constraints.

9. Summery of breakout session (14.50-15.45)

Skipped due to time constraints.

10. AOB (10.35-11.25)

All participants are thanked for their constructive inputs!

The presentations have been uploaded on the Nordic RCC website: <https://nordic-rcc.net/flow-based/documents-presentations/>