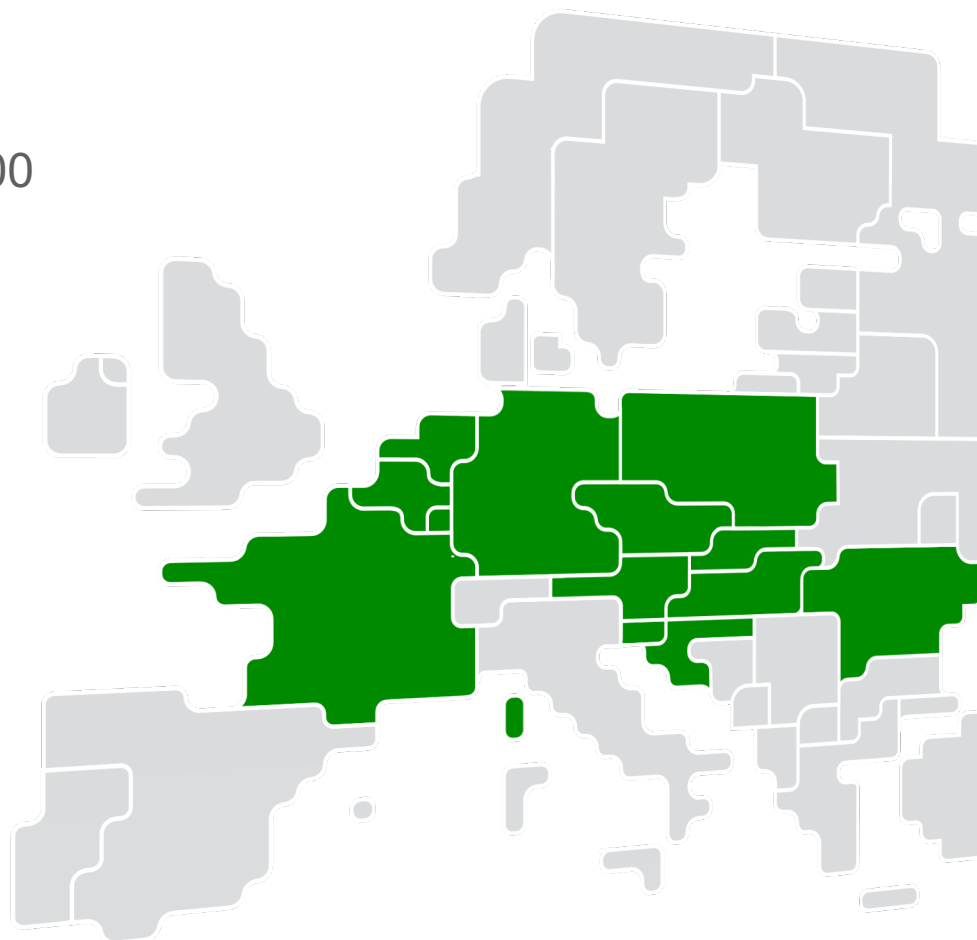




Core Consultative Group meeting

7 October 2020, 10:00 – 16:00

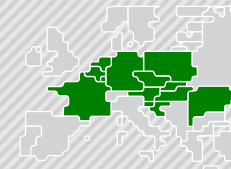
MS teams websession



1. Welcome and introduction

Agenda

B.GENET/
H.ROBAYE

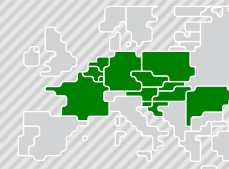


	SUBJECT	WHO	TIMING
1	Welcome and introduction <ul style="list-style-type: none"> Announcements and reminders 	B.GENET/ H.ROBAYE	10.00 – 10.15
2	Core FB Day Ahead Capacity Calculation & Market Coupling <ul style="list-style-type: none"> Introduction into Core FB MC context Interdependencies with ICP and Polish MNA (impact decision EC) Core FB DA MC roadmap and important milestones FB DA CC methodology External parallel run (organization, publication tooling and reporting) Q&A session (via chat) 	M.PREGL/ M.PILS B.GENET/ G.MEUTGEERT/ S.VAN CAMPENHOUT/ M.SCHRADE	10:15 break 11:15 – 11:30 - 12:45 Lunch 12:45 – 13:45
3	Long Term Capacity Calculation <ul style="list-style-type: none"> Status and public consultation LT CC methodology Q&A session (via chat) 	J.FERNANDEZ/ Z.TIHYANYI	13:45 – 15:00 break 15:00 – 15:15
4	Core CCR recent developments <ul style="list-style-type: none"> Ongoing activities in Core CCR 	B.GENET	15.15 – 15:35
5	ACERs consultation on methodologies operational security and RA in Core CCR <ul style="list-style-type: none"> Market Parties Platform highlighted key messages and crucial issues 	H.MARCIOT (Market Parties Platform)	15:35 - 15:55
6	AOB & closure <ul style="list-style-type: none"> Q&A forum on JAO website Next CCG meeting 	B.GENET/ H.ROBAYE	15:55 – 16:00

1. Welcome and Introduction

Practicalities, announcements and reminders

B.GENET/
H.ROBAYE



Co-chairs



Helene ROBAYE (Market Participants, Eurelectric)



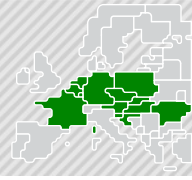
Benjamin GENET (Core TSOs, Elia)

Practicalities

- During meeting
 - Use of 'hand' function will facilitate all participants to have the opportunity to speak
 - Use of 'chat' function will give opportunity to address all questions and will facilitate proper tracking and answering
- Follow up
 - Minutes and final meeting documents will be shared with CCG distribution list
 - MS teams workshop and Q&A will be recorded and made available for all Market Participants
 - ENTSO-e website

Reminder

- Core TSOs followed up per email the actions from previous Core CG meetings

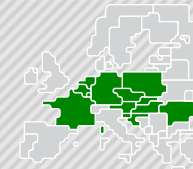


CACM regulation

- Under the Commission Regulation 2015/1222 of 24 July 2015 establishing a guideline on capacity allocation and congestion management (CACM Regulation) EU objective is to create a single European electricity market.
- ACER decision No 02/2019 of 21 February 2019 on the day-ahead capacity calculation methodology (DA CCM)

Market Coupling (MC)

- The integration of two or more electricity markets from different areas through an implicit cross-border allocation mechanism is perceived as key instrument to reach a goal of the establishment of single day-ahead and intraday coupling.
- Two major MC day-ahead projects in the EU.
 - Multi Regional Coupling (MRC) – Austria, Belgium, Bulgaria, Croatia, Estonia, Finland, France, German, Italy, Latvia, Lithuania, the Netherlands, Norway, Poland, Portugal, Slovenia, Spain, Sweden, the United Kingdom
 - 4M Market Coupling (4M MC) – the Czech Republic, Hungary, Romania, Slovakia
- Both projects use the same technical Price Coupling of Regions (PCR) solution and the same computational algorithm (Euphemia) to allocate the cross zonal capacities.
- Market coupling of MRC and 4M MC represents the Single Day-Ahead Market Coupling (SDAC) which is target of EU set in CACM Regulation and covers the advantages such as harmonized processes, optimal use of cross-border capacities, higher business opportunities or higher competition.



Two permissible approaches to calculate the cross-zonal capacities

- (i) Flow-based and (ii) Net Transmission Capacity
- Notifying that the flow-based approach should be used as a primary approach for Day Ahead and Intraday Capacity Calculation and represents the target status

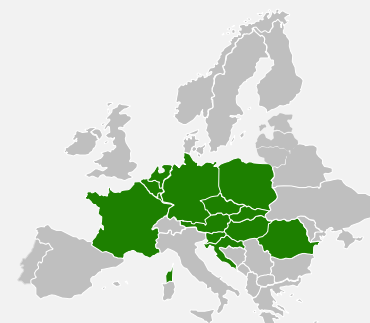
DE-AT-PL-4M MC or „Interim Coupling“ Project

- Aims to implement NTC-based day-ahead market coupling of the 4MMC and MRC areas via the respective bidding zone borders.
- The two regions MRC and 4MMC merging into SDAC will be applying a single day-ahead allocation process.
- Interim step towards the implementation of Flow-Based Market Coupling in the Core region and NTC-based (uncoordinated) capacity calculation and allocation will be replaced by Core FB MC once implemented.
- Initiated based on the DE, AT, PL and 4M NRAs request, concerned NRAs have requested the European Commission to provide guidance on the way forward for the project.
- Borders: DE-CZ, DE-PL, PL-CZ, PL-SK, CZ-AT, AT-HU



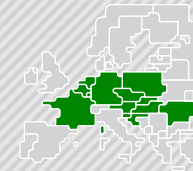
Core FB DA MC Project

- Aims to develop and implement the daily operation of a Flow-Based (FB) day-ahead market coupling across the whole Core capacity calculation region (Core CCR) in the framework of the single day-ahead coupling (SDAC).
- Consists of the bidding zone borders between the following EU Member States' bidding zones: Austria, Belgium, Croatia, the Czech Republic, France, Germany, Hungary, Luxembourg, the Netherlands, Poland, Romania, Slovakia and Slovenia.



2. Core FB Day Ahead Capacity Calculation & Market Coupling

M. PREGL



Introduction into Core FB MC context

3/3

Core FB DA MC history

May 2015

the TSOs in CWE region (including Belgium, France, Netherlands and German-Austrian-Luxembourgish bidding zone) successfully implemented the FB DA CC method.

June 2016

Core Capacity Calculation Region was created based on the ACER decision 06/2016 on the electricity TSOs' proposal for the determination of capacity calculation regions.

September 2017

FB DA CCM developed jointly by all Core CCR TSOs was submitted to regulatory authorities (NRAs) for adoption based on the Article 20 of CACM regulation.

April 2018

the methodology was returned with a request for amendment.

June 2018

TSOs resubmitted the methodology. Eventually, the NRAs did not reach a unanimous decision.

Feb 2019

the methodology was escalated to ACER and in the final form published in February 2019

2015

2016

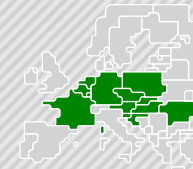
2017

2018

2019

2. Core FB Day Ahead Capacity Calculation & Market Coupling

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Interdependencies Core FB MC, ICP and Polish MNA projects

1/2

Situation

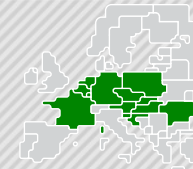
- During spring 2020 it was concluded that Interim Coupling Project (ICP) would not meet the planned go-live in September 2020 as some of the activities were delayed
- Strong dependencies between the Core FB MC, ICP and Polish MNA projects required clear prioritisation
- Core NRAs asked EC to provide guidance that would be legally binding for all Core NRAs and TSOs

DG ENER guidance as provided on 22/09/2020

- Sequential implementation of the ICP and Core FB MC projects for the following reasons:
 - The implementation of the Single Day-Ahead coupling, and notably the geographical extension to all relevant EU borders is a legal requirement and one of the main objectives of CACM. It should have been completed by July 2018, twelve months after the approval of the MCO plan (Article 7(3) CACM). It appears that the ICP is the project that will facilitate the fulfilment of this legal requirement in the shortest time possible;
 - This earlier coupling of 4MMC countries will bring estimated welfare gains of several million EUR1, and additionally will allow for a meaningful coupling of Greece and Bulgaria, who should be able to do so in the following months;
 - Having an interim step in the CORE FB MC project has a value in terms of mitigation of risk and evaluation of the project results:
 - According to the information received, the ICP is in the latest steps of development (with only the testing phase missing, once the delayed parties complete its local implementation). Abandoning the ongoing activities at this stage would carry a considerable amount of sunk costs.
 - The project parties have already announced a significant delay of the CORE FB project, the additional delay expected due to the implementation of the ICP does not seem disruptive, and DG ENER considers that it does not outweigh the benefits listed above
- **Leading to following Market Coupling go live milestones**
 - **ICP: April 2021**
 - **Core FB DA MC: February 2022**

2. Core FB Day Ahead Capacity Calculation & Market Coupling

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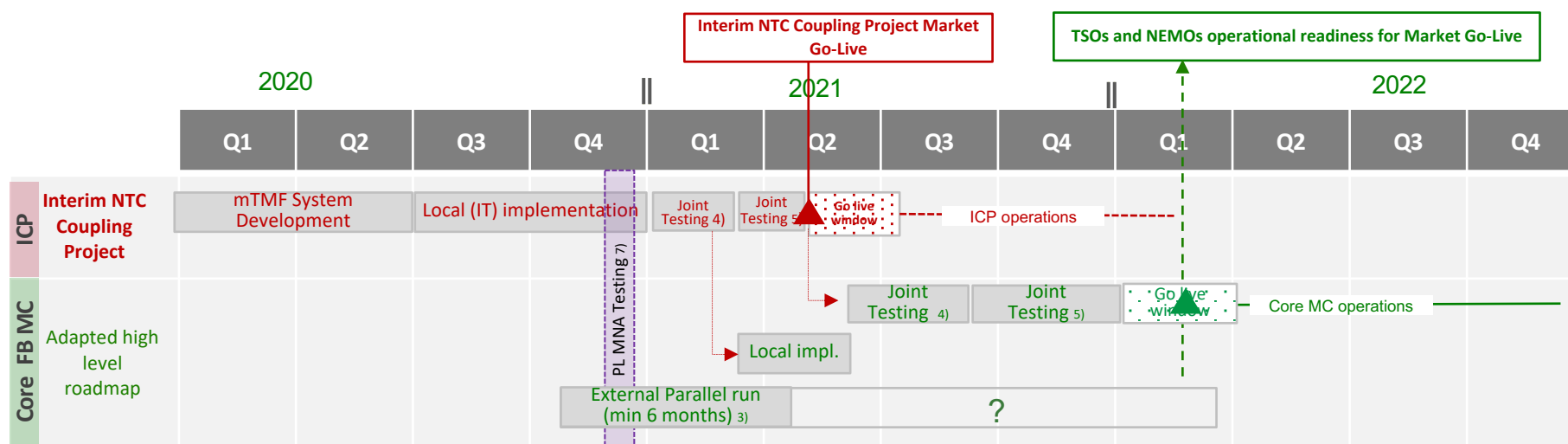


Interdependencies Core FB MC, ICP and Polish MNA projects

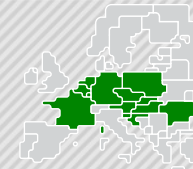
2/2

Impact on Core FB MC roadmap and activities

- Continuation of TSOs FB DA CC implementation as planned and remains strictly monitored by NRAs requested
- Core External parallel run is planned to be launched in November 2020, potentially lasting longer than anticipated 6 months
Core FB MC Joint Integration Testing activities delayed to March 2021



2. Core FB Day Ahead Capacity Calculation & Market Coupling



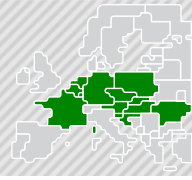
High-level FB DA CC and FB MC project Roadmaps and key activities

Most important steps from the roadmap prior the Core FB DA MC go live

- Finalization of the Market Design for Implementation – Document containing the description of the entire normal business process for coupling day-ahead markets including issues such as shipping arrangements, congestion income collection and aggregation, IT infrastructure and data communication, and so on → **FINISHED AND APPROVED**
- Procedures design – drafts of the normal, back-up, fallback and rollback procedures → **CURRENTLY IN PROGRESS**
- Simulation and validation of the algorithm computational capacity – tests performed in the test environment of the computational algorithm → **CURRENTLY IN PROGRESS**
- External implementation – design, development and implementation of local IT systems of individual project parties – Design phase is FINISHED and the implementation is → **CURRENTLY IN PROGRESS**
- External parallel run – real time testing by comparing the results of the current NTC calculation method and the FB method for the period of at least six months → **PLANNED TO START IN NOVEMBER 2020**
 - Core TSOs decided to transition progressively to EXT//Run (provided that no new issues are identified)
 - Latest releases of tools (see slide 15) required to have a stable process are deployed very recently and last updates for performance improvements are expected prior the EXT//Run
 - Core TSOs are able to compute technical representative data since the summer, but more time is needed to further stabilise the process
 - Concretely: a selection of business days will be published, where the capacity calculation process succeeded and the results are deemed sufficiently representative – some disclaimers may still apply and will be communicated clearly
 - These first publications may help market parties to get acquainted with flow-based data in the Core context
 - When the processes and tools (see slide 15) will be fully stabilised, the publication of 7 business days per week will start
- Final market coupling testing – market participants procedural tests performed before go-live → **WILL BE TRIGGERED**

2. Core FB Day Ahead Capacity Calculation & Market Coupling

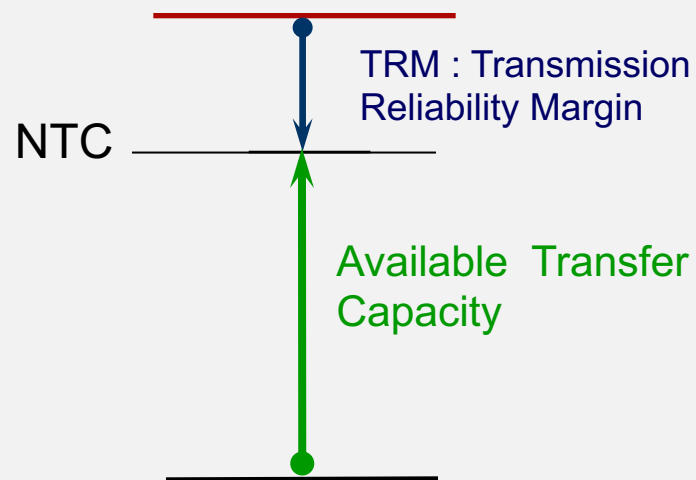
S.VANCAMPENHOUT



Core FB DA CC methodology 1/4

NTC: Capacity by border

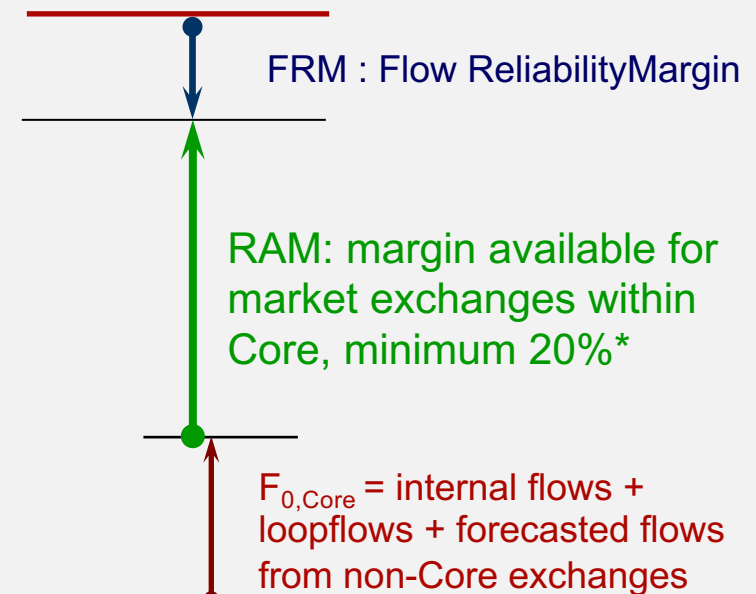
TTC: total transfer capacity of a border, taking into account N-1, and possibly loopflows and interdependency with other borders



Allocation: based on the principle that an exchange from bidding zone A to bidding zone B uses the $NTC_{A>B}$ defined on the respective BZB

Flow-Based: Margin by electrical branch, expressed in N-1 (CNE + Contingency)

F_{max} : thermal capacity of the electrical branch

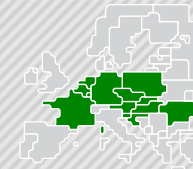


Allocation: optimizes exchanges by considering how much RAM each exchange uses on each CNEC (relationship = PTDF)

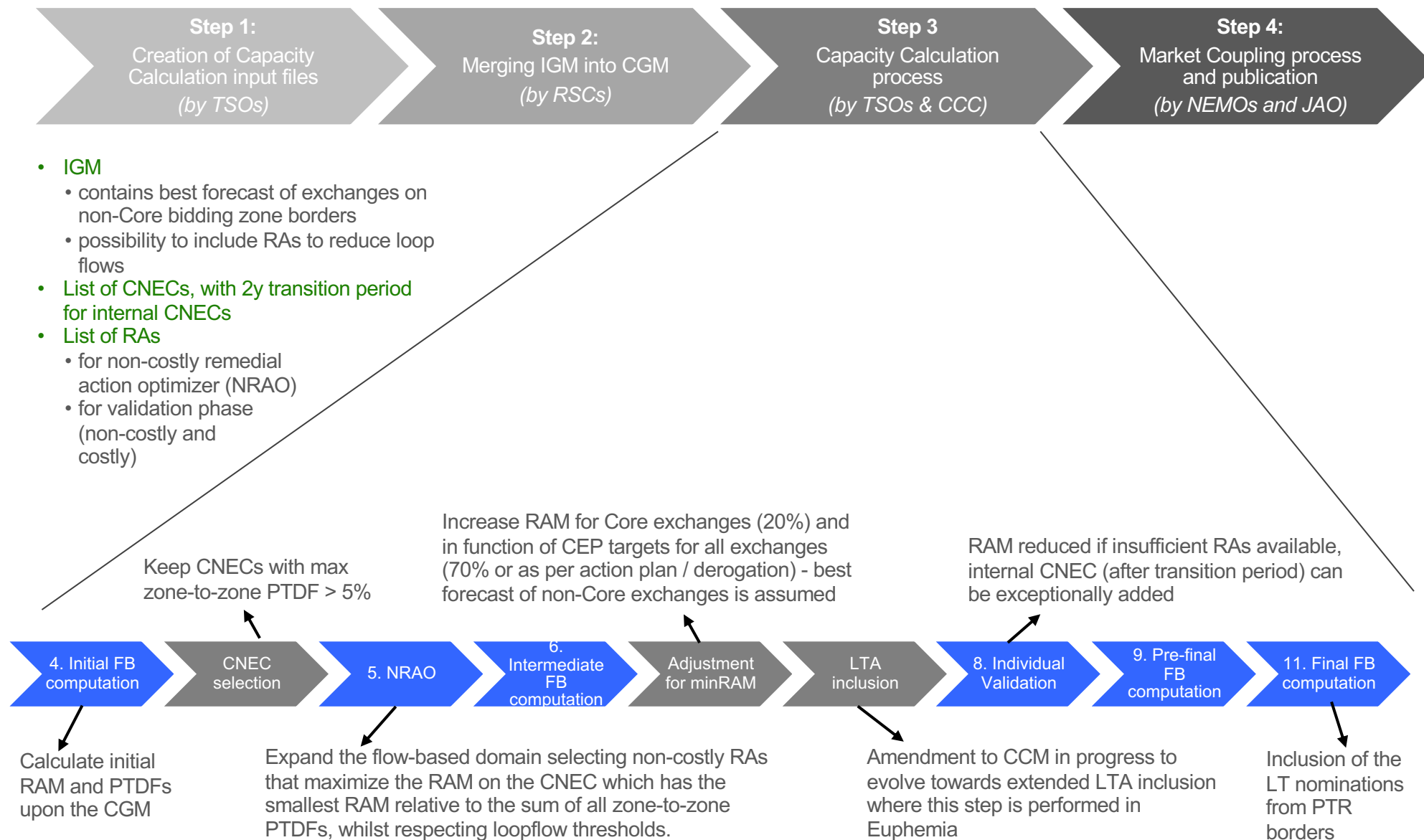
* And minimum 70% for all market exchanges (Core and non-Core) – subject to different values according to national action plans or derogations

2. Core FB Day Ahead Capacity Calculation & Market Coupling

S.VANCAMPENHOUT

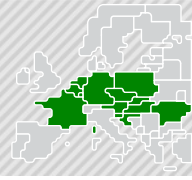


Core FB DA CC methodology 2/4



2. Core FB Day Ahead Capacity Calculation & Market Coupling

S.VAN CAMPENHOUT

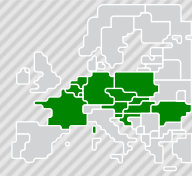


Core FB DA CC methodology 3/4

FB DA CC process timings

Process step	Day	Target start time	Target end time	Critical End Time	Sub-process	Non Core TSOs	Core TSOs	CCC	SAP	Merging Entities
1	D-9	00:00	19:00	21:50	D-2 merging preparation	(X)	X			X
2	D-2	19:00	20:00	23:00	D-2 merging	(X)	X			X
3	D-9/D-2	00:00	21:00	00:00	Initial data preparation & gathering		X	X		X
4	D-2	21:00	21:30	00:30	Initial FB computation		(X)	X		
5	D-2	21:35	00:35	03:30	Remedial Action optimizations & selection			X		
6	D-2/D-1	00:35	01:00	03:55	Intermediate FB computation			X		
7	D-1	01:00	02:00	04:25	Coordinated Validation		X	X		
8	D-1	02:00	07:15	08:25	Individual Validation		X	X		
9	D-1	07:30	08:00	09:10	Pre-Final data preparation / Pre-Final FB computation			X		
10	D-1	08:00	09:30	11:00	Final data gathering		X			
11	D-1	09:30	10:00	11:30	Final FB computation			X		
12	D-1	10:00	10:15	11:45	Shadow Auction ATC computation		X	X		
13	D-1	10:15	11:50	14:50	Congestion Income Allocation		X	X		

2. Core FB Day Ahead Capacity Calculation & Market Coupling



Core FB DA CC methodology 4/4

RAM before validation is the maximum of 3 components

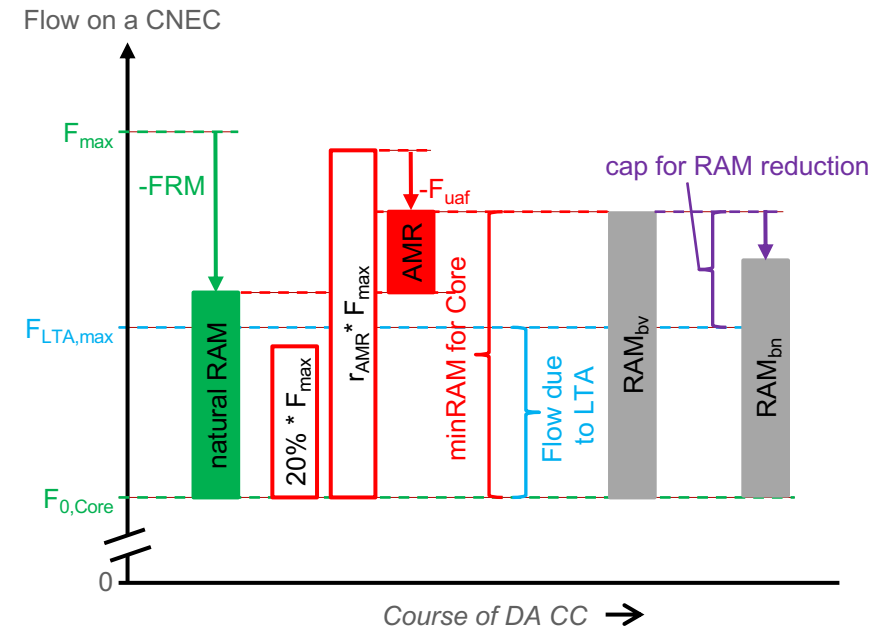
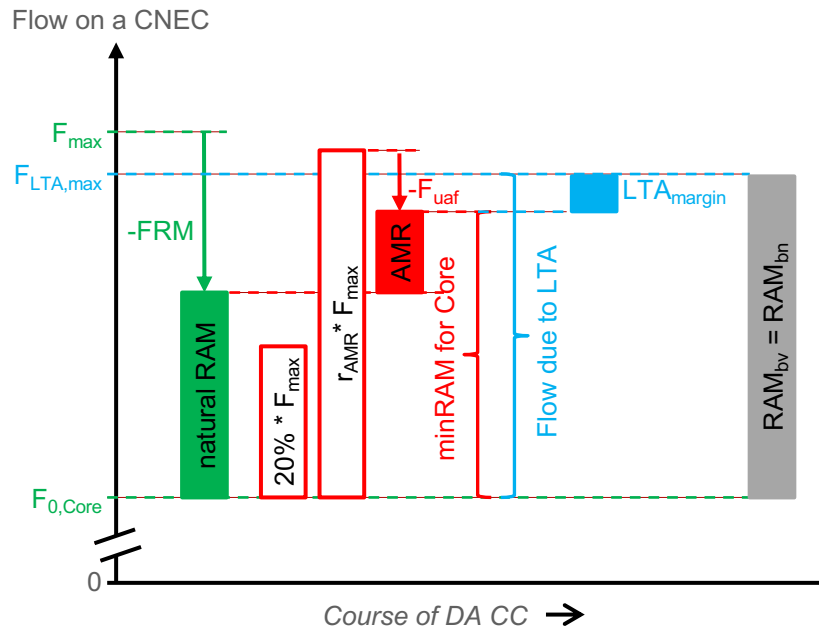
- **Natural RAM**
 - outcome of intermediate computation
- **minRAM for Core**
 - i.e. share of total minRAM that is attributed to exchange among Core bidding zones
 - itself the maximum of 2 options: $20\% * F_{\max}$ and $r_{\text{AMR}} * F_{\max} - F_{\text{uaf}}$
 - (only) if minRAM > natural RAM, the gap is filled by AMR
- **Flow due to LTA**
 - (only) if $F_{\text{LTA,max}} - F_{0,\text{Core}} > \text{natural RAM} + \text{AMR}$, the gap is filled by $\text{LTA}_{\text{margin}}$

In these charts, all components shown are positive. In reality, several of them can be negative ($F_{0,\text{core}}$, natural RAM, F_{uaf}).

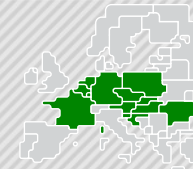
r_{AMR} : 70% or target according to action plan / derogation

F_{uaf} : unscheduled allocated flows i.e. the flow on a CNEC resulting from the best forecast of exchanged on non-Core bidding zone borders

RAM may be reduced during the validation phase, yet respecting LTAs as boundary



2. Core FB Day Ahead Capacity Calculation & Market Coupling



Capacity Calculation systems in internal and external // run

To implement Core Flow based, there are various systems created to facilitate computing the Flow based parameters in line with the Core CCM

These tools must be developed, tested, integrated and validated prior being able to gain experience during the internal //run and with (scheduled) iterations become more mature and stable to ensure reliable results

There are four main modules/systems that are important in this regard

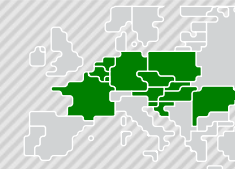
1. **Core Capacity Calculation Tool (Ccct)** – managing the processes and Flow based computations
2. **Common Grid Merging** – Merging of Individual Grid Models into a Core CGM
3. **Net Position Forecasting** - creating forecasted Net Positions of Core used in e.g. CGM & Base Case Improvement
4. **Non-Costly Remedial Action Optimizer (NRAO)** – optimizer for available non-costly remedial actions available

The internal // run was re-started in February 2020 with 1st versions of all systems (except NRAO) and since mid-September Core TSOs aim to finish the computations for 7/7 BDs.

In preparation of the external // run, latest versions of systems are now being deployed in the internal // run involving the TSOs operational departments

- At this stage NRAO is not available yet in the internal // run. This means there is no experience yet with NRAO and the chances are that too limited experience in testing is gained prior the external // run.

2. Core FB Day Ahead Capacity Calculation & Market Coupling



External // run approach 1/4

Main principle of External parallel run

- Compute every day, as in real operations, the transmission capacity domain and on a weekly level the resulting market outcomes (based on production* order books via MRC and 4MMC operations**)
- Allowing Project parties, Market participants, NRAs and others interested a better understanding and a greater confidence into the methodology of calculation and allocation of cross-border capacities

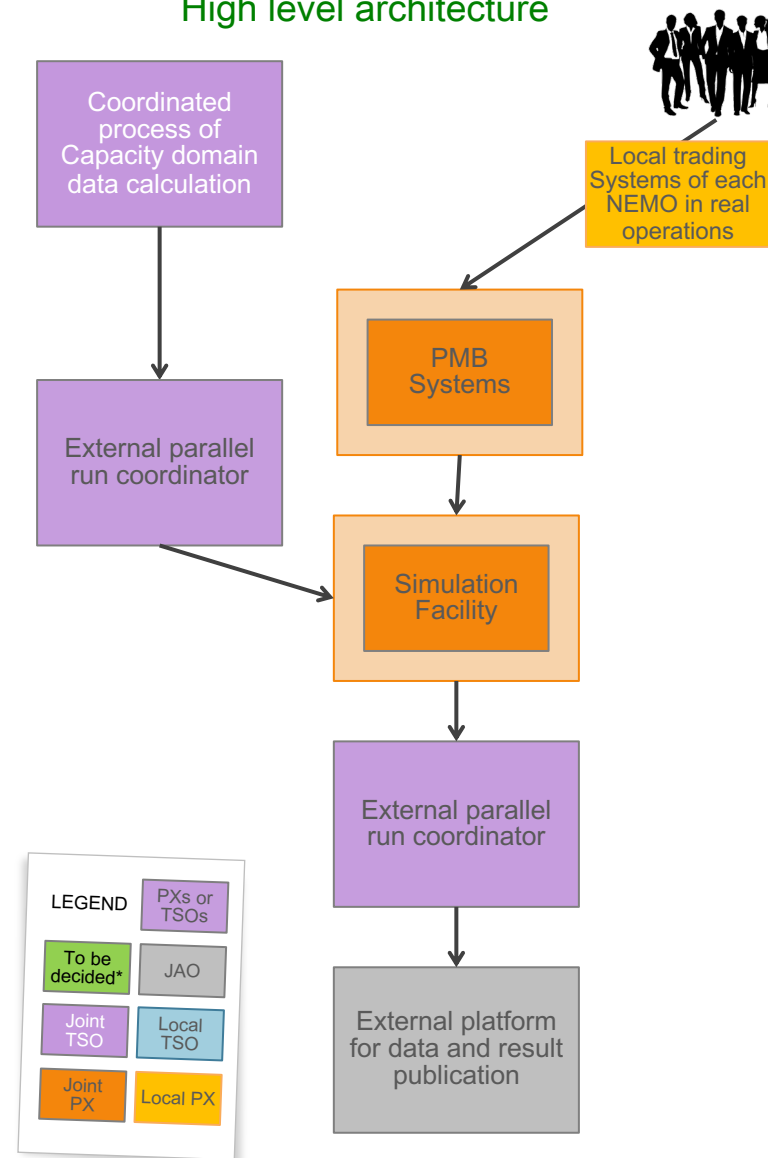
Content of External // run action plan

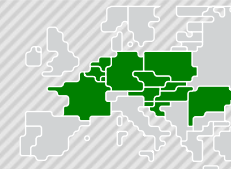
- Detailed organization of external parallel run,
- Detailed day to day process including responsible parties,
- Required inputs, outputs, data format
- Final reporting to Core FB MC JSC as input for Go-Live decision

*Orders entered into each separate NEMOs LTS are also used for simulation purposes with use of Simulation Facility. There will be no separate bidding process for external parallel run by market participants

** In the moment of reporting there was no clear go-live window announced for Interim Coupling project

High level architecture





Capacity calculation

- Core TSOs system will produce capacity data daily and send it to JAO. Afterwards JAO will publish this information on JAO's website and forward it to external parallel run coordinator

Explicit DA nominations

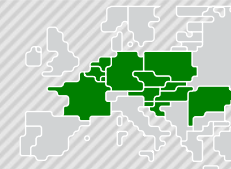
- When comparing the results of current market and future market using FB domain data the comparison will have to take into consideration the fact that some of the borders between bidding zones are not yet coupled, i.e. explicit DA trading and nomination is active.
- As first phase of external parallel run will be executed with MRC and 4MMC not yet coupled, meaning explicit borders will be DE-CZ, AT-CZ, DE-PL, PL-CZ, PL-SK, AT-HU and HU-HR.
- After ICP go-live the only remaining explicit border will be HU-HR

Simulation MC Results Calculation

- The operation of Simulation Facility on a weekly basis will be done by external parallel run coordinator. Party acting as external parallel run coordinator will start with post processing task, perform simulation MC result calculation and finish with providing results to JAO sFTP.
- Due to restrictions of the Simulation Facility it only is possible to run the simulation with two weeks delay.
- The simulation will last approximately 17 minutes per day simulated.
- In order to secure weekly operation of external parallel run parties shall secure resources for the provision of input data and analysis of output data on a weekly level. For this purpose it is foreseen that the role will be taken by parties on rotational principle
- Parties nominated for external parallel run coordinator: BSP, ELES, HUPX, OTE, OPCOM.

2. Core FB Day Ahead Capacity Calculation & Market Coupling

M. PREGL



External // run approach 3/4

Publication of simulation MC results to MPs

- The external parallel run coordinator will provide the raw sub-set of the results (net positions, prices) to the JAO sFTP, and JAO will make the results available to MPs via JAO website.

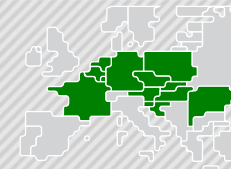
MC Results analysis

- KPIs that have been agreed with NRAs are then computed. It is intended to share these KPIs also with market parties during the external // run

KPI	Responsibility INT // run	Responsibility Ext // run
	TSOs' adjustments after validation	
1	Average maximum AMR per CNE per BD	TSOs (Capacity Calculation)
2	Average maximum AMR per TSO per BD	
3	Average maximum AMR+LTA margin per CNE per BD	
4	Average maximum AMR+LTA margin per TSO per BD	
5	Share of timestamps with intervention per TSO	
6	Total IVA and CVA applied per MTU for each CNE affected by TSO intervention	
	Market impact assessment	
7	Most often pre-solved CNECs (top 20)	TSOs & NEMOs (Market Coupling)
8	Most limiting CNECs (top 20)	
9	Clearing prices, price spread and price convergence	
10	Top 20 CNECs with highest average non-zero shadow prices	
11	SDAC and Core social welfare	
12	Number of Paradoxically rejected blocks (PRBs)	
	Power system impact analysis	
13	Min/max NPs per BZ hub	TSOs (Capacity Calculation)
14	Max overloads at MCP per TSO per BD	
15	RAM before and after RAO	
16	The average sensitivity of RAs per TSO	
	Non-Core exchanges	
17	Delta of non-Core exchanges per border	TSOs (Capacity Calculation)

2. Core FB Day Ahead Capacity Calculation & Market Coupling

M. PREGL



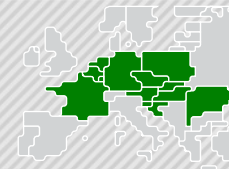
External // run approach 4/4

All the interested market participant may use following communication channels.

- Core Consultative Group mailing list
 - The update on Core FB MC and Core CCR will always be shared through the Core Consultative Group mailing list.
 - All market parties interested in this development are invited to register by sending an email to CoreCG@magnus.nl.
- JAO website
 - News and updates in the Core FB MC will also be published on the individual website of parties participating in the project and on the dedicated website section on JAO website:
<http://www.jao.eu/support/resourcecenter/overview?parameters=%7B%22IsCore%22%3A%22True%22%7D>
 - Periodic updates on the developments in Core CCR will be published on Core CCR's dedicated webpage:
www.entsoe.eu/major-projects/network-code-implementation/cacm/core-ccr/Pages/default.aspx
- Core Q&A forum
 - feedback and questions to Core FB DA MC parties can be addressed via **Q&A forum on the JAO website**
 - Link: <http://coreforum.my-ems.net/>
 - Place for Market Participants to ask questions about the External Parallel Run and other relevant topics
 - All questions will be forwarded to and answered by relevant experts.

2. Core FB Day Ahead Capacity Calculation & Market Coupling

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Publication tool 1/3

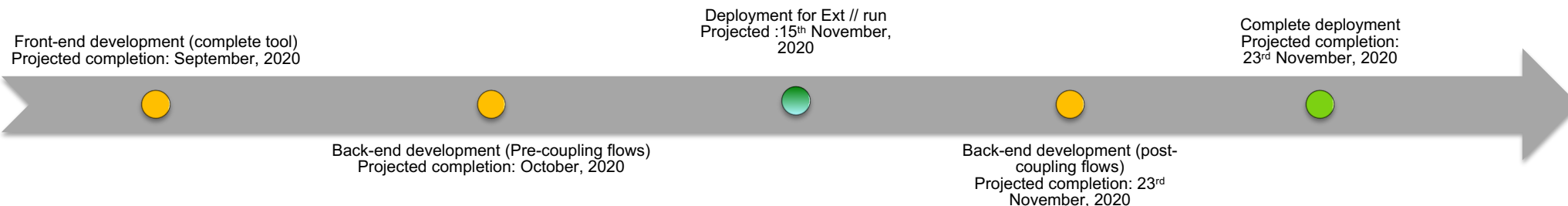
Reminder

- With the introduction of the Core FB MC project, it was concluded that the current existing Excel-based publication tool required an update towards a modern, robust solution.
- A survey was launched early this year to gain insight on MP expectations and use cases to ensure a well-developed solution.
- Core TSOs and JAO provided MPs with materials by email during last September

Main improvements compared to current tool

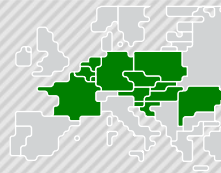
- Web based solution
- Greater performance stability
- Download/export functionality (XML/CSV)
- Supporting web services

Foreseen timeline and developments



2. Core FB Day Ahead Capacity Calculation & Market Coupling

S.RAHMAN



Publication tool 2/3

Mock screen updates

Core market view:

Core MarketView

1 Check volume

Here you can check the simultaneous execution of trading volumes of the market involved in the Core Market Coupling

Hub-to-Hub
Exchanges

	Hub-to-Hub	Test 1
AT» CZ	0	Trades feasible
AT» HU	0	
AT» SI	0	
BE» FR	0	
CZ» PL	0	
CZ» SK	0	
DE» AT	0	
DE» BE	0	
DE» FR	0	
DE» NL	0	
DE(50Hz)» CZ	0	
DE(TenneT)» CZ	0	
HR» HU	0	
HR» SI	0	
HU» RO	0	
HU» SK	0	
PL» DE(50Hz)	0	
PL» SK	0	
NL» BE	0	
NL» FR	0	

2 Max volume

Here you can find the maximal trade volumes (MWh/h) which can be physically transported between two Hubs under the condition that no other trade is executed between other Hubs

	Direction ►	◄ Direction
AT» CZ		
AT» HU		
AT» SI		
BE» FR		
CZ» PL		
CZ» SK		
DE» AT		
DE» BE		
DE» FR		
DE» NL		
DE(50Hz)» CZ		
DE(TenneT)» CZ		
HR» HU		
HR» SI		
HU» RO		
HU» SK		
PL» DE(50Hz)		
PL» SK		
NL» BE		
NL» FR		

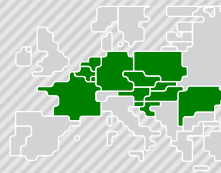
Hub-to-Hub
Positions

	Hub positions	Test 1	Test 2
AT	0	OK	Trades feasible
CZ	0		
BE	0		
DE	0		
DE(50Hz)	0		
DE(TenneT)	0		
FR	0		
HR	0		
HU	0		
NL	0		
PL	0		
RO	0		
SI	0		
SK	0		

	Export	Import
AT		
CZ		
BE		
DE		
DE(50Hz)		
DE(TenneT)		
FR		
HR		
HU		
NL		
PL		
RO		
SI		
SK		

2. Core FB Day Ahead Capacity Calculation & Market Coupling

S.RAHMAN

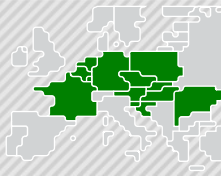


Publication tool 3/3

Mock screen updates

Core MarketGraphs



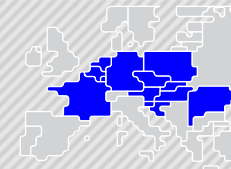


Question and Answers Session



3. Long Term Capacity Calculation

J.FERNANDEZ



Status and public consultation

Core TSOs launched a public consultation on the Long-Term Capacity Calculation Methodology pursuant to article 10(1) of FCA – the consultation closes on October 16th

Context

- A previous public consultation took place in the early summer 2019
- In August 2019, Core TSOs did not find a qualified majority to submit a methodology and triggered the escalation process with ACER, EC and NRAs
- Since then, frequent exchanges took place among involved parties in order to identify a way forward. Most discussions revolve around the definition on how the capacities will be determined in an interim period until implementation of a target solution, for which there was less controversy

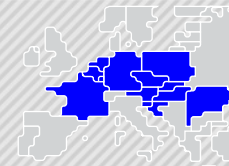
Outcome

- Core TSOs agreed, under the guidance of ACER and NRAs, for the target solution to implement a [capacity calculation methodology with a flow-based approach, enabling a flow-based allocation](#)

Public Consultation

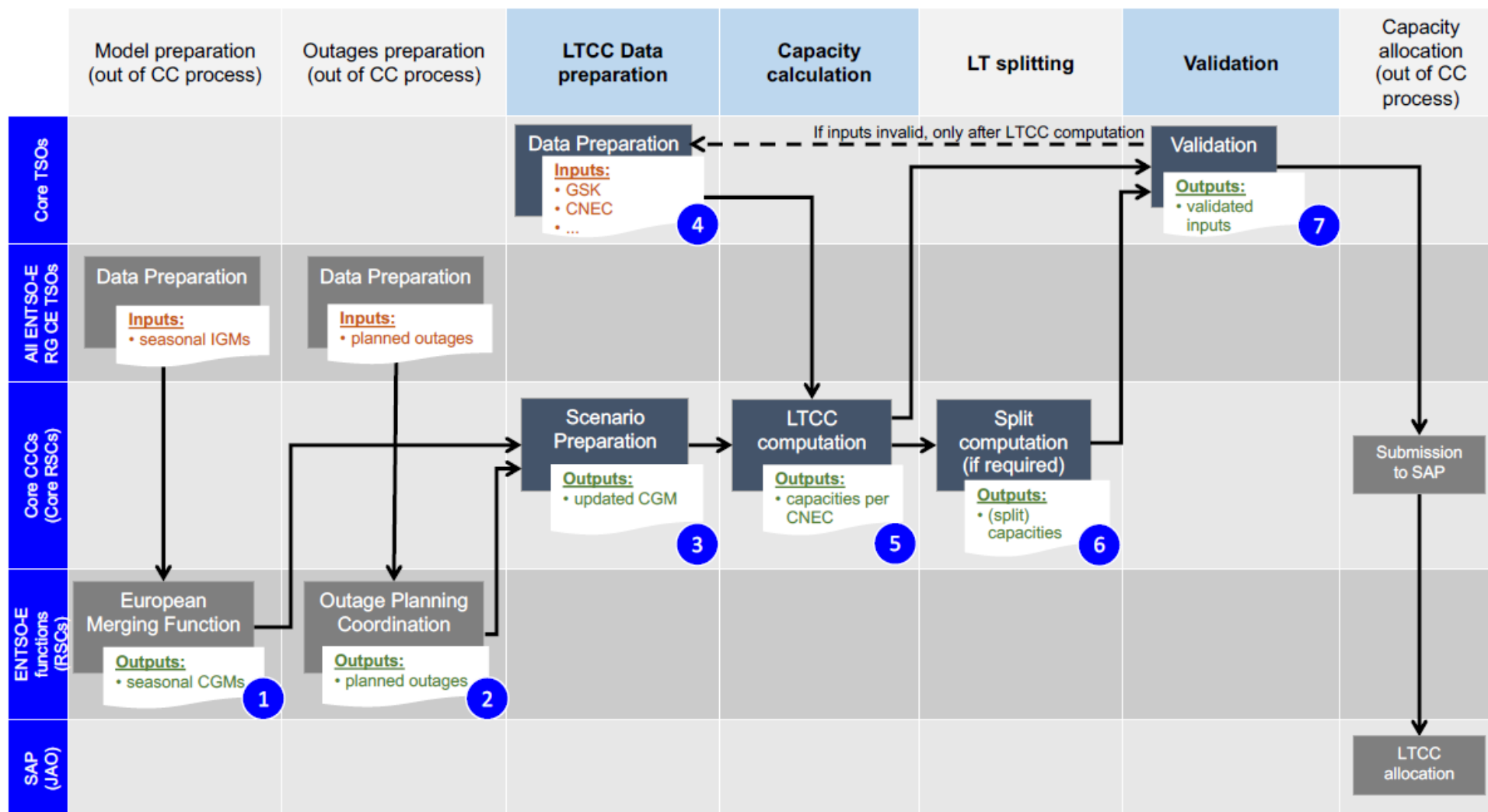
- The methodology submitted for Public Consultation can be summarized as follows:
 - Parameters are computed via a scenario-based approach, using the Yearly Reference Scenarios
 - TSOs inputs are needed: GSK, CNEC selected according to a PTDF threshold of 5%, Reliability Margin similar to DA, Allocation constraints.
 - The process is linked to the OPC for consideration of maintenance plan, allowing flexibility for TSOs to include additional plan outages for increasing the robustness of the scenario
 - Optional application of Remedial Actions for alleviating possible constraints
- [A high-level process description of the LT CCM can be found on the next slide](#)

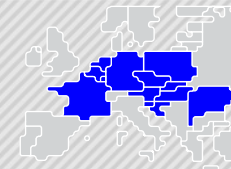
3. Long Term Capacity Calculation



High Level description of the methodology 1/2

Core LTCC High Level Business Process (FB LTCC)



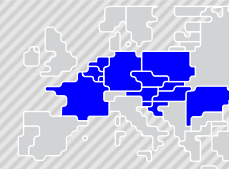


The submitted methodology for Public Consultation is designed to allow Flow Based Allocation:

- The Yearly Flow based parameters will be computed for 24 timestamps (2 per months).
- The Monthly Flow based parameters will be computed for 8 – 10 timestamp (2 per week).
- The computed parameters will be composed by zone-to-zone PTDFs for each bilateral exchange direction and Reliability Available margin for each CNEC for each timestamp.
- The methodology integrates the Min RAM parameter, which will allow to cover cover undue discrimination concern and potential quality issues with the base case.
- The Flow-based approach implies the following:
 - Capacities available on the different grid elements are not anymore split ex-ante to derive NTC values;
 - Instead, there will be a coordinated auction mechanism considering flow-based constraints and considering the bids of the market parties. This input will determine the flow-based allocation on the different borders. The design of this auctioning approach is not part of the consulted methodology
 - There is impact on other methodologies expected:
 - EU HAR following article 51 of the FCA guideline;
 - Firmness regime following article 61 of the FCA guideline;
 - LT splitting rules following article 16 of the FCA guideline;
 - LT product design following article 31 of the FCA guideline;
 - CZCA economic efficiency following article 42 of the EBGL guideline; and
 - The LT allocation process regimes.

3. Long Term Capacity Calculation

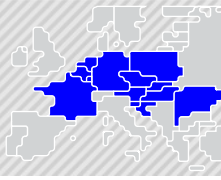
J.FERNANDEZ



Implementation

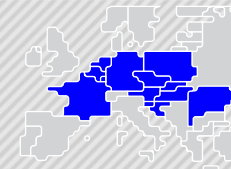
Implementation

- The Implementation timeline for LT capacity calculation is foreseen within 3.5 years to 5 years
 - This will allow the Core TSOs and CCC to implement the tooling for the flow based parameters computation;
 - This is also meant to improve data quality input by experiencing, as this data quality will be key for deriving the offered capacities.
- Such implementation timeline will also allow:
 - An internal parallel run to allow the Core TSOs and CCC to test and improve the tooling;
 - An external parallel run to allow the Single Allocation Platform and market parties to adapt, test and improve the tooling for Flow Based allocation.



Question and Answers Session





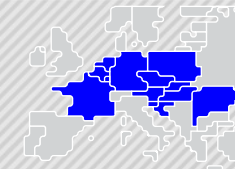
Other recent developments

Beyond the detailed updates given for the previous topics, the following developments took place in the Core CCR

- **CACM:** Core TSOs submitted an amendment of the methodology pursuant to CACM Art. 44 related to the **shadow allocation rules**. Shadow results will be published at 14:00 instead of 13:50 in order to give more time to Euphemia algorithm.
- **CACM:** Core TSOs recently received a shadow opinion on the amendment of the day-ahead capacity calculation methodology pursuant to Art. 20.
- **FCA:** NRAs approved the splitting rule methodology pursuant to Art. 16
- **FCA:** NRAs approved the amendment of the long term transmission right design pursuant to Art. 31 (switch to FTRs on all borders except HR-SI)
- **EBGL:** NRAs issued a request for amendment for the methodology on market-based allocation process of cross zonal capacity for the exchange of balancing capacity or sharing of reserves pursuant to Art. 41, and for the methodology for an allocation process of cross-zonal capacity for the exchange of balancing capacity or sharing of reserves based on economic efficiency analysis pursuant to Art. 42
- Decision process ongoing with ACER, with involvement of TSOs and NRAs on:
 - **CACM** Art. 74 on cost sharing for redispatching and countertrading methodology
 - **CACM** Art. 35 on coordinated redispatching and countertrading methodology (recent ACER public consultation)
 - **SOGL** Art. 76 on Regional Operational Security Coordination methodology
- Core **flow-based intraday capacity calculation methodology**: implementation project started

5. ACERs consultation on methodologies operational security and RA in Core CCR

H.MARCIOT



Reminder

- ACER launched consultation on methodologies for coordination of operation security and remedial actions in the Core CCR

Market Parties Platform published its reply on the ACER Consultation highlighting a few key messages and crucial issues



Current secretariat:
Union Française de l'Électricité (UFE)
3, rue du 4 septembre, 75002 Paris
www.marketpartiesplatform.eu
andreas.gutthaus@ufe-electricite.fr



Date: September 21st, 2020

Subject: MPP answer to ACER's consultation on two methodologies for coordination of operation security and remedial actions in the CORE CCR

The MPP would like to thank ACER for the opportunity to provide comments on these cornerstone topics for the building of a fully functional internal electricity market based on an increased and efficient cross-border trade, while ensuring the continued and safe operation of the system.

Question 1: Do you consider that Article 35(5) and (6) of the CACM Regulation allows resource providers to make indicative prices/costs?

The MPP considers that, in a market-based environment, the bids of market participants are firm and not indicative: this means that the price put forward is the price that is valid for acceptance of the bid at that very moment (even is the actual delivery is some time later, depending on the bid). To prevent a negative effect on the functioning of the continuous intraday market, which runs in parallel, operators of flexible assets must have the possibility to update redispatching bids until they are effectively activated. There are indeed many reasons to update the firm bids between the start of the coordination process and the effective activation, for example in terms of outages or evolutions in opportunity costs of the resources (whichever they might be: storage, hydro, demand response, etc.).

Aside from the market-based redispatch, which is the preferred approach under Regulation 2019/943, cost-based redispatch is also possible and should be taken into account. The MPP therefore considers that, in case of a cost-based congestion management, the relevant TSO fully or partially forecasts the activation cost and, as it is the one that makes the indication, it should be the one that bears the associated risk. It is essential that the resource provider remains financially neutral and gets remunerated for all its costs.

Question 2: Do you consider that providing indicative prices provides good incentives for economic efficiency and prevents possible manipulations?

Consistent with our answer to the previous question, market parties actually do not provide indicative prices but rather provide firm prices: alike the continuous intraday market, a bid is firm when it gets activated.

In MPP's view, the only remaining indicative prices are those that are used by TSOs in the timeframe between the start of the coordination process and the actual activation. In this process, TSOs might be incentivized to manipulate as they can shift costs to other TSOs. The MPP however believes that this risk can be decreased by shortening as far as possible the coordination process and following a fully transparent methodology. This can be done with direct instructions from the RSCs instead of advises. This would be a good reason for TSOs to act in the spirit rather than the exact provisions of the Electricity Regulation in their cooperation.

Question 3: Who should bear the inherent risks related to differences between indicative and realised costs?

The MPP considers that, in a market-based approach, if a price difference occurs between the moment when the TSO notifies the price to its RSC and the issuance of the actual recommendation by the latter, the risk of price change should be borne by the community of TSOs. Conversely, if a price update occurs after the RSC has issued its recommendation, the relevant TSO should bear the risk of that price difference.

When it comes to a cost-based redispatch approach, the MPP considers that the TSO that makes the forecast should be fully responsible for the price difference as it is responsible for ensuring financial neutrality for the resource provider.

In order to reduce significantly the potential differences between the prices considered by the RSC for the coordination process and the effective activation prices, the MPP suggests resorting to the following measures:

- Make sure that the coordination process triggers a balanced set of remedial actions, without the need to restore balance (at an unknown price at the time of decision) afterwards. This can only be done at RSC level.
- Open systematically (and maybe through a centralized platform) the possibility for market participants to submit standard countertrading bids in each bidding zone to enrich the set of remedial actions under consideration. Those bids could be considered firm between the time of submission and the end of the coordination process (with a specified time). Activating bids would then force the respective market participants to manage the corresponding risks in the intraday markets before its gate closure.

Question 4: Do you agree that cost differences related to volume deviations between recommended and ordered volumes are shared only in case those deviations are agreed or confirmed by all Core TSOs?

The MPP agrees with this proposal.

Question 5: Do you agree that the settlement of cost differences related to volume deviations between ordered and activated volumes is not governed within the Core ROSC methodology and the Core RDCT methodology? If not, how would you propose to govern and define such settlement?

The MPP agrees with this proposal as well.

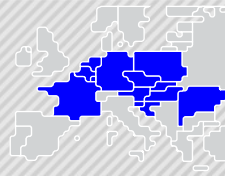
Question 6: Comments on other topics

Overall, the MPP favors a market-based approach for redispatch. As explained above, such an approach reduces incentives for TSOs to shift costs towards each other (such a competition amongst TSOs – be it partly through incentives provided by national regulation – might be seen otherwise in the complex solutions that are defined in many aspects of capacity calculation and allocation). The MPP

deems it therefore urgent that an effective and efficient process is put in place in all capacity calculation regions, and in particular in the Core region, where congestion management is based today on national processes that are possibly discriminating foreign actions against national ones.

The proposal for redispatching and countertrading refers to a process lasting until 2025 because of the important IT developments needed, which is also the very year when the 70% rule should be implemented. The MPP would therefore like to stress the unsatisfying perspective resulting from the combination of many derogations from applying the 70% rule based on the absence of the redispatching and countertrading, on the one hand, and of the many foreseen delays for the flow-based implementation in the whole Core region and in the intraday recalculations, on the other hand. The MPP therefore calls for the elaboration of regulatory solutions featuring transitory measures or intermediary steps until 2025.

Furthermore, the MPP would like to stress the need to coordinate where appropriate redispatching and countertrading actions occurring within the Core region with third countries such as Switzerland. The MPP therefore supports the statement readable in the "Whereas" section of the ROSC Methodology according to which operational security does not end at the EU borders but also involves third-countries that are part of the synchronous area. The RDCT Methodology, however, does not contain any reference to third countries. Considering the high interdependencies between flows in Germany, France and Switzerland, close coordination and sharing of resources would however improve operational security and overall efficiency. The MPP would finally like to underline that cross-border redispatch activations with Switzerland already exist and should not only be maintained but further strengthened. The inclusion of Switzerland in the RDCT coordination is also part of negotiations related to SAFA implementation.



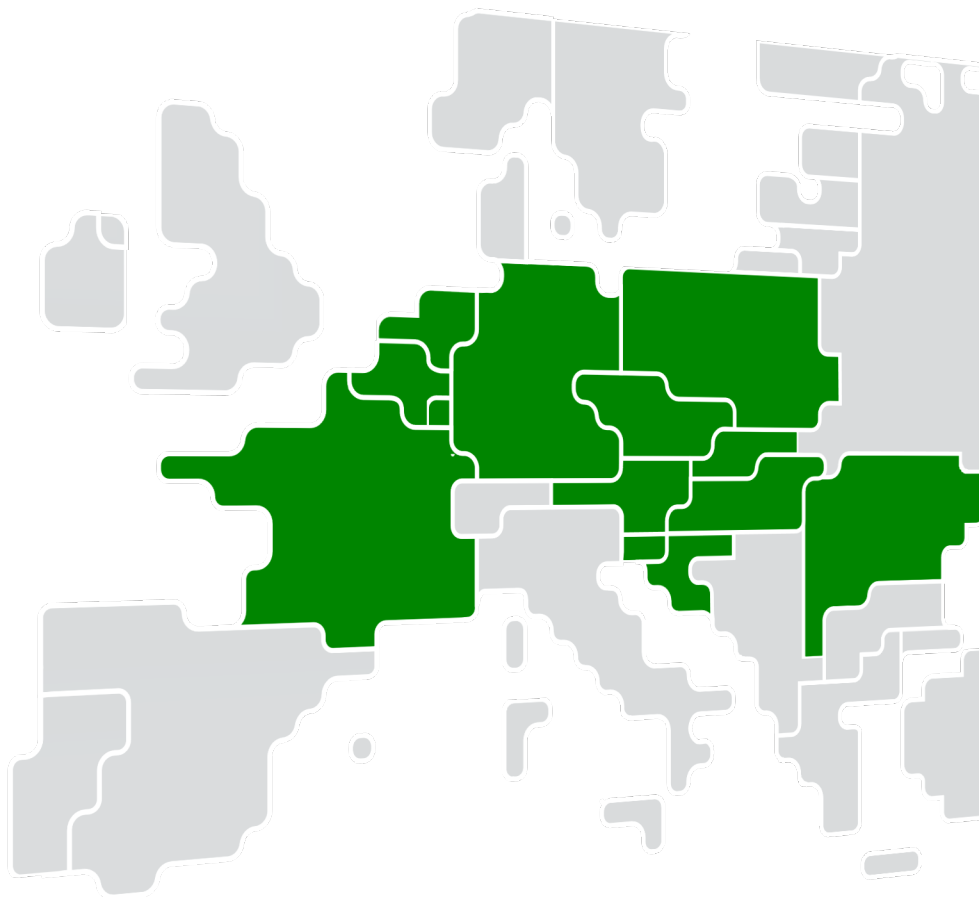
Existing Core communication channels

- **Core Consultative Group mailing list**
 - Register by sending an email to CoreCG@magnus.nl
- **Core section on ENTSO-E website** (e.g. upload of methodologies and reports on public consultations, current status of the Core CCR program, CG minutes, ...):
 - Link: https://www.entsoe.eu/network_codes/ccr-regions/#core
- **ENTSO-E newsletter** informs regularly about updates in the different CCRs (e.g. submitted methodologies, launch of public consultations, ...)
 - Subscription via <https://www.entsoe.eu/contact/>

Q&A forum on JAO website

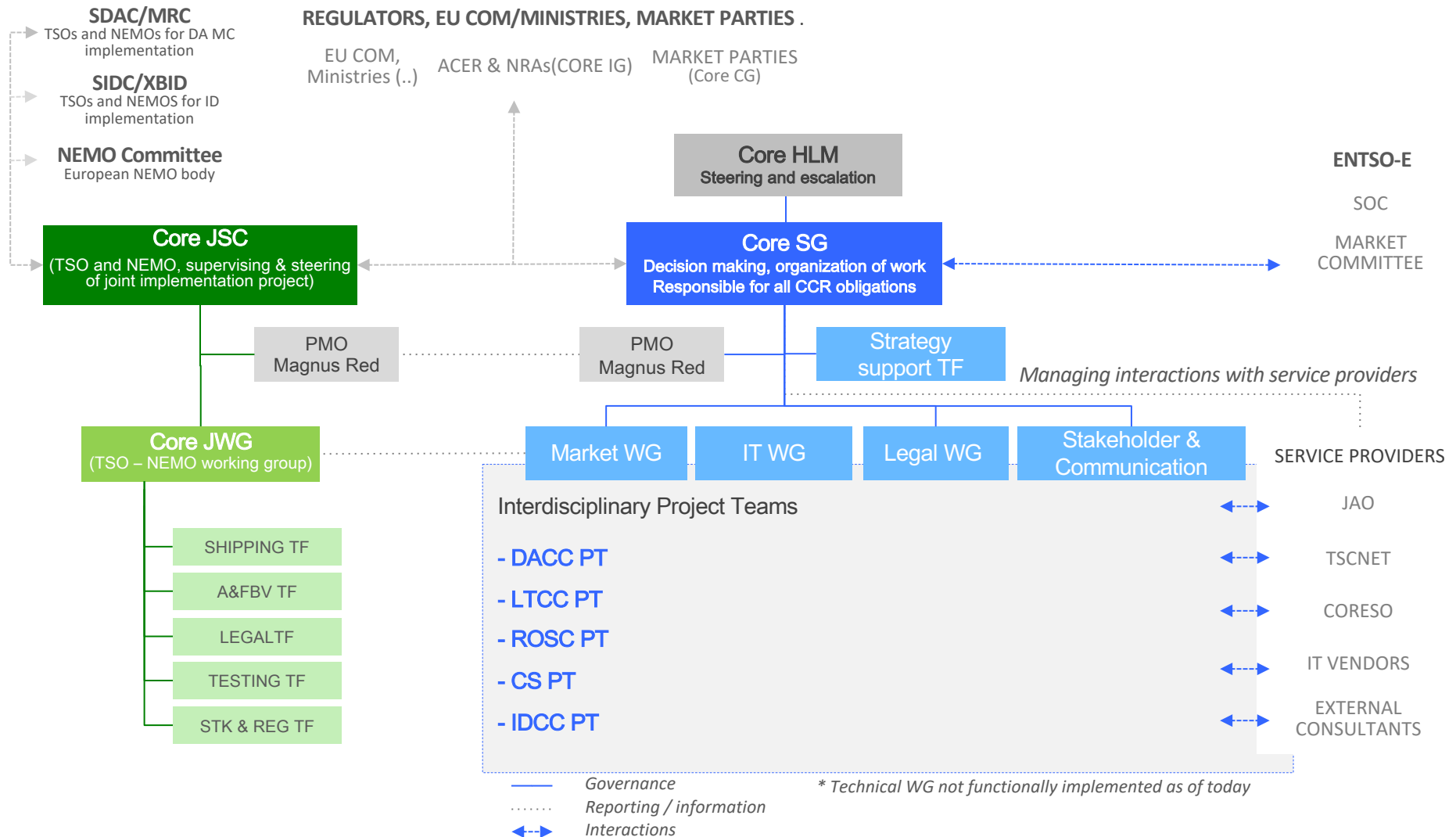
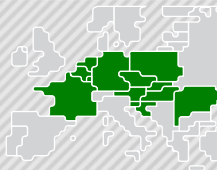
- **Q&A forum on the JAO website** which gives space to Market Participants to ask questions about the External Parallel Run and other relevant topics:
 - Link: <http://coreforum.my-ems.net/>

Appendix



Appendix

Core CCR and Core FB DA MC Governance structure



Market Coupling (TSOs and NEMOs)

Capacity Calculation (TSOs only)