

5.1 Aggregation models – DRESG comments and specific topics

DRESG

6 October 2026

DRESG input/feedback on some results in the first draft

- On 3rd Aug ACER sent a PPT to DRESG with a (confidential) set of results from the first draft for their input and feedback on:
 1. whether these results reflect your view on the implementation;
 2. whether anything is inaccurately represented or missing;
 3. whether there is anything relevant for us to further investigate.
- => 7 DRESG members have sent input/feedback: EUROPEX, All NEMO Committee, Eurelectric, ESMIG, SmartEnl, EU DSO entity and ENTSO-E.

GENERAL COMMENTS (Applicable to both AM and BM)

EUROPEX and All NEMO Committee

- The level of detail currently provided in the overview does not allow for the clear identification and assessment of individual aggregation models, baselining methods, or their specific implementations.

AGGREGATION MODELS

Eurelectric

- Provides overview of IE DSO products where aggregators are allowed to participate => [Checking with CRU and to include potential clarifications in the report](#)

ESMIG

- Suggests to distinguish metering solutions according to the function and intended use of their measurement data. => [To be discussed](#)
- Notes that a device qualifying as a DMD for flexibility purposes should not automatically be regarded as equivalent to a utility-grade meter for supply or settlement purposes and suggests to make this distinction more explicit in the aggregation-model classification => [Agree \(to be confirmed with the PT\) and amend the report accordingly](#)

SmartEn

- Need for **clarifications**: not entirely clear where the line between **BaU and pilot** is; counting of **implementations** is not very informative unless it is combined with collection of data about the actual **use** of the different implementations. => To be discussed
- Aggregation models **classification and mapping**:
 - a bottom-up series of questions may be a more effective way of classifying models;
 - surely every market has implemented the "**Integrated**" model at least for day-ahead and intraday; => To be discussed with NRAs and today
 - whether there's an implementation in a country that requires an **agreement** is less interesting than whether that's the **only option** (it's not usually possible for aggregators and suppliers to reach agreements); => We will try to have a figure on that.
 - **IE** has implemented an uncorrected model as BAU, and is currently **proposing** to introduce another uncorrected model but with elements of central settlement, followed eventually by a corrected central settlement model. => Clarified (some aspects also during summer) with **CRU** (report to be amended)
- **Financial transfer**: => To be discussed with NRAs
 - puzzled by the use of the **DA price** for financial transfer: makes sense where the customer is on a tariff based on the DA price, but not in other cases, as prudent suppliers do not source most of their energy from the DA market, without **hedging**;
 - cannot understand how a financial transfer at the **imbalance price** could possibly be justified.
- **Financial compensation**: what is the **justification** for setting a floor on the compensation price at zero on **HR**; it would be good to investigate the **administrative costs**, and what mechanisms are in place to ensure that they are reasonable.

EU DSO Entity

- Focus on the **independent aggregator models** because these arrangements should be in the legislation; models that require an (voluntarily) agreement between the aggregator and supplier/BRP of the connection are always possible, but are not relevant for European legislation (integrated, split supply, broker). => To be discussed
- The wording about **sub metering** is confusing. Usually, a sub-meter is a meter behind the main (regulated) meter. The **supply** of electricity takes place at the main meter. A sub-meter measures usually a part of the installation behind a main (regulated) meter. => To be discussed
- Remarks/questions on the **classifications of the aggregation models**, in particular, corrected model and with/without central settlement. => Notes taken (aim to clarify concepts in the report)
- **NL** not represented correctly (specific comments per model and market). => Some clarifications were already provided by ACM in summer (that were not included as updated figures in the slides shared with DRESG); additional points to be checked with ACM
- Questions/remarks on **BE's** data in the figures. => Some clarifications were already provided by CREG in summer (that were not included as updated figures in the slides shared with DRESG); additional points to be checked with CREG
- General comments on **possible combinations of AM and markets**. => To be discussed
 - There is no contractual (and uncorrected model in the day-ahead and intraday possible.
 - Split supply, integrated, broker (and contractual model) is always possible in the BAU (but not relevant).
 - There is no aggregator model possible in the day-ahead and intraday.

ENTSO-E

- Clarify the **scope of aggregator (as a service provider)** to ensure consistency with the DR NC. => To be discussed today and further with the NRAs
- **Spain**
 - Additional model for Spain in “**planned or under discussion/consideration**” maturity level (**central settlement corrected** for aFRR, mFRR and balancing-other, with financial transfer price at day-ahead price) => To be clarified with CNMC
- **France**
 - The aggregation model for **DSO congestion management** in France should not appear in status “planned” as it is more **mature** (local flexibility mechanisms and associated contractual arrangements are already implemented). => To be clarified with CRE
 - The **financial transfer prices** in France are not exclusively based on regulated retail tariffs; depending on the mechanism and customer category, market-based references or bilateral contractual prices may also apply. This diversity could be more explicitly reflected in the overview. => To be clarified with CRE and amend the report (the aim is to also include the description of the French case for the calculation of the financial transfer price, so it will be more detailed)

Aggregation models

Clarifications on maturity and implementations

Market/service	Product	Other
Day ahead	NAP	
Intraday		
Balancing	FCR	NAP
	aFRR	
	mFRR	
	other	specify
TSO congestion management	specify	
DSO congestion management	specify	

Implementation status

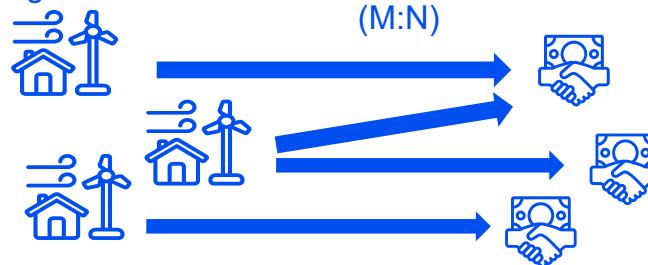
- Implemented/**business as usual approach**: fully implemented and being applied as normal business*.
- Implemented/trial stage (**pilot project**): implemented but only in a trial stage or a pilot project.

Comment: not entirely clear where the **line** between **BaU** and **pilot** is.

- Indeed, this was raised also in our recent discussion with NRAs for next year's report. In the one on AM&BM we cannot change now the data received, but for the next one we are discussing about providing **additional granularity**.

An aggregation model or baselining method (BM) maybe applicable to more than one markets, so the number of **aggregation models and BM implementations** is more than the **number of aggregation models and BM implemented**.

Aggregation models / BM



Comment: counting of **implementations** is not very informative unless it is combined with collection of data about the **actual use** of the different implementations.

- Agree that actual use is the important aspect. The “counting” of implementations aimed at showing also the **“coverage”** of different markets. But let's discuss if it makes sense.

Does this address the concerns?
Any other proposed way forward?

* even if some elements – like rebound effects for example – have not been decided/implemented yet

Aggregation models: main elements

Comments from DRESG members

- Clarify the **scope of aggregator (as a service provider)** to ensure consistency with the DR NC.
- Focus on the **independent aggregator models** because these arrangements should be in the legislation; models that require an (voluntarily) agreement between the aggregator and supplier/BRP of the connection are always possible, but are not relevant for European legislation (integrated, split supply, broker).
- General comments on **possible combinations of AM and markets**.
 - There is no contractual (and uncorrected model in the day-ahead and intraday possible.
 - Split supply, integrated, broker (and contractual model) is always possible in the BAU (but not relevant).
 - There is no aggregator model possible in the day-ahead and intraday.
- Surely every market has implemented the **"Integrated"** model at least for day-ahead and intraday.

Aggregation: definition and relevance

According to the definition in Article 2(18) of the Electricity Directive:

“aggregation’ means a function performed by a natural or legal person who combines multiple customer loads or generated electricity for sale, purchase or auction in any electricity market;”

- This definition is a rather broad one; the intention is to have a **common understanding** on which aspects of this term are relevant for our discussions in the context of this report, first, and then on potential European rules on that.

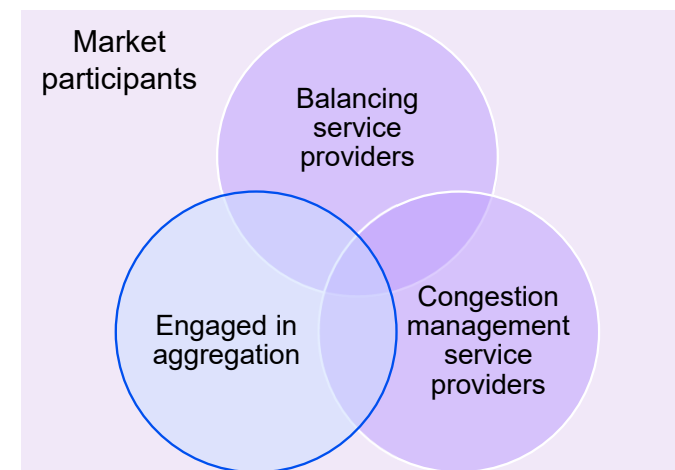
If it is (effectively) anyone, why do we need to further specify it?

- Aggregation is the only way for small-scale demand to participate in the markets.
- And we need to ensure that (according to the requirements of [Article 17\(1\) and \(2\) of the Electricity Directive](#)) their participation in the electricity markets is managed in a “non-discriminatory manner” (alongside producers).

Independent aggregator

- Based on the abovementioned definition, we understand that the function of aggregation can be performed by **any market participant**, and it does not cover only the function performed by an independent aggregator*.
- Therefore, the **description of the aggregation models** should not be limited to what is considered independent aggregator models.

Function vs Role



Do you agree with this understanding?
Any other comments or remarks?

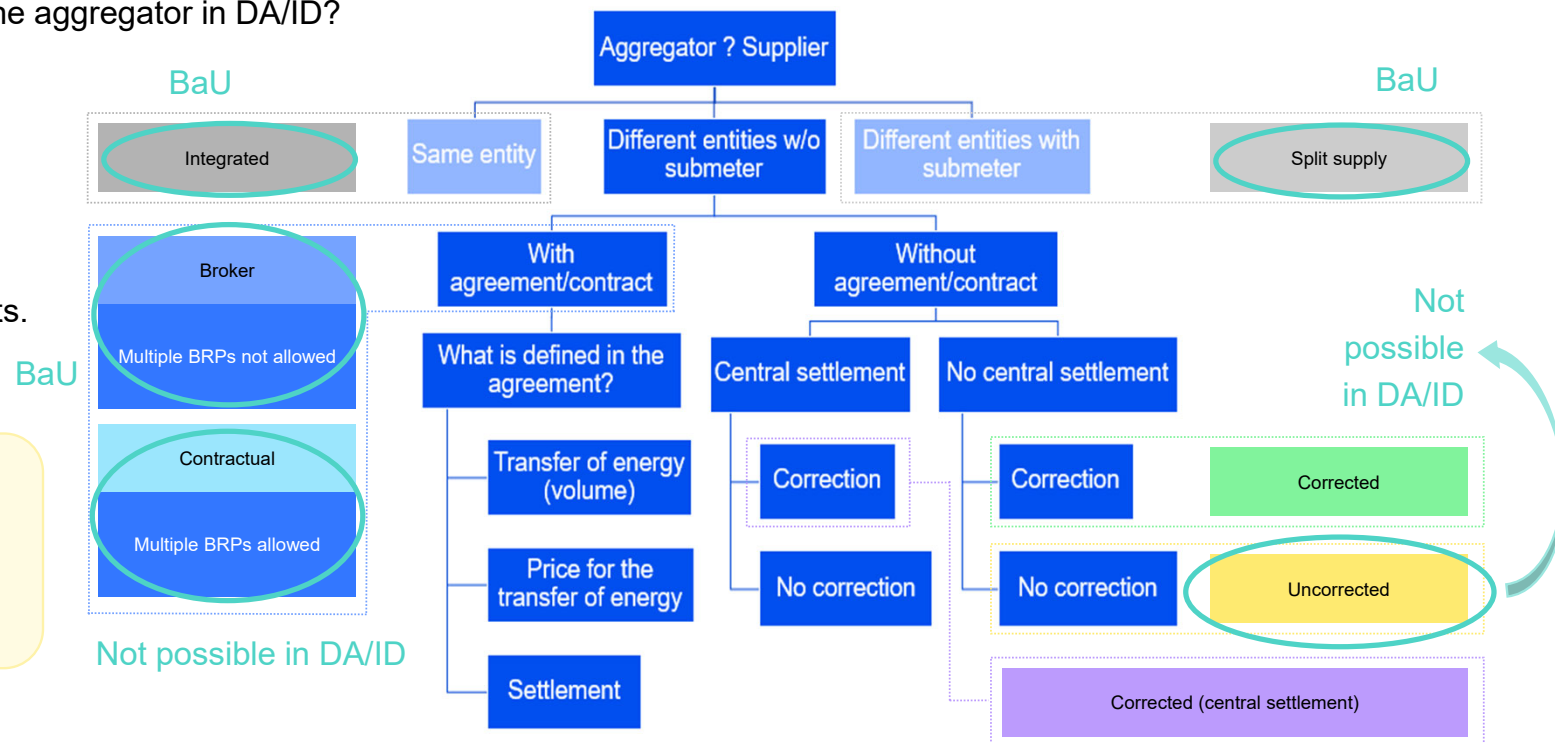
* According to the definition in Article 2(19) of the Electricity Directive: ‘independent aggregator’ means a market participant engaged in aggregation **who is not affiliated to the customer’s supplier**;

Aggregator models in different markets

When reading “*market participants engaged in the aggregation of demand response*” in combination with “*who combines multiple customer loads or generated electricity for sale, purchase or auction in any electricity market*”, we could end up in the conclusion that **any BRP** with customers in its portfolio is an aggregator in day-ahead (DA) and intraday (ID) markets.

- Is this how you understand the aggregator in DA/ID?

As presented at the beginning, some DRESG members had comments on **never/always possible** combinations of aggregation models and markets.



What do you think about the ‘not possible’ and BaU combinations marked in the figure?
Do you have additional ones to suggest?

Meters, submeters and DMDs

Comments from DRESG members

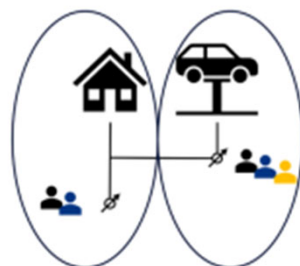
- Suggests to **distinguish** metering solutions according to the **function** and **intended use** of their measurement **data**.
- The wording about **sub metering** is **confusing**. Usually, a sub-meter is a meter behind the main (regulated) meter. A supplier and BRP are registered at the main meter (an accounting point). This is where the **supply** of electricity takes place. A sub-meter measures usually a part of the installation behind a main (regulated) meter. One **connection** can have **one or more main/regulated meters**.

Agree with all the points made. The problem is with the word “usually” above.

One metering point with a supplier and BRP_{supp} allocated to it (No aggregation)

One (sub-)metering point with another supplier being a service provider and BRP_{sp} allocated to it (Integrated Model)

The possibility to have more than one supplier is based on Directive (EU) 2019/944 Art. 4 and unrelated to aggregation.



A **metering device** can fall into one of the following three cases:

1. **Main meter.**
2. **Sub-meter** that serves for splitting the **supply**.
3. Sub-meter, or DMD, or any other metering device **only relevant for service provision**.

Do you agree with this understanding?
Any other comments or remarks?

One metering point with a supplier and BRP_{supp} allocated to it.

One (sub-)metering point only relevant in case of service delivery. Same supplier and BRP_{supp} allocated to it. Aggregator and BRP_{ag} take responsibility for the deviation while active. Deviation measured in (sub-)metering point. (any model with two BRP and different SP and supplier)





Relevant for our analysis.

Explaining the classification

1st design choice: relationship between the aggregator and the supplier

- If the **same entity** performs both roles (aggregator and supplier) for a given system user at a given metering point, then this implementation is understood as the **'integrated model'**.
- If the two roles are performed by **two separate entities**, then we distinguish two sub-cases, depending on whether there is a **submeter** or not. The concept of submeter is implemented differently across MSs:
 - If the submeter serves as the equipment that **splits the metering point into two***, then it is being used to separate the balance responsibility of the BRP registered on that submeter from the balance responsibility of the BRP registered on the main metering point => since, in this case, the BRP registered at the submeter is **responsible also for the supply** of the resources behind the submeter, we label this case as **'split supply'**.
 - If the submeter simply serves to **verify the delivery of the service** by the aggregator, with the supplier registered on the metering point being **the only supplier** for the resources behind this metering point. These cases are treated under the branch with the label **'different entities without submeter'**.
 - So, it is important to clarify that when we are discussing the cases **'without submeter'**, we may actually have a **submeter**, but this one should **not** serve for **splitting** the balance responsibility into two suppliers (i.e. the supplier of the main meter and the aggregator who serves as supplier for all the resources behind the submeter).

*BRP: balance responsible party

*i.e. the submeter values are used for the calculation of the allocated volume during the imbalance settlement

Thank you. Any questions?

The contents of this document do not necessarily reflect the position or opinion of the Agency.



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