smartEn
Smart Energy Europe

Policy Recommendations for trilogue negotiations on the Electricity Market Design

SmartEn comparative analysis of positions agreed by the 3 EU institutions

Smart Energy Europe
Rue d'Arlon 69-71,
BE-1040 Brussels

+32 (0) 2 58 88 992
info@smarten.eu
www.smarten.eu
@smartEn

16 May 2018

About smartEn - Smart Energy Europe

smartEn is the association of market players driving digital and decentralised energy solutions.
A successful European energy transition requires the intelligent cooperation between consumption, distribution, transmission and generation, acting as equal partners in an integrated energy system.

Our **vision**:
The digitally enabled interaction of demand and supply is an integral part of an increasingly decentralised, decarbonised energy system.

Our **mission**:

- **Promote system efficiency** through the advanced management and integration of electricity demand and supply in homes and buildings, transportation, businesses and decentralised energy projects.
- **Empower energy users** by enabling them to participate in the energy market through flexible demand, storage, self-generation and the participation in community projects, and giving them control of their energy data.
- **Encourage innovation and diversity** by enabling new market players and service offers that provide attractive choices for consumers and allow for healthy competition.
- **Drive the decarbonisation of the energy sector** through the cost-effective integration of renewable sources and the electrification of heating, cooling and transport.

Industrial membership

5 KEY PRINCIPLES TO GUIDE SMARTEN POLICY RECOMMENDATIONS

The Electricity Market Regulation and Directive were presented by the European Commission in late 2016, as major pillars of the Clean Energy for All Europeans package.
Both European Parliament and Council shaped their positions on the two legislative dossiers.
The present comparative analysis of positions by the European Commission, Parliament and Council on both Electricity Market Regulation and Directive aims at providing policy recommendations to trilogue negotiators on crucial articles for smartEn members.

The energy system in Europe is undergoing a major transformation. Technological progress and digitalisation have led to the emergence and maturing of a range of unprecedented solutions and opportunities, also involving directly final customers. The Clean Energy Package offers important opportunities to help overcome existing barriers to the uptake of cost-effective and innovative solutions. To enable the efficient use of decentralised demand, storage and generation, smartEn advocates **five key principles** which guide the detailed smartEn **policy recommendations** outlined in pages 4-15, which are classified in provisions to **SUPPORT**, **OPPOSE** and **IMPROVE** for key articles.

1. OPEN ALL ELECTRICITY MARKETS FOR ALL DECENTRALISED ENERGY RESOURCES

smartEn welcomes that all EU institutions have broadly embraced the fundamental principles that **no undue barriers** shall exist for market entry and exit for decentralised energy resources to all energy markets and an **equal level-playing field with generation** shall be ensured.

To enable more dynamic and efficient wholesale markets and allow effective participation in trading of demand response, storage and small-scale renewables, smartEn believes that **products should be sufficiently small in size** and **trading should be as close to real time as possible** (no more than 15 minutes on wholesale markets).

As suggested by the Commission, Member States shall monitor resource adequacy within their territory based on the **European resource adequacy assessment**. The contribution of all decentralised energy resources shall be appropriately taken into account and sources of concern shall be eliminated.

2. EFFECTIVE PRICE SIGNALS AT WHOLESALE AND RETAIL LEVEL

smartEn acknowledges that the general principle of **removing price caps** is shared by all EU institutions: the efficiency of Europe's electricity markets depends on the availability of effective price signals that reveal the full value of flexibility. **Derogations** introduced by all EU institutions both at retail and wholesale level shall be **specific and time-limited**.
Consumers should be able to choose **dynamic prices** if they wish, and should have the right to obtain access to **smart metering** with the necessary minimum functionalities.

Network charges shall be cost-reflective and support overall system efficiency by granting incentives to system operators for the procurement of flexibility services, as specifically suggested by the Parliament (AM 81).

3. PROVIDE FAIR MARKET ACCESS FOR ACTIVE CUSTUMERS AND AGGREGATORS

smartEn supports the principle that final customers shall be entitled to act as **active customers**, engage in demand response and generate, store, consume and sell self-generated electricity. They shall be able to participate in all organised markets, either individually or through aggregation.

smartEn welcomes that the Directive sets an EU framework for innovative energy service companies, like **aggregators**, which shall not have the consent from suppliers to conclude a contract with a final customer, a principle that must not be confused with unclear derogations.
Important clarifications are needed in art. 13 concerning the termination period and fee of **contracts between aggregators and household customers**.
Art. 17 shall also be improved with the introduction of rules and procedures to account properly the activities of aggregators and other market participants to **avoid undue imbalance penalties** as well as to

clarify the **balancing responsibility for the demand response provider**.
Balanced **compensation mechanisms** for market participants shall be included, as proposed by the European Parliament in AM 87.

4. RELEVANT DATA ACCESS FOR ALL SERVICE PROVIDERS

smartEn believes that the availability, security and access to energy data is crucial for a consumer-centric and smart energy system.
The parties responsible for data management shall provide to any eligible party, including aggregators and energy service companies, **non-discriminatory access to the data of final customers** on the basis of an explicit consent.
As specified by the European Parliament (AM 108), data shall include metering and consumption data as well as data required for consumer switching, automated energy efficiency programmes, energy management services and demand response services.

The Commission's proposal to define a **common European data format** is much appreciated as it will enable interoperability and facilitate exchange/access of data using the same format in different Member States.

5. USE OF ALL DECENTRALISED ENERGY RESOURCES BY SYSTEM OPERATORS

For smartEn it is key that TSOs/DSOs are allowed and incentivised to procure and make use of all decentralised and demand-side flexibility solutions offered by market parties when these are more efficient alternatives then traditional investment in the grid. The Directive shall **require standardised and streamlined product definitions for the procurement of flexibility services by DSOs and TSOs, so as to avoid market fragmentation** (as introduced by the Parliament in AM 120 to art. 32 and AM 142 to art. 40 of the Electricity Directive).
System operators shall also ensure committed resources to one system operator are not unexpectedly curtailed by another system operator, as suggested by the Council text on art. 53 of the Regulation.

As a general rule, TSO/DSOs shall not be allowed to own, develop, manage or operate recharging points for electric vehicles and storage facilities. smartEn calls for the elimination of very broad derogations and exemptions introduced by EU institutions: system operators shall remain **neutral actors and leave the provision of such services to market parties** to safeguard the efficient functioning of the electricity market.

…IN ADDITION: COHERENCE WITH EPBD REVIEW AND GOVERNANCE REGULATION

smartEn policy recommendations are also coherent with the agreed **revision of the Energy Performance of Buildings Directive (EPBD)** which sets minimum requirements for both building automation and control systems (BACs) and charging infrastructure for electric vehicles, and provides a framework for a Smart Readiness Indicator. As these provisions are aimed at the development of smart buildings and enhancing their flexibility as active players in the energy system, it is crucial to ensure consistency between the EPBD revision and the definition of the EU electricity market design.

Accurate and specific planning, reporting and monitoring at national level is also essential to ensure regulatory barriers to new market players and innovative business models are effectively addressed, eliminated and overcome. In this light, specific national objectives within the dimension Internal Energy Market must be set in the **Governance Regulation** to tackle progress on the implementation of the new electricity market design.

The detailed smartEn policy recommendations are focused on the following articles:

ELECTRICITY MARKET REGULATION	ELECTRICITY MARKET DIRECTIVE

• **General rules for the electricity market**
  ○ Art. 3 (Principles regarding the operation of electricity markets)
  ○ Art. 5 (Balancing market)
  ○ Art. 6 (Day ahead and Intraday markets)
  ○ Art. 7 (Trade on Day ahead and Intraday markets)
  ○ Art. 8 (Forward markets)
  ○ Art. 9 (Price restrictions)
  ○ Art. 12 (Redispatching and curtailment)
• **Charges for access to networks (art. 16)**
• **Resource adequacy**
  ○ Art. 18 (Resource adequacy)
  ○ Art. 19 (European resource adequacy assessment)
  ○ Art. 23 (Design principles for capacity mechanisms)
• **Distribution System Operation**
  ○ Art. 51 (Tasks of EU DSO entity)
  ○ Art. 53 (Cooperation between DSOs and TSOs)
	• **General rules for the organisation of the sector**
	  ○ Art. 3 (Competitive, consumer-centred, flexible and non-discriminatory electricity market)
	  ○ Art. 5 (Market based supply prices)
	  ○ Art. 8 (Authorisation procedure for new capacity)
	• **Consumer empowerment and protection**
	  ○ Art. 11 (Entitlement to dynamic price contract)
	  ○ Art. 12 (Right to switch supplier and rules on switching-related prices)
	  ○ Art. 13 (Contract with an aggregator)
	  ○ Art. 15 (Active customers)
	  ○ Art. 16 (Local Energy Communities)
	  ○ Art. 17 (Demand Response)
	  ○ Art. 19 (Smart metering)
	  ○ Art. 20 (Smart metering functionalities)
	  ○ Art. 21 (Entitlement to a smart meter)
	  ○ Art. 23 (Data management)
	  ○ Art. 24 (Data format)
	• **Distribution System Operation**
	  ○ Art. 31 (Task of DSOs)
	  ○ Art. 32 (Tasks of DSOs in the use of flexibility)
	  ○ Art. 33 (Integration of electro-mobility into the electricity network)
	  ○ Art. 34 (Tasks of DSOs in data management)
	  ○ Art. 36 (Ownership of storage facilities)
	  ○ NEW Art. 36A (New activities of DSOs)
	• **Transmission System Operation**
	  ○ Art. 40 (Tasks of TSOs)
	  ○ Art. 51 (Network development and powers to make investment decisions)
	  ○ Art. 54 (Ownership of storage and provisions of ancillary services by TSOs)
	• **National Regulatory Authorities**
	  ○ Art. 59 (Duties and powers of the regulatory authority)

ELECTRICITY MARKET DIRECTIVE

ARTICLE 3 - Competitive, consumer-centred, flexible and non-discriminatory electricity market

- Member States shall ensure that their national legislation does not unduly hamper *cross-border trade and flows of electricity*, *consumer participation* including demand-side response, investments into flexible energy generation, energy storage, the deployment of electro-mobility or new interconnectors, and that *electricity prices* reflect actual demand and supply.
- No derogation shall be allowed to these general rules and instead, targeted social policies should be implemented to support vulnerable consumers.

SUPPORT §1 (AM31) in the Parliament text

- National legislation shall ensure an *equal level-playing field* and does not discriminate against any market participant, including those from other Member States.
- *Cooperation* among Member States, national regulatory authorities and system operators is essential for a fully interconnected internal energy market.
- Member States shall ensure that *no undue barriers* exist for market entry and market exit of electricity generation, energy storage, demand-response and electricity supply undertakings.

SUPPORT the new § 1a (AM32), 1b (AM33), 1c (AM34) and § 2 (AM 35) in the Parliament text

ARTICLE 5 - Market based supply prices

- Electricity suppliers shall be *free* to determine the price at which they supply electricity to customers.

SUPPORT § 1 in the Commission proposal

IMPROVE § 3 on derogations to market-based supply prices as regulated prices can harm the correct functioning of electricity markets and/or reduce competition and growth of market shares of new market participants. Derogations should be specific and time-limited

- Member States **shall** ensure the protection of energy poor or vulnerable customers by **social policy or** other means than public interventions in the price-setting for the supply of electricity.

IMPROVE by merging Commission and Parliament (AM37) texts on § 2

ARTICLE 8 – Authorisation procedure for new capacity

- When deciding on the construction of new generation capacity, Member States shall also consider the *assessment of alternatives*, such as demand response solutions and energy storage.

SUPPORT the new § 2.ka (AM42) in the Parliament text: the Impact Assessment estimated the demand response potential at 160GW in 2030, which can replace polluting power plants and reduce the need for new generation capacity, increasing system efficiency.

ARTICLE 11 – Entitlement to a dynamic price contract

Four principles must be ensured to allow a competitive offer of such new contracts:

1. Customers shall be *able to choose* a dynamic price contract

IMPROVE § 1 with the following new wording: "**Member States shall ensure that sufficient offers are available, so that final consumers can choose a dynamic price contract by different suppliers. To this end, Member States may introduce obligations to suppliers to provide this type of contracts**"

2. customers shall be well *informed*, including the need to have an adequate smart meter installed.

SUPPORT § 2 (AM 52) and the new § 2a (AM 53) in the Parliament text

3. flat price elements alongside the energy component provoke distortions and blunting effects on price signals, thus *reducing the share of fixed components* in final customers' electricity bills is a precondition to reflect the price at the spot market or at the day ahead market at intervals at least equal to the market settlement frequency (i.e. Commission's definition of "dynamic electricity price contract" in article 2).

SUPPORT the new § 2b (AM 54) in the Parliament text

4. National Regulatory Authorities shall *monitor and report* annually on developments of such contracts.

SUPPORT the Commission proposal on § 3 and IMPROVE it by adding a reference to art. 4 and 21 of the Governance Regulation

ARTICLE 12 - Right to switch supplier and rules on switching-related prices

- Services provided by aggregators are different from suppliers that supply electricity, therefore there should not be *any cross-reference or confusion* between the two types of contracts offered by these market players and the relative rules on switching. There should be different rules to govern a peculiar type of service offered by aggregators.

OPPOSE the modifications in the title and in the article proposed by the Council to extend these provisions to both suppliers and aggregators: the latter should be detailed in the following article 13

ARTICLE 13 – Contract with an aggregator

Three principles must be safeguarded to allow the business development of these new market players:

1. *"no supplier consent" rule*: if a final customer wishes to conclude a contract with an aggregator, such engagement shall not require the consent of the final customer's supplier.

SUPPORT § 1 (AM 60) in the Parliament text which adds also the "no discrimination" rule on suppliers for customers with or without an aggregator contract

OPPOSE the second and third sentences in § 1 of the Council text which set derogations to this principle (i.e. "Member States may allow suppliers to require such consent"): the implementation of Article 17 ensures that exemptions as mentioned in Article 13 of the Council text are not applicable

2. the *timeframe to terminate the contract* before its maturity should be balanced on the type of clients.

   There is a fundamental difference between industrial or household clients on the value of flexibility put on the market on their behalf by an aggregator. The termination period should allow an aggregator to secure an alternative portfolio for the provision of committed system services.

   In fact, the requirements that aggregators sometimes have to fulfil before providing their service shall be taken into account when setting the termination period, i.e. detailed assessment of a consumer's flexibility potential, installation of automation equipment and prequalification. For industrial customers the effort that an aggregator has put into setting up the demand response business can be up to 6 months or more. However, as households are a type of end-users that need more legislative protection, the introduction of a 24h termination period can be specifically addressed to them, while industrial clients can negotiate a clause for contracts with aggregators directly. The time of registration and approval of a new household contract with an aggregator (which can currently take up to 1 month in some Member States) should be aligned with the 24h contract termination period for household customers.

IMPROVE § 2 in the Commission proposal as follows: "Member States shall ensure that a **household** ~~final~~ **customer** wishing to terminate the contract with an aggregator **before its maturity**, while respecting contractual conditions, is entitled to such termination within **24 hours by 1 January 2022** ~~three weeks~~"

OPPOSE § 2 (AM 61) in the Parliament text which refers to art. 12: the contract with an aggregator is different from a contract with a supplier. Confusion should be avoided

3. Again, the *termination fee* for a contract with an aggregator ended before its maturity should depend on the type of client. A higher investment per MW is required for household customers compared to industrial ones: proportional termination fees should apply to household customers based on costs and financial penalties incurred by the aggregator, with the burden of proof on the aggregator and monitored by the National Regulatory Authority, following a standardised approach (in order to avoid an individual calculation for each given consumer).

   As for the previous paragraph, aggregators should define this clause in the contracts stipulated with their industrial clients.

IMPROVE § 3 in the Commission proposal accordingly: "Member States shall ensure that **household** ~~final~~ **customers** terminating a fixed term contract with an aggregator before its maturity are not charged any termination fee that exceeds the **related** ~~direct~~ economic

loss to the aggregator, including the cost of any bundled investment or service already provided to the **household** ~~final~~ **customer** as part of the contract **as well as financial penalties related to the loss of committed resources in the electricity system and markets**"
SUPPORT the new § 3.1a (AM 62) in the Parliament text and IMPROVE it by adding the following specification: "The burden of proof of the direct economic loss shall be on the aggregator and shall be monitored by the national regulatory authority**, following a standardised approach**"

ARTICLE 15 – Active customers

- Final customers shall be entitled to act as active customers. Member States shall ensure they generate, store, consume and sell self-generated electricity in *all organised markets* either *individually or through aggregation*, participate in demand response, be *financially responsible* for the imbalances they cause in the electricity system.
- Active customers shall be subject to cost-reflective, transparent, non-discriminatory, non-disproportionate procedures and network charges.

SUPPORT the original formulation of § 1 in the Commission text as well as the clarifications in §1a.c, 1a.e, 1a.f in the Council text
SUPPORT the addition in § 2 (AM 68) in the Parliament text on customers owning a storage facility which shall have the right to a grid connection, not be subject to additional taxes, surcharges and fees for the electricity stored
OPPOSE the first addition in § 2 (AM 68) in the Parliament text on an unclear "economic risk which shall remain with the active customer" for the possible operation of the energy installations by a third party. The responsibility for the economic risk should be part of the agreement between the active customer and the service provider.

ARTICLE 16 – Local energy communities

- As for active customers, LECs shall access *all organised markets* without discrimination, operate on the market on a level playing field without distorting competition, be subject to *balance responsibility*.

SUPPORT the new § 1.ba (AM 70) and 1.cb (AM 73) in the Parliament text or § 2a in the Council text
SUPPORT the new article 16a "Electricity sharing" (AM 79) in the Parliament text (which is a more detailed formulation of § 2.d in the Council text) to allow LECs to share electricity from generation assets within the community based on market principles, using existing and future ICT services
OPPOSE the elimination of the "local" focus in the Council text

ARTICLE 17 – Demand Response

Key principles shall be introduced in the electricity market design:

- National regulatory frameworks shall allow and encourage *demand response providers* - individual final customers or through (independent) aggregators - to participate alongside generators in *all organised markets* and *capacity mechanisms*. In this light, system operators shall treat them in a non-discriminatory manner when procuring ancillary services.

SUPPORT § 1 (AM 80) and 2 (AM 81) in the Parliament text

- with regard to the participation of aggregators, national regulatory frameworks shall foresee:
  - *"no consent" rule* by other market participants for aggregators, including independent aggregators, to access and participate in all organised markets;

SUPPORT § 3 introductory part (AM 82) and § 3.a in the Council text

  - Non-discriminatory and transparent rules clearly assigning *roles and responsibilities* to all market participants;

SUPPORT § 3.b (AM 83) in the Parliament text

  - Non-discriminatory and transparent rules and procedure for *data exchange* while fully protecting commercial and customers' data, *minimum information requirements for the aggregator* and *minimum criteria for the protection of commercial data* for all parties concerned;

SUPPORT § 3.c (AM 84) in the Parliament text

- Rules and procedures to *account properly the activities of aggregators and other market participants*. In fact, as a result of a demand response activity, the positions of the affected balance responsible parties have to be updated accordingly to avoid undue imbalance penalties. This is an active process, where balance perimeters are corrected.

IMPROVE § 3 by adding a new paragraph: "**transparent rules and procedures to ensure that the impact of the activity of aggregators on other market participants are properly accounted for in their respective balance responsible parties' positions**"

- non-discriminatory and transparent rules and procedures are set to *compensate* market participants for the energy they deliver during the demand response period in a proportionate manner. Compensation shall be strictly limited to cover the resulting costs and the calculation methodology shall take account the benefits introduced by the independent aggregators to other market participants.
  The National Regulatory Authority shall supervise such compensation mechanism and it should not create a barrier for market entry of aggregators or flexibility;

SUPPORT § 3.d (AM 85), § 4 (AM 89) and § 3.db (AM 87) in the Parliament text, but IMPROVE with the following wording "[…] the calculation method for such compensation ~~may~~ **shall** take account the benefits introduced by the independent aggregators […]" to ensure the benefits of demand response are taken into account

- aggregators shall be *financially responsible for the imbalances* they cause in the electricity system;

SUPPORT the new § 3.da (AM 86) in the Parliament texts, but IMPROVE it by adding the following wording "market participants engaged in aggregation shall be financially responsible for the imbalances they cause in the electricity system as defined in accordance with Article 4 of the Electricity Regulation, **as the difference between the demand response volumes sold and actually delivered during every settlement period**": this clarification aims at filling the current legislative vacuum, i.e. the lack of a description for the balancing responsibility for the demand response provider, which is not described anywhere in the Directive

- final customers who have a contract with independent aggregators shall not face undue payments, penalties or other undue contractual restriction from their suppliers

SUPPORT the new § 3.dc (AM 88) in the Parliament text

- National Regulatory Authorities, TSO/DSOs, in cooperation with demand response service providers and final customers, define *technical modalities for participation of demand response* in all organised markets on the basis of the technical requirements of these markets and the capabilities of demand response.

SUPPORT § 5 in the Commission proposal

ARTICLE 19 – Smart metering

- The smart meter is an essential device for final customers to participate in implicit demand response and benefit from dynamic price contracts. Without it, some innovative services cannot be offered, but smart metering systems shall comply with the minimum functional and technical requirements described in art. 20 and Annex III.
- Member States shall ensure the *interoperability* of these smart metering systems, their user-centricity as well as their *connectivity* with consumer energy management platforms. In this respect, Member States shall have due regard to the use of relevant available *standards*.
  For existing smart metering systems, the requirements must be met when the metering system is replaced by a new one, at the end of its economic lifetime or earlier.

SUPPORT § 1 (AM 97) and 3 (AM 98) in the Parliament text

OPPOSE the new § 5a of the Council text which limits smart meters provisions in this Directive just to future installations and to installations replacing older smart meters. In some cases it is possible to transform a meter into a smart meter without replacing the old one, but simply adding a device. Therefore, provisions related to smart meters shall not be

limited just to future installations and replacements. However, if an old meter does not support dynamic pricing, the consumer should be able to access a new smart meter as described in Article 21

- When the deployment of smart metering is negatively assessed as a result of cost-benefit assessment, Member States shall ensure that this assessment is revised at least every two years.

SUPPORT § 5 (AM 100) in the Parliament text

ARTICLE 20 – Smart metering functionalities

Both Parliament and Council are aligned on the minimum functionalities for smart metering systems, essential to support demand response and other innovative services.
In particular, metering systems shall:

- accurately measure actual electricity consumption and provide to final customers information on actual time of use. *Validated historical consumption data* shall be made easily available and visualised to final customers on at least an in-home display at no additional cost. *Unvalidated near-real time consumption data* shall be made available to final customers through a standardized interface.

SUPPORT § 1.a (AM 102) in the Parliament text, but IMPROVE by deleting "at no additional cost" to avoid suppliers install low-cost and low-tech in-homes displays: high-tech interfaces shall be commercially available to customers to provide high quality technologies that visualize energy consumption at real time

- comply with *cybersecurity, privacy and data protection* laws.

SUPPORT § 1.b in the Commission text, § 1.c (AM 103) in the Parliament text

- account for electricity put into the grid for *active customers* who self-generate.
- provide metering data to final customers or to a third party acting on their behalf, via a *local standardised communication interface and/or remote access*.

SUPPORT § 1.e (AM 104) in the Parliament text

ARTICLE 21 – Entitlement to a smart meter

- Member States shall ensure that every final customer is entitled to have installed or, where applicable, to have upgraded, on request and under fair, reasonable and cost-effective conditions, a smart meter with key minimum functionalities.

SUPPORT § 1 (AM 106), § 1.a (AM 107) in the Parliament text

ARTICLE 23 – Data management

- Data shall be shared with any eligible party, notably *customers, aggregators and energy service companies*, that the final customer wishes to share with. It is important to quote them as today they are excluded: currently, just retailers have access to DSO data. Hence, the parties responsible for data management shall provide to any eligible party access to the data of final customers on the basis of an explicit consent.
- Access, processing and storage of personal data shall be carried out in compliance with the GDPR.

SUPPORT § 1 (AM 108) in the Parliament text, § 2 and the new § 2a in the Council text

- Data shall include *metering and consumption data* as well as *data required for consumer switching*, *automated energy efficiency programmes, energy management services and demand response services*.

SUPPORT § 1 (AM 108) in the Parliament text
IMPROVE by further specifying the data needed: "*including historical interval data, real-time data, settlement data and standing data*" (added at the end of the second paragraph in § 1 in the Parliament text)

- Competent national authorities shall authorise and certify the parties which are managing data in order to ensure they comply with this Directive

SUPPORT § 3 in the Council text

- No additional costs shall be charged to final customers for access/transfer their data to eligible parties.

SUPPORT § 4 (AM 110) in the Parliament text

ARTICLE 24 – Data format

- Member States shall define a common European data format to *enable interoperability and facilitate exchange/access of data*.
- It shall be defined by the Commission through *implementing acts* and should replace national data format and procedures in order to avoid excessive administrative costs for the eligible parties and facilitate the full interoperability of cross-border energy services within the EU.
- Member States shall ensure that market participants apply this common European data format, which will enable them to exchange data using the same data format in different Member States.

SUPPORT the Commission proposal and § 1 (AM 111) in the Parliament text as it includes the interoperability requirement which was missing in the Commission proposal

OPPOSE any derogation in both Parliament and Council texts to common interoperability requirements and/or interoperability standards

ARTICLE 31 – Tasks of DSOs

- DSOs must not discriminate between system users, shall provide them information needed for use of the system, shall act as *neutral market facilitator* in procuring the energy it uses to cover energy losses and the non-frequency ancillary services in its system.
- The *procurement of non-frequency ancillary services* by a DSO shall be transparent, non-discriminatory and market-based (unless justified by a cost-benefit analysis), with effective participation of all market participants, including renewable energy sources, demand response, energy storage facilities and aggregators.

SUPPORT the overall formulation of § 5 in the Commission proposal and the additions in § 5 (AM118) in the Parliament text on the need for the National Regulatory Authority to develop a methodology for the cost-benefit analysis

OPPOSE § 5a in the Council text on the principle that rules for procurement shall be adopted by each DSO: the Directive should make sure that DSOs do not design their own procurement rules and products in order to avoid market fragmentation

- DSOs shall cooperate with TSOs for the effective participation of market participants connected to their grid to the retail, wholesale and balancing markets.

SUPPORT the new § 5d in the Council text

ARTICLE 32 - Tasks of DSOs in the use of flexibility

- National regulatory frameworks shall allow, incentivize and ensure DSOs *procure flexibility services* from resources such as distributed generation, demand response or storage in accordance with transparent, non-discriminatory and market-based procedures.

SUPPORT § 1 (AM 119) in the Parliament text, but without "can" in order to make this provision less ambiguous

- *Standardised market products* for such services shall be defined at least at national level in a transparent and participatory process which involves system operators, National Regulatory Authorities and all relevant market participants.

SUPPORT subparagraph 2 of § 1 (AM 120) in the Parliament text: standardised products will avoid a fragmented market with every DSO designing their own products: for a service provider it would be very problematic to offer their services in a unstandardized market. With standardised products, services can be sold to TSOs and DSOs indistinctively depending on where they are most required at any moment. For this purpose, the establishment of a standardised flexibility platform in every market shall be ensured

- The definition of the *network development plan* that DSOs shall submit every 2 years to National Regulatory Authorities (with scrutiny power) and TSOs shall involve all current and potential system users. It shall contain the planned investments and include the use of demand response

and other demand-side management measures, including energy storage and recharging points for EVs.

SUPPORT all modifications introduced on § 2 in both the Council and Parliament (AM 121) texts

ARTICLE 33 - Integration of electro-mobility into the electricity network

- As a general rule, DSOs shall not be allowed to own, develop, manage or operate recharging points for EVs: system operators shall remain neutral actors and leave this business opportunity to market parties to safeguard the efficient functioning of the electricity market.

SUPPORT the new § 1a in the Council text

- *Derogations* may be allowed by Member States if there is no market interest in providing this service at a reasonable cost and in a timely manner and the National Regulatory Authority has granted its approval.

SUPPORT § 2 (AM 124 and 125) in the Parliament text

- When the derogation cannot be applied anymore, DSOs' activities in this regard are phased out and DSOs may recover the residual value of the investment made into recharging infrastructure.

SUPPORT the last sentence in § 4 in the Council text, but IMPROVE by specifying that the assessment must be done by the National Regulatory Authority

ARTICLE 34 - Tasks of DSOs in data management

- All eligible parties shall have *non-discriminatory access* to data under clear and equal terms, in compliance with data and information protection legislation.
  In case of insufficient unbundling of DSOs from generation or retail activities, it is necessary to opt for alternative data management models as the creation of a *central data management platform* managed by the TSO or another neutral entity.

SUPPORT § 1 (AM 127) in the Parliament text

ARTICLE 36 - Ownership of storage facilities

- As for recharging points for EV, DSOs shall not be allowed to own, develop, manage or operate energy storage facilities.

SUPPORT § 1 in the Commission proposal

- *Derogations* may be allowed by Member States if there is no market interest in providing this service at a reasonable cost and in a timely manner and the National Regulatory Authority has granted its approval.

SUPPORT § 2 (AM 129, 130 and 132) in the Parliament text, in particular the guidelines to aid DSOs in ensuring a fair tendering procedure

- When the National Regulatory Authority assesses that the derogation cannot be applied anymore, DSOs' activities in this regard are phased out and DSOs may recover the residual value of the investment made into storage facilities.

SUPPORT § 4 in the Commission proposal and the last sentence in § 4 in the Council text

- However, both Parliament and Council texts include exemptions and derogations which are very broad and can very easily be exploited.

OPPOSE § 1 (AM 128) in the Parliament text
OPPOSE the new § 4a in the Council text: storage investments before 2024 can be kept by the DSO anyway until it is fully depreciated, even if the market would like to take over.

NEW ARTICLE 36A – New activities of DSOs

- This new article introduced by the Parliament tries to summarize and generalise provisions already outlined in particular in articles 32, 33 and 36. There is no need to repeat what already stated in order to avoid misinterpretations, notably on derogations to the basic principles.

OPPOSE AM 134 in the Parliament text

ARTICLE 40 - Tasks of TSOs

Among others, TSOs shall be responsible for:

- Ensuring the availability of all necessary *ancillary services*, including those provided by demand response and energy storage

SUPPORT § 1.d of the Commission proposal, not modified by other institutions

- *Digitalisation* of transmission systems to ensure efficient real time data acquisition and use

SUPPORT § 1.ja (AM 137) in the Parliament text

- Data management, cybersecurity and data protection

SUPPORT § 1.jc in the Council text

- *Procuring ancillary services* from market participants to ensure operational security: the TSO shall ensure that the procurement of *balancing services* and (unless justified by a cost-benefit analysis) *non-frequency ancillary services* shall be transparent, non-discriminatory and market-based, with effective participation of all market participants, including renewable energy sources, demand response, energy storage facilities and aggregators.

SUPPORT § 4 in the Commission proposal

- As for DSOs, national regulatory frameworks shall allow, incentivize and ensure TSOs *procure flexibility services* from resources such as distributed generation, demand response or storage in accordance with transparent, non-discriminatory and market-based procedures.

SUPPORT the new § 5a (AM 142) in the Parliament text (very similar to art. 32 Tasks of DSOs in the use of flexibility), but without "can" in order to make this provision less ambiguous

- *Standardised market products* for such services shall be defined at least at national level in a transparent and participatory process which involves system operators, National Regulatory Authorities and all relevant market participants. TSOs and DSOs shall exchange information and coordinate to ensure optimal utilisation of resources, ensure secure and efficient operation of the system and facilitate market development. As for DSOs, also TSOs shall be adequately remunerated for the procurement of such services.

SUPPORT the second paragraph of the new § 5a (AM 142) in the Parliament text

ARTICLE 51 - Network development and powers to make investment decisions

The Parliament introduces good improvements:

- The role of the National Regulatory Authority to review and amend the *TSOs' 10 year network development plan* is strengthened: the potential of the use of demand response, energy storage facilities or other resources as an alternative to system expansion shall be taken in full account.
- The National Regulatory Authority shall also monitor and evaluate the development of overall *system flexibility* and report annually on progress.
- The role of National Regulatory Authorities in assessing *consistency of this plans with the NEAPs* that Member States shall submit under the Governance Regulation is also added.

SUPPORT additions on this article (AM 144, 145, 146, 147) in the Parliament text

ARTICLE 54 - Ownership of storage and provisions of ancillary services by TSOs

- As for DSOs, TSOs shall not be allowed to own, develop, manage or operate energy storage facilities.

SUPPORT § 1 in the Commission proposal

- *Derogations* may be allowed by Member States if there is no market interest in providing this service at a reasonable cost and in a timely manner and the National Regulatory Authority has granted its approval.

SUPPORT § 2 (AM 149, 150, 151 and 152) in the Parliament text, in particular the guidelines to aid TSOs in ensuring a fair tendering procedure

- When the National Regulatory Authority assesses that the derogation cannot be applied anymore, DSOs' activities in this regard are phased out and TSOs may recover the residual value of the investment made into storage facilities.

SUPPORT § 4 (AM 153) in the Parliament text (but IMPROVE it by substituting "Member States" with "National Regulatory Authority", aligned with art. 36) and the last sentence in § 4 in the Council text

- However, both Parliament and Council texts include exemptions and derogations which are very broad and can very easily be exploited

OPPOSE § 1 (AM 148) in the Parliament text
OPPOSE the new § 4b in the Council text storage investments before 2024 can be kept by the TSO anyway until it is fully depreciated, even if the market would like to take over

ARTICLE 59 - Duties and powers of the regulatory authority

Among others, it is essential that the National Regulatory Authorities shall:

- Fix and approve *network charges and their methodology*, which shall take into account the investment costs, added value of distributed generation, flexibility, digitalisation, demand response, storage and use of the networks by system users including active customers.

SUPPORT § 1.a in the Commission proposal and § 8 (AM 166) in the Parliament text

- Approve *products and procurement process* for non-frequency ancillary services.

SUPPORT § 1.c in the Commission proposal

- Measure the performance of TSOs and DSOs in relation to the development of a *smart grid* that promotes energy efficiency and the integration of energy from renewables based on a limited set of Union-wide indicators, and publish a national report every 2 years, including recommendations for improvement where necessary.

SUPPORT § 1.k in the Commission proposal

- Monitoring transparency of wholesale prices and market opening and competition at wholesale and retail levels, including impact of *dynamic price contracts* and the use of *smart meter*, the evolution of *grid tariffs and levies*.

SUPPORT § 1.n (AM 159) in the Parliament text

- Monitor and report on *consumer participation*, and the availability and potential of *flexibility* in the energy system.

SUPPORT the new § 1.oa (AM 161) in the Parliament text which shall be aligned to the Governance Regulation, notably the national objectives on flexibility set by the Parliament (AMs 85, 86, 87 to art. 4 and AMs 147, 149, 150 to art. 21): differently from the US, there is a lack of monitoring and measuring of flexibility in Europe. The available flexibility in the system could be measured in terms of capacity contracted ((MW) and volumes sold (MWh) for demand response and storage

- Monitor the removal of unjustified obstacles and restrictions to the development of *self-consumption and local energy communities*.

SUPPORT § 1.q in the Parliament text

ELECTRICITY MARKET REGULATION

ARTICLE 3 – Principles regarding the operation of electricity markets

Key principles must be enshrined for open electricity markets, effective market price signals and fair market access for all actors and service providers:

- *prices* shall be based on demand and supply. Limits or disincentives shall be avoided;

SUPPORT § 1.a and 1.b in the Commission proposal

- customers shall be *empowered* to act as participants in energy markets and energy transition;

SUPPORT § 1.c (AM 20) in the Parliament text

- market participation shall be enabled by *aggregation* of generation or load;

SUPPORT § 1.d in the Commission text

- market rules shall deliver appropriate *investment incentives* for generation, storage and demand response to meet market needs and security of supply. They shall participate on *equal footing* in the market and market rules shall enable the *efficient dispatch* of generation assets and demand response;

SUPPORT § 1.f, 1.i and 1.l in the Commission proposal

- market participants have the right to obtain *access to the transmission and distribution networks* on objective, transparent and non-discriminatory terms.

SUPPORT the new § 1.o in the Council text

ARTICLE 5 – Balancing market

- *All market participants*, including those providing electricity generated from variable renewable sources and demand side response and storage services, shall have *full access* to the balancing market, *individually or through aggregation*.

SUPPORT § 1 (AM 32) in Parliament text

- The organisation of balancing markets shall ensure effective *non-discrimination* and participation on *equal footing* of all market participants, taking account of the different technical capability.

SUPPORT § 2 (AM 33) in the Parliament text

- *Balancing energy* shall be procured separately from *balancing capacity*.
- With regard to balancing energy:
    - the *price* of balancing energy shall not be predetermined in a contract of balancing;
    - the *settlement* shall be based on *marginal pricing*;
    - market participants shall be allowed to *bid as close to real time as possible*;
    - *imbalances* shall be settled at a price that reflects the real time value of energy.

SUPPORT § 3 (AM 34), § 5 (AM 35) in the Parliament text and § 6 in the Commission proposal

- With regard to balancing capacity:
    - procurement shall be *performed by TSOs* (based on the identified sizing of reserve capacity), be *non-discriminatory* between market participants in the prequalification process: product specifications (and prequalification based on those specifications) need to be based on system needs and for decentralised resources, prequalification should be possible through aggregation rather than individually;
    - *procurement* performed for not longer than 1 day before the provision of balancing capacity.

SUPPORT § 8 (AM 37), § 9 (AM 38) in the Parliament text

- TSOs shall *publish close to real-time information* on the current system balancing of their control areas, the estimated imbalance price and the estimated balancing energy price.

SUPPORT § 10 (AM 39) in the Parliament text

- Member States shall *report* on the functioning, transparency and access by small providers to balancing markets, as foreseen by art. 21 of the Governance Regulation.

SUPPORT the new § 10a (AM 40) in the Parliament text

ARTICLE 6 – Day-ahead and Intraday markets

- TSOs and NEMOs shall *jointly organise the management* of the integrated DAM and IDM based on market coupling and shall *cooperate* to maximise efficiency and effectiveness Union electricity day-ahead and intraday trading.
  These markets shall be *non-discriminatory*, maximise the ability of market participants to contribute to *avoid system imbalances*, participate in *cross-border trade* as close as possible to real time and provide *prices that reflect market fundamentals*.

SUPPORT § 1 and 2 in the Commission proposal

- NEMO shall *develop products* that suit market participants' demand and needs, ensure their access to markets individually or through aggregation, and shall accommodate increasing shares of variable generation, storage, demand response and new technologies.

SUPPORT § 3 (AM 42) in the Parliament text and firmly OPPOSE its elimination from the Council text

ARTICLE 7 – Trade on Day-ahead and Intraday markets

All market participants, including demand-side response, energy storage and small-scale renewables, shall be allowed to:

- effectively participate in trading in these markets as NEMO provide products which are sufficiently small in size, with *minimum bid size of 500 kW*.

SUPPORT § 3 (AM 45) in the Parliament text

- trade energy *as close to real time* as possible and at least up to the intraday cross-zonal GCT.

SUPPORT § 1 in the Commission proposal, which is equal to 15 min before real time across all bidding zones, as explicitly mentioned in the Parliament text

- trade in national and cross-border markets in *time intervals* at least as short as the *imbalance settlement* period, which shall be *no more than 15 minutes* in all control areas by 1 January 2021.

SUPPORT § 2 (AM 44) in the Parliament text, but IMPROVE § 4 (AM 46) in the Parliament text by adding "[…] **no more than** 15 minutes in all control areas": short-term trading, together with the reduction of minimum bid-sizes, enable a more dynamic and efficient market as they are a precondition for improved market participation of decentralised and variable energy resources

ARTICLE 8 – Forward markets

TSOs shall issue:

- *long-term transmission rights* in a transparent, market-based and non-discriminatory manner through a *single allocation platform*.

SUPPORT § 2 in the Commission proposal

- *forward hedging products* to provide market participants with appropriate possibilities to hedge financial risks from price fluctuations. Member States shall support the liquidity of such products and allow their trade across bidding zones.

SUPPORT § 3 (AM 47) in the Parliament text: hedging products are key to ensure market-based investments in generation and demand-response capacity

ARTICLE 9 – Price restrictions

- There shall be *no maximum and no minimum limit* of the wholesale electricity prices.

SUPPORT the straightforward wording in § 1 (AM 48) in the Parliament text: price variability is a positive sign of an efficient competitive market. Variability is essential to give market signals for flexibility in the electricity system

- *Derogations* are set by all EU institutions.

SUPPORT § 2 in the Commission proposal which sets a 2 year time limitation

- National Regulatory Authorities shall identify policies and measures that could contribute to *indirectly restrict* wholesale price formation, take all appropriate actions to *eliminate or mitigate* the impact on bidding behaviour and report to the Commission on actions taken.

SUPPORT § 4 and 5 in the Council text

ARTICLE 12 – Redispatching and curtailment

- Resources curtailed or redispatched shall be selected amongst generation, energy storage and demand response using *market-based mechanisms and be financially compensated* by the requesting system operator. *Non-market-based* curtailment or redispatching shall only be based on strict conditions where a market-based approach is impossible.

SUPPORT § 2 (AM 55), § 5 (AM 59 and 60) in the Parliament text: strict conditions on non-market-based mechanisms are crucial to check regularly whether this is actually necessary and move Member States away from it. Dedicated reporting is essential

- At least once per year the responsible system operator shall report to the competent regulatory authority the level of *development and effectiveness of market-based* curtailment or redispatching mechanisms; the *reasons, volumes in MWh and types* of resources; the *measures taken to reduce* them, including investments in grid digitalisation and services that increase flexibility, and the *details and justifications for contractual arrangements* with generating units to run for backup.

SUPPORT § 3 (AM 56) in the Parliament text

- Where a *non-market-based mechanism* is used, *financial compensation* shall be provided by the requesting system operator to the operator of the curtailed or redispatched resources.

SUPPORT § 6 (AM 61 and 62) in the Parliament text and IMPROVE it by specifying that the curtailing system operator is *responsible* for any non-delivery of committed resources subject to a delivery obligation in a balancing or capacity mechanism. It shall also provide *financial compensation* based on the lost revenues

ARTICLE 16 – Charges for access to networks

- Charges applied by network operators for access, connection, use and reinforcement works shall be *fair, cost-reflective, transparent* and take into account the *need for flexibility*. They shall *not include unrelated costs* such as taxes and levies. They shall *neutrally support overall system efficiency*. Network tariffs shall *not create disincentives and discriminations* against energy storage, self-generation, self-consumption and for participation in demand response.

SUPPORT the modification of the title "Charges for access to networks, use of networks and reinforcement" (AM 77) and § 1 (AM 78) in the Parliament text

- Network tariffs shall grant *incentives to system operators* to increase efficiencies and support investments in particular in *digitalisation and flexibility services*.

SUPPORT § 2 (AM 79) in the Parliament text

- The concept of *"cost-reflective" network charges* (for both transmission and distribution) is important: network tariffs shall take into account the investment cost, added value of distributed generation, flexibility, digitalisation, demand response, storage and use of the network by all system users, including active customers.

SUPPORT § 7 (AM 80) in the Parliament text that introduces such clarification

- When smart metering systems are deployed, regulatory authorities may introduce *time differentiated network tariffs*, reflecting the use of the network.

SUPPORT the last sentence in § 7 in the Commission proposal: this wording leaves the assessment to regulatory authorities (better than the wording in AM 80 in the Parliament text) as the design of time

differentiated network tariffs can be optimal if tariffs reflect the actual state of the network when congestion occurs, which is difficult to implement today

- National Regulatory Authorities shall provide *incentives* to DSOs to procure services for the operation and development of their networks, which is currently banned in most Member States.

SUPPORT § 8 (AM 81) in the Parliament text

- National Regulatory Authorities shall adopt a set of indicators for *measuring the performance of system operators*, publish a report every 2 years with recommendations for improvement when necessary.

SUPPORT the new § 9a (AM 84) in the Parliament text and IMPROVE it by adding a reference to the Governance Regulation: this monitoring and reporting for more efficient operation of networks shall be included in the NECPs

ARTICLE 18 – Resource adequacy

- Member States shall monitor *resource adequacy within their territory* based on the European resource adequacy assessment and if a resource adequacy concern is identified, Member States shall identify regulatory distortions and/or market failures that caused it.

SUPPORT § 1 (AM 89) and § 2 (AM 90) in the Parliament text
OPPOSE § 1 and 2 in the Council text and the new art. 19a "National resource adequacy assessment" as they strengthen a national rather than European approach to resource adequacy

- Member States shall publish an *implementation plan* to eliminate the sources of the concern, building on the principles set in art. 3, to be revised/monitored by the Commission and ACER.

SUPPORT § 3 (AMs 91-96) in the Parliament text and refer to AM 112 (art. 32) for design principles for capacity mechanisms

ARTICLE 19 – European resource adequacy assessment

- All EU institutions agrees that ENTSO-E shall carry out, every year, the European resource adequacy assessment with a 10 years timeframe.
- Among others, the supporting methodology shall appropriately take into account the *contribution of all resources including generation, storage, demand response (existing and future).*

SUPPORT § 4.c in the Commission proposal, but IMPROVE it by adding a reference to art. 59 on the duty of the National Regulatory Authority to monitor and report the availability and potential of flexibility in the energy system

ARTICLE 23 – Design principles for capacity mechanisms

Capacity mechanisms shall:

- *not create market distortions* and *not limit cross-border trade*;
- select capacity providers in a transparent, non-discriminatory and market-based process;
- be *technology neutral* and set technical conditions for the participation of capacity providers which shall be open to all resources, including storage and demand side management;
- Ensure *remuneration is market-based*.

SUPPORT § 1 (AM 112 from a to i) in the Parliament text

ARTICLE 51 – Tasks of EU DSO entity

Among the different tasks, the EU DSO entity shall:

- facilitate *demand side flexibility and response*, and distribution grid users' access to markets.

SUPPORT § 1.d in the Council text

- guarantee *non-discriminatory and neutral access to data* regardless of the data management model, and *promote standardisation*, *cross-border data exchange*, with ENTSO-E where relevant to facilitate data exchange, cybersecurity and data protection.

SUPPORT § 1.e (AM 174) in the Parliament text

ARTICLE 53 – Cooperation between DSOs and TSOs

- DSOs and TSOs shall *exchange information and data* on the performance of generation assets and demand response, daily operation of their networks and the long-term planning of network investments.

SUPPORT § 1 (AM 178) in the Parliament text

- DSOs and TSOs shall *cooperate to access distributed generation, energy storage or demand response.*

SUPPORT § 2 in the Council text: coordination will ensure that committed resources to one system operator are not unexpectedly curtailed by another system operator, but IMPROVE it by specifying that coordination is needed for the definition of standardised market products (as introduced by the Parliament in AM 120 to art. 32 and AM 142 to art. 40 of the Electricity Directive)