WORKSHOP NOTE

C13-PC-71: Regulatory and Market Aspects of Demand-Side Flexibility

On 18 November 2013 a workshop was convened to discuss the CEER consultation *Regulatory and Market Aspects of Demand-Side Flexibility* (DSF). The comments set out below present some of the themes that were raised at the workshop; they represent the views of individuals and / or groups present at the event, and do not necessarily represent CEER's position. Where participants expressed similar views they have been grouped into the narrative below.

Benefits and Barriers to DSF

Benefits of DSF include avoided, reduced and postponed investment in network infrastructure and new generation. It can reduce consumers' bills and enable increased integration of intermittent (and possibly distributed) generation, thereby supporting renewable energy and reducing emissions. DSF can also enable better management of the networks, and has value in day ahead and intraday markets as well as in the balancing market.

In terms of **barriers**, in some Member States' market rules prevent or make it uneconomic for some industry players to take part in the DSF market, for example where requirements for participating in the balancing market effectively close it to aggregators. Many Member States still have regulated prices which are a barrier to DSF, and in addition there are grid tariffs (for example those based on power demand per KW) which do not incentivise DSF. The absence of smart meters in many Member States means that there is not enough granularity of data for DSF to take place, and there is also a widespread lack of intelligent infrastructure. In addition, community groups have found it difficult to engage with suppliers over provision of DSF services.

Regulatory issues

Parties offering DSF services need **clear rules** and operating arrangements. Current legislative and regulatory parameters for Distribution System Operators (DSOs) may need to become more flexible to accommodate more innovative activities (such as proactively engaging with heavy loads). It is important that **regulation is coordinated** with the rollout of DSF-related products and services, and that it both recognises the varying scale of opportunity between different markets and sectors and is flexible enough to accommodate but not constrain the emergence of new business models.

Aggregators could have a significant role to play in the DSF market, but given their potential role as an independent intermediary between suppliers and consumers there is a question regarding whether they should be subject to **consumer protection regulation**. Parties with a combined supplier/aggregator business model need very transparent billing to make their charges for each service clear to the consumer.

Consumer issues

Before the market is able to offer tailored (and therefore effective) DSF products it may need to have access to the data reflecting the relevant consumer load profiles, which may in turn lead to **data protection and consumer privacy** issues. Similarly, consumer data is critical for enabling aggregators to realise the value of DSF: however, there are difficulties with DSOs sharing consumer data with aggregators, particularly if there are multiple DSOs operating in the same area.

Transparency is paramount for engaging consumers in DSF, but not at the cost of increased complexity. An approach requiring consumers to be 'educated' about the benefits of DSF is less helpful as an approach than offering DSF as an **engaging**, accessible, transparent and fun product. Ideally, consumers should seek out the DSF market because they recognise its value.

On a similar point, there needs to be **sufficient (and visible) value** resulting from participating in DSF to prompt the consumer to engage with it: the value of DSF is often unclear to consumers at present. By aggregating consumers' participation with DSF, more viable scales emerge which balance value to consumers with value to aggregators (i.e. the transaction value at scale benefits both consumers and aggregators). However, DSF participation is so far mainly a business model for industrial customers with flexible loads.

In the short- to medium-term **aggregators** are key to the emergence of DSF services and value, but over the longer-term (and with the emergence of 'smart home' automation) the need for aggregators may decline as consumers will not need third party expertise to participate in DSF. However, some consumers will be unwilling or unable to participate in DSF regardless of the incentives or enabling technology / services.

Wider issues

The market needs to evolve through multiple and **consequential stages** before the full value of DSF can be realised. Rules governing the parties involved (including industry and consumers) should be simple, but need to consider future product and network development models (e.g. new products, electric vehicles).

In addition to the electricity sector, there is potential for storage (e.g. pumped heat) to contribute to DSF. There may also be potential for involvement from the **gas sector**; however, opportunities and barriers for gas DSF are very different to those in the electricity market (for example due to the more static prices in relation to forward gas prices). There may be benefits to considering the DSF opportunities presented by having the option to switch between different fuel types.