

Harpal Bansal
Smarter Markets
Ofgem
9 Millbank
London
SW1P 3GE

15 March 2012

Dear Mr Bansal,

PROMOTING SMARTER ENERGY MARKETS

Thank you for this opportunity to respond to your consultation on 'Promoting Smarter Energy Markets'. We warmly welcome Ofgem's initiative and look forward to working with Ofgem in developing a framework that fully supports the potential of new technologies to deliver smarter energy markets.

We are broadly in agreement with the vision and priorities that Ofgem sets out in the consultation document, and believe Ofgem has provided a timely and useful review of the challenges that lie in the way of realising the full benefit of smart meters and smart markets.

Our key messages in response to this consultation relate to the immediate priorities for action. Much needs to be done if we are to realise the full benefits – implementing smart meters is no more than an enabler – and we cannot afford to delay preparation for these changes. Ofgem has an important role to play in leading and coordinating industry activity, and we believe it should focus initially on three key areas:

- **Settlements processes** and associated codes will need a complete overhaul if benefits such as peak smoothing (via Time of Use pricing), better forecasting, smart grids etc are to be realised. It is unclear whether the necessary changes can be achieved through the 'business as usual' code modification process, and we would encourage Ofgem to consider whether a Significant Code Review may be warranted at the appropriate stage. As a first step, we would encourage Ofgem to develop a detailed roadmap showing all the changes that are required before the benefits of smarter markets can be realised and their inter-dependencies.
- **Customer switching** is the engine of the competitive market and Ofgem, rightly, points out the need to make the mechanisms of the Change of Supplier process operate as swiftly and securely as possible to engender public confidence. In our view, this process can be greatly improved by reducing the number of data transactions involved and that is best achieved through

maintaining a single master data record, which involves centralising registrations, data processing and data aggregation. While a roadmap towards this end can, and should, be developed now, it is not until all of this is in place that we can commence the detailed work towards delivery of other goals, such as next day switching.

- **Information measures:** Ofgem is proposing a range of highly interventionist tariff restrictions in its Retail Market Review. Our understanding of the proposals is that Time of Use (ToU) tariffs would be restricted to the niche 'non-standard' product market, and dynamic ToU tariffs could be ruled out altogether. We believe this would be unhelpful for smarter market ambitions and urge Ofgem to reconsider its RMR proposals, focusing instead on its proposed 'information measures' (such as standardising terminology across suppliers) which would be entirely positive for smarter markets.

Finally, we would reiterate the need for Ofgem to maintain its leadership role in taking the smart strategy forward, ensuring that changes are made for the greater good, reducing industry costs through streamlining processes and consolidating industry governance.

Our detailed responses to each of your specific questions are to be found in the appendix to this letter. Should you wish to discuss any aspect of our response or the matters raised, please do not hesitate to contact David Ross Scott (davidross.scott@scottishpower.com).

Yours sincerely,

A handwritten signature in blue ink that reads "Rupert Steele". The signature is written in a cursive style and is positioned above a horizontal line.

Rupert Steele
Director of Regulation

Appendix

CHAPTER 3, ENABLING RETAIL MARKET DEVELOPMENT

Proposition 1: Time-of-use tariffs should help many consumers lower their energy costs, but improved engagement will be needed to help all consumers make informed choices.

Proposition 2: More efficient use of demand-side response can lower overall energy costs, but this will need coordinated changes to regulatory and commercial arrangements.

Proposition 3: Innovation in energy services would increase the consumer benefits of smart metering and can happen without major change to the regulatory framework.

Proposition 4: Consumers will have more payment options, without changes to regulatory arrangements beyond those envisaged as part of the smart metering roll-out.

Question 1: Do you agree with the propositions set out in this chapter?

We agree with the propositions set out in chapter 3.

We think Time of Use (ToU) tariffs could be a key component of delivering Demand Side Response (DSR) in the medium term and, therefore, to lowering consumers' energy costs (particularly electricity). Getting the right approach to consumer engagement will be pivotal to ensuring sufficient take-up of ToU tariffs and fulfilling the wider aims and objectives of the Government's commitments towards a low carbon economy.

Smart meters will provide customers with consumption data that better informs their choices about how and when to use energy, and ToU tariffs will offer a means of incentivising the displacement of consumption away from peak periods. With the ultimate success of the Smart Meter Implementation Programme in some measure dependent on DSR, suppliers should be encouraged to make ToU products available to customers as soon as practicable.

Developing these tariffs and tailoring them to customers' needs will require detailed and comprehensive analysis of half-hourly consumption data recovered from smart meters, including data from *before* the introduction of ToU tariffs. For example:

- in order to assess the commercial and distributional impact of ToU tariffs *ex ante*, suppliers will need to better understand the current spread of consumption profiles and how different categories of consumers are likely to respond;
- in order to evaluate the effectiveness of ToU tariffs *ex post* (and refine them accordingly), suppliers would need before and after data to determine how consumption patterns have shifted in response to the price signal.

However, the Government's current policy proposals in this area would dictate that, before the supplier could utilise smart meter data in this way, the customer must have expressly consented to it. Whilst we recognise that there is some sensitivity surrounding this issue, we are concerned that such an approach will frustrate tariff development and impede delivery of customer benefits. Whilst it is reasonable to rely on consumers giving their consent when they opt for a ToU tariff, this will not address the need for '*before*' data, and we believe that privacy concerns could be mitigated by appropriate anonymisation.

ToU prices are currently available to domestic consumers in the form of 'Economy 7' tariffs, typically used by consumers with electric heating, who can benefit from cheaper night time

prices. Smart meters will enable more granular *static* ToU tariffs (with a pre-determined price structure depending on the half-hour and potentially the season) and *dynamic* ToU (DToU) tariffs where the price changes dynamically, eg in response to wholesale market prices and/or network congestion.

The potential benefits of dynamic ToU pricing will increase in future with the more volatile market conditions likely to arise from the unpredictability of wind generation, increased penetration of electric vehicles, dynamic management of smart grids etc.

In our view, maintaining consumer engagement is best achieved by encouraging a healthy market for energy services. Such services could be delivered by any number of service providers, offering an almost unlimited range of services, although they are likely to include home energy management packages.

In this context we are concerned that the ‘tariff simplification’ measures that Ofgem is proposing in its Retail Market Review could severely impede consumer engagement with ToU and DToU tariffs. As the RMR proposals currently stand, suppliers would not be allowed to offer ToU tariffs as part of their ‘evergreen’ product offerings, but would instead be obliged to position them within their ‘non-standard’ product portfolio. Furthermore, it appears to us that DToU tariffs may be ruled out entirely¹.

Whilst this may not be too much of a problem in the early stages (since more sophisticated consumers who engage with the non-standard product market are also likely to be early adopters of ToU tariffs), it would impede the widespread adoption of ToU tariffs that may be required if significant ‘peak shifting’ is to be achieved. (In essence, consumers must be prepared to change behaviour, using appliances and therefore energy at different times of the day/night to achieve the associated benefits.) Although we are sympathetic to the need to improve consumer understanding of tariffs, we would make a distinction between “simpler tariffs” and a “simpler explanation of tariffs”. It is not necessarily a problem if tariffs become more complex, provided the explanation of them can be kept simple². We therefore believe that Ofgem’s RMR tariff simplification initiative should focus on ‘information measures’ rather than tariff restrictions.

In our view, dynamic ToU tariffs will offer considerable scope for benefits realisation. However, the full potential of DToU cannot be realised without smart distribution grids (which are needed to manage network capacities) and without dynamic, cost-reflective network use of system charges.

Regarding payment options, we agree that consumers should find greater choice is available to them in the smarter market, but these choices will still, fundamentally, involve payment in arrears or in advance.

Clear information will be essential to ensure that customers correctly interact with ToU tariffs and do not inadvertently run up high charges.

¹ Under Ofgem’s proposals, non-standard tariffs that provide for dynamic variations in price would be allowed only if ‘the contract provides that variations to the price will occur automatically only in a manner which is fully linked to fluctuations in a published and transparent stock exchange quotation or index or a financial market rate that the licensee does not control’. This might conceivably permit tariffs that reflected underlying wholesale prices (if such prices could be characterised as a ‘financial market rate’) but it would almost certainly rule out pricing to reflect other factors such as local network congestion.

² For example, a mobile phone tariff might offer monthly minutes, texts, and data allowances, but these are merely headline messages, behind which is a complex tariff.

Question 2: For each proposition, have we identified the elements of current market arrangements that could help or constrain the realisation of benefits for consumers?

We agree that many of the constraints likely to impact upon benefits realisation have been identified in the consultation. Nonetheless, we also think there are others that have not and that all should be subject to detailed review to expose potential implications.

With regard to static ToU tariffs (Proposition 1), we think most aspects have been considered, whereas many of the real benefits of DSR (Proposition 2) are largely dependent on dynamic ToU, as discussed in our response to Question 1. We would also draw your attention to our comments regarding changes to the settlement arrangements for both gas and electricity markets. A number of cost issues clearly need to be tackled if we are to realise the benefits to the settlement arrangements that are to be found in market convergence. However, we consider the medium term benefits to the industry to be so material that these issues should be tackled as a matter of priority.

Factors not identified in the consultation document include:

- Incentives – it is a key enabler of the virtuous circle of behaviours, which will underpin the smarter market, that all stakeholders are properly incentivised to respond to the signals that are relevant to them;
- Smart Grids – although some reference is made to smart grids, their central role is not clearly defined; and
- Energy Service Companies – we believe they need to be signatories to the SEC.

Question 3: For each proposition, have we identified the key issues, such as the timescales for any changes to market arrangements?

We agree that most of the propositions in the consultation document could be achieved with little or no change to the regulatory framework.

Question 4: Are there additional opportunities for development in retail energy markets that we should include in the scope of our work?

In our view, centralising record management could better facilitate competitive activity. The current processes require the exchange of large volumes of information between suppliers, agents and the registration systems, during customer switching. Moving away from the existing supplier hub principle to create a central record repository with a ‘hub and spoke’ approach instead, would allow the DCC to offer a service, where it records and hosts all the registration and meter details, alongside those of the appointed supplier.

In this way, centralising registrations, data processing and data aggregation, will largely eliminate the need for data transfer and the likelihood of data corruption or erroneous transfers and thus improve the overall success rate of the Change of Supplier process. A possible drawback of centralised data storage could however be an increased level of risk from an information security perspective, and this would need careful consideration within the design.

CHAPTER 4, IMPROVING MARKET PROCESSES

Proposition 5: Settlement arrangements should use actual daily (gas) and half-hourly (electricity) meter reading data in order to improve their accuracy and efficiency.

Proposition 6: The change of supplier process should be reliable and fast, so that customers can confidently switch supplier on a next day basis.

Proposition 7: Electricity data processing and aggregation services should be procured centrally in order to reduce costs and support fast customer switching.

Proposition 8: The Smart Energy Code should be used as a vehicle to consolidate existing industry codes dealing with retail issues in gas and electricity to facilitate market development and reduce administrative burdens.

Question 5: Do you agree with the propositions set out in this chapter?

With regard to Proposition 5, we agree with the principle of half-hourly reconciliation in electricity and daily reconciliation in gas. However, it will be important to understand the cost and data complexity implications of such a move. We also believe there could ultimately be merit in moving gas reconciliation to half-hourly as well, and this should not be ruled out. Despite the dissimilarities between the fuels (eg gas is easily stored), there might in future be efficiency savings from harmonising their respective settlement processes, and there could conceivably be a future role for half-hourly DToU pricing of gas, if (say) smart gas distribution networks became a reality. To be clear, we are not advocating that gas meters be read every half-hour, but rather that consideration be given to future-proofing the technical specification for smart gas meters to include this possibility. (We note that the proposed minimum technical specification for a smart gas meter is to include multi-rate recording capability.)

We agree that the customer switching process should be as swift as possible (Proposition 6) and would support moves towards centralising data records to promote this. However, we do not agree that hindrances to moving the switching process on to a 'next day' basis all emanate from supplier processes; rather, many of these result from legislation and regulation specifically aimed at protecting consumers from inappropriate sales practices. While we would be keen to see swifter switching arrangements put in place, this should not be at the expense of consumer protection.

The benefits of using smart meter data in the switching process are appropriately identified in the consultation, although we would again refer to our response to Question 4, by reiterating the need for a central repository/management of data records to promote and maintain data accuracy, prevent erroneous transfers and make the switching process smoother. It is also worth mentioning that many of these benefits are likely to be lost to customers whose meters are being operated outside of the DCC, potentially making them less attractive to alternative suppliers.

We support the principle of central procurement of data processing and aggregation services, as outlined in Proposition 7.

We also support the principle of code consolidation (Proposition 8) and see an opportunity to deliver this through the wider development of the Smart Energy Code (SEC). A broad range of industry codes have grown up over the years and although these codes now share a more coherent approach than in the past, the need for market participants to accede to so many codes and to resource support of their disparate change mechanisms, still represents a significant overhead and a barrier to entry. We would, therefore, welcome an initiative to

assimilate as many as possible of these retail codes, or functions of these codes, into the SEC.

However, we think such events are best timed to coincide with the migration of Registration to DCC, which we consider to be the earliest feasible opportunity. We also recognise that changes to industry process take considerable time to develop and deliver and that code consolidation cannot take place over night.

We also believe that regulatory oversight of the processes of consolidation is crucial to preventing sub-optimal outcomes. Many organisations' vested interests will be threatened by a process that they will, nonetheless, need to be closely involved in. This will demand careful management to avoid code expansion at the expense of code consolidation.

Question 6: For each proposition, have we identified the right sources of costs and benefits associated with achieving them?

Considering Proposition 5; we broadly support initiatives that lead to more accurate settlement and reconciliation. However, while access to actual read data will undoubtedly improve the accuracy in determining the energy volumes that have been consumed in the previous half-hour, it is less clear the extent to which the data can be used to more accurately forecast consumption in the next. In any event, a degree of profiling will be required and it is, perhaps, in their ability to granularly segment the market that suppliers will be able to make best use of more accurate consumption data.

For Proposition 6, we largely agree with the principles of next-day-switching and with Ofgem's identification of the likely benefits. It would of course be necessary to establish the likely costs as well. We are less persuaded, however, of the extent to which delivery of the changes necessary to realise the benefits of next-day switching is within the gift of either suppliers or regulator, and we believe that account needs to be taken of the broader canvas of consumer protection legislation in this respect. Nonetheless, assuming cooling-off periods can be relaxed due to the ready reversibility of Change of Supplier events, operating a central repository for data, alongside centrally procured data processing and aggregation, would undoubtedly improve the success and speed of the switching process overall. However, we would re-emphasise our view that these efficiencies could not be realised without the full alignment of gas and electricity processes.

Elsewhere, Ofgem has identified the potential for imbalance risks to suppliers from losing customers at short notice and we would point out that small suppliers may be less able to mitigate these risks or their consequent impacts.

We fully support the principles of Proposition 7 and recognise the benefits set out in the consultation document as aligning closely to those identified through our own deliberations.

Similarly, we consider the sources of costs and benefits associated with Proposition 8 to have been well captured in the consultation document.

Question 7: For each proposition, have we identified the key issues, such as the timescales for any changes to market arrangements?

Proposition 5 will deliver considerable benefits in terms of accurate settlements. However, there are a number of cost implications from the current arrangements (eg both Distribution Use of System and metering charges vary with settlement class) that will need to be addressed before such a move should be considered. Nonetheless, we support the

principles of moving energy settlements to a daily basis for gas and half-hourly basis for electricity, provided that the cost is justified and the timing of any such move is carefully considered within the context of the GB smart meter roll out. However, as identified in our response to Question 2, we believe the issues of metering and DUoS charges need to be tackled as a matter of priority.

With regard to Proposition 6, we take the view that next-day switching arrangements should not be considered outside the context of a centralised data management regime (see our response to Question 4).

We fully support central procurement of data processing and aggregation services (Proposition 7) and would welcome early delivery of this initiative. In all practicality, however, we recognise that it would be more opportune to align these changes with the transfer of registrations to the DCC.

We agree with the timescales suggested in Proposition 8, such that initiating the process to assimilate other codes into the SEC should be concomitant with the migration of registration services to the DCC.

Question 8: Are there additional opportunities to reform market processes that we should include in the scope of our work?

We welcome Ofgem's approach in issuing this consultation and to setting out, at a high level, the challenges it believes will face the delivery of the smarter market.

Whilst recognising that fundamental industry change will be challenging, we would like to see detailed and independent reviews of both the Settlements and Change of Supplier processes with a view to their early optimisation.

The next steps are crucial to releasing the benefits locked-up in the technologically innovative solutions contemplated for smart value chains. The industry cannot be expected to overcome these challenges in isolation; rather, it will take strong leadership from Ofgem for all of the stakeholders to realise the maximum benefits.

Getting the right incentives in place to support the behaviours of all stakeholders is an early requirement of this process, but we first need to achieve a common recognition of what those incentives are expected to deliver. We believe it is crucial to this process that we share a common understanding of the direction of travel along with a clear understanding of where the milestones are and what they will look like. Ultimately, if we are to be successful in their realisation, we all need to share in a single vision of the end goals.

ScottishPower
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