

Question 1: Do you have any comments on the proposed minimum functional requirements and arrangements for provision of the in-home display device?

British Gas believes that In-Home Displays are an essential part of helping customers to understand their energy use. We are already providing in-home displays to domestic customers when we install smart meters. In our Customer Charter we fully commit to providing advice to help customers understand how to use their IHD.

The proposals for customers to choose alternatives to an IHD provide them with choice and Suppliers with improved potential to innovate. We support these proposals.

We are supportive of the minimum functional requirements that are set out but note that there are some specific complexities with providing real time information for gas use. For example, the regulatory requirements, as set out in the Thermal Energy Regulations, require the use of calorific values in order to calculate consumption for billing purposes. These calorific values are produced by Network Owners after the event and on a daily basis only.

Question 2: Do you have any comments on our overall approach to data privacy?

We are pleased Ofgem recognises the importance of protecting customer privacy. Data protection and security are of utmost importance to all businesses where data is key, including British Gas. We already hold and use large volumes of customer data, with around 16 million customers and a relationship with half the households in the UK. This includes sensitive information covering, for example, credit risk (from credit reference agencies), account records and payments. Therefore, there is a strong commercial imperative for us to ensure customers trust us and how we handle their

information. It is simply not in our interests for either the Programme as a whole, nor our work as a Supplier, to be undermined through poor privacy and security practice.

We support the principles of Privacy by Design and Security by Design. However we do have concerns about how this may work in practice given we have a Data Protection Act (“DPA”) in force which would of course apply in these circumstances. We are keen to ensure Ofgem does not duplicate data protection laws that are already in place; indeed it would undermine the DPA and cause consumer confusion. It is important that current law is used unless it is demonstrably inadequate. We have no such evidence to date. Nor are we aware of any concerns raised by consumers with this regard. Any further guidance developed relating to data privacy should be to contextualise, explain and reassure rather than redefine principles of law.

Smart metering will bring a big change in the volumes of consumption information that British Gas holds on its customers. However our privacy and security responsibilities under the DPA still apply in this context. This information can provide huge benefits for customers and us without jeopardising the fundamental safeguards that we have a duty to apply to data in our hands. Care must be taken not to undermine the potential benefits of smart metering by strangling Suppliers with excessive data access constraints. We need to be able to collect and use data in order to offer fit-for-purpose tariffs (that help customers switch load and deliver demand-side management), reduce theft, prevent customers getting into debt, and deliver other customer focused improvements in service. For example, benefits included in the Smart Metering Impact Assessment are set at £390m and £113 million respectively for time of use tariffs and theft reduction. In addition, British Gas believes that the potential benefits of theft detection are significantly greater at over £440m. Delivery of these benefits simply will not occur if Suppliers are prevented from accessing information we need

As an absolute minimum, Suppliers need to be able to access information on a half-hourly basis for electricity and on a daily basis for Gas. These rates are

consistent with electricity and gas energy balancing frequencies and purchasing units. We have set out below some examples of how this consumption information will be used. Each use delivers benefits to consumers that are contained in the Impact Assessment. We hope this will show that the uses are not intrusive or harmful but are in fact beneficial to both consumers and Suppliers.

It is important for Ofgem to note that these uses of consumption data are not new. We already perform each of these activities to a greater or lesser extent with the customer consumption data we already hold, and each of these uses is already covered in our privacy policy. The difference in the smart metering environment is that we can do more with this data; deliver more sophisticated and customer-centric products, provide higher quality, more personalised quality energy efficiency advice, more proactively detect and prevent theft; and so on - delivering benefits for both customers and British Gas that are considered in the Smart Metering Impact Assessment.

Helping customers choose appropriate products and services

A key benefit of understanding more about how our customers consume gas and electricity is that we can help those customers choose the most appropriate tariff. For example, time of use tariffs will generate considerable interest but may not be appropriate for all customers. We can use a customer's own consumption data to help them determine whether they would save money were they to switch to a time of use or any other tariff. A similar approach is used by mobile phone companies to help consumers choose between different mobile phone tariffs. In addition, we will be able to proactively provide 'best tariff' advice to customers, advising them on the cheapest or most appropriate value tariff available to them based on their current consumption patterns.

Developing new products and services

Consumption information will enable us to better understand patterns of energy use. In turn, we can use this understanding to develop new and innovative products and services, which help consumers to reduce their bills

and manage their energy more effectively - key goals of the Programme. By using real data based on real customers, these new products and services will better meet the needs of consumers precisely because they are designed around real customers and their usage.

More accurate energy efficiency advice

Most energy efficiency advice is currently based on average figures released by the Energy Savings Trust or others. Smart meters can help deliver more accurate, personalised energy efficiency advice to customers by using up-to-date consumption and tariff information from a household's own meter. This advice can be proactively communicated to customers as a value-added service, as well as allowing us to make more detailed commercial services available, such as energy efficiency audits. Given that the IA estimates consumer energy savings of £4.468bn, better energy efficiency is an essential factor in delivering the benefits of smart metering. Energy efficiency advice is most helpful and effective when it is clear and relevant to the customer. It is important we are free to provide the advice and not prevented by onerous restrictions.

Improved prevention and detection of Energy Theft

Theft of energy costs honest paying consumers, including the vulnerable and the fuel poor, estimated at £440m every year. Suppliers are open to theft because we are unable to tell when a meter is being tampered with and therefore cannot tell when energy is being stolen. Energy can be stolen by bypassing the meter, so no matter how sophisticated the metering equipment it can always be circumvented. However smart meters can significantly improve our ability to detect and prevent theft. By analysing unusual falls or patterns in energy consumption, we can proactively investigate and prevent theft, leading result to significant costs savings. The IA anticipates a benefit of £113m per annum from theft reduction. We believe the problem of theft is larger, and the potential benefits greater. However, improvements in prevention and detection will require access to more detailed and frequent meter reading than mere billing data can provide. We cannot deliver these benefits without access to the data; those who may wish to steal energy are

unlikely to “opt in” to provision of consumption data that would mean that they could get caught.

Improved energy procurement and management

Like other suppliers, British Gas buys electricity in half-hourly units and gas in daily units at variable rates. These units are then sold on to customers at set rates in the form of their tariff. Consumption information available at present does not enable us to analyse in detail the differences between the purchased rates and prices and rates given to customers, nor how these vary according to different times, dates and geographical location. Holding consumption at levels equivalent to these purchase periods will enable Suppliers to better understand hedging needs and to improve forecasting models and Settlement methodologies. More effective buying and selling of gas and electricity could provide a crucial ability for Suppliers to put some downward pressure (or restrict upward pressure) on prices at a time when network costs, green energy and such other costs are pushing end user prices upwards. It is vital we are not blocked from using consumption information for this purposes.

Whilst we are clear that it is imperative that suppliers can access more detailed levels of consumption data than we can at present, we should be clear that British Gas will not operate a policy of accessing any consumption data it can, just because it can. Smart meters will be capable to collecting information down to a ‘per second’ level. Such detailed information will not be collected by British Gas without a customer’s agreement. Whilst it is reasonable and necessary for us to collect more detailed information than we do at present (including at half hourly level), we fully recognise and agree that suppliers need to be able to justify the collection of the information they obtain, at whatever level. Our meters will collect consumption data only at a level which is legitimate, reasonable and needed for the interests of our customers or us. This in practice means that meter reads at a more granular level than half hourly are only likely to be accessed where a customer wants specific services, such as a detailed energy efficiency audit or when they sign up for some other product or service involving this level of data – and therefore agree to us accessing it. These are likely to be commercial offerings

that the customer chooses or ones offered under social or vulnerable customer support schemes.

The data privacy regulatory framework – the Consumer Safeguards

At an industry level, we broadly agree with Ofgem's principle that consumers should "*choose in which way consumption data shall be used and by whom, with the exception of data required to fulfil regulated duties*". We expect that those without a direct relationship with a customer will only be able to access and use consumption information to fulfil regulated duties (in the absence of a customer's agreement). Suppliers with a relationship with a customer however need more flexibility. Within the context of a supplier-customer relationship, for the reasons articulated above, it is vital to ensure we are able to obtain consumption information from meters where we reasonably require this to run our business, serve our customers, and deliver the benefits that are set out in the IA.

The best way to protect customer privacy within this relationship (and maintain Supplier ability to deliver on the potential of smart metering) is by using the current Data Protection Act 1998 (DPA) to regulate the use of consumption data. Consumption information, like other customer related personal and account details, is 'personal data' for the purposes of the DPA. This is a well-established framework for determining how to handle personal information, in operation for over 25 years in the UK. We see no reason of policy or law to reinvent the wheel and develop a whole new set of laws and regulations when current laws can be used effectively and are more than adequate to achieve the goal. We have seen no analysis of the DPA or other laws that would support taking a different approach. Furthermore, the EU Commission is reviewing the current Data Protection Directive from which the Act is derived so any weaknesses in the Act, if any, can be fed into that review.

As regards its practical operation, the DPA requires us to be able to demonstrate that any uses of consumption (or other data) are necessary in

order for us to pursue our legitimate interests. The Act also requires us to ensure appropriate protections for consumer rights are in place and ensure customers are told how their data is to be used. This flexible but strong approach provides a good basis to regulate Supplier use of consumption data. Where suppliers can show they need consumption data to pursue legitimate purposes, and if they have taken steps to protect the fundamental rights and freedoms of customers, they will be able to collect and use data, subject to compliance with the other aspects of the data protection principles. Where they cannot, consent from the customer is likely to be required, save for debt collection or other activities related to enforcing contractual rights. The DPA also facilitates the provision of opt-ins or opt-outs, if needed, such as the right to opt-out from unwanted marketing messages (including marketing messages to the IHDs).

A further benefit of the DPA, particularly for consumers and their representatives, is that it would prevent suppliers from obtaining excessive, unnecessary consumption data (a requirement of the third Data Protection Principle) – reinforcing the stance we outlined above. The DPA contains strong enforcement provisions, including new measures introduced in April this year. If any of the Principles are broken, the Information Commissioner can take regulatory action, including enforcement action to force Suppliers to take compliance steps. For example, he could order us to delete or cease collection of any information that would be in breach of the Act. The Commissioner can fine for serious breaches of the Act (currently up to £500k). In addition, the Ministry of Justice could, if it were justified, make Suppliers (and any other business) subject to the Assessment Notices power under s.41A-C. This would give the ICO the right to audit Supplier compliance without consent. The proposed Privacy Charter could also be made a formal code of practice under the DPA.

The key advantage of this DPA-based approach is that systems, processes and compliance mechanisms are configured to comply (though some changes and developments will of course be required in line with increased privacy risk resulting from more detailed data being held). This will help to lower

implementation costs. British Gas customers are already informed about how their data is to be used via our privacy notice, which is included in terms and conditions and on our website. This is also approved by plain language groups to ensure it is clear and easy to understand. As discussed above, these privacy notices set out how we use customer data. These purposes will not fundamentally change in the smart metering world. However, because of the more detailed information available, the great consumer benefit will be in the form of a marked improvement of the range of products and services, the quality of the energy efficiency advice, customer service and Suppliers' ability to prevent and detect theft and debt.

We note that Ofgem's consumer research¹ shows consumers are not overly concerned about the impact on their privacy of Supplier access to their consumption data. The report notes *"Far more participants expressed doubts about the costs, reliability and the devices causing problems for elderly people than voiced concerns about data privacy and how the data collected might be used"*.² Customers *"were generally relaxed about the idea of energy suppliers having access to more accurate and up-to-date usage data"*.³ There *"were no widespread concerns about energy companies having access to information about their energy use"*⁴ and that where concerns were raised, *"these issues were not echoed or supported by the majority of other participants"*.⁵

These views mirror our own experience and understanding of consumer attitudes to privacy. Consumers want to know their information is being kept safe, being used fairly and that it is protected from misuse; but they do not necessarily want to be actively involved in every facet of how companies manage their information, whether via preference choices or other mechanisms.

¹ Ofgem's 'Consumers' views of Smart Metering - Report by FDS International'

² Page vii

³ Page 10

⁴ Page 16

⁵ Page 15

We must emphasise these conclusions and views do not mean that we believe there should be anything other than strong privacy protection in place; there must. They do, however, support the development of a simple, consumer-friendly, commercially-viable approach – using current laws so far as possible. The focus should be on ensuring that consumption information is used in fair, reasonable and transparent ways, and that customers are protected from misuse. Consent is not the ‘be all and end all’; other protections are equally important.

The burden of managing lots of consumer preferences would also be costly. Each preference available to a customer would need an opt-in or opt-out box in each of a Supplier’s information systems requiring significant IS changes (adding to the costs included in the IA), whilst staff would need to be trained in how to collect and administer preferences and how to use new or changed IS systems. At the very least, any preference would need to be very clearly defined and targeted, but more importantly, Ofgem should be really clear these are genuinely what consumers want and value before requiring suppliers to put them in place. Ofgem’s consumer research suggests a negative answer to both these points.

We strongly believe a programme of consumer education is needed to raise consumers’ understanding of what smart meters are, what they are not, and how information from those meters is used and protected. Such exercises have been undertaken for a number of years by credit references agencies. This approach has helped the public to understand what credit information is used for, how they can access it and get incorrect information corrected. It also provides an opportunity to tackle myths (for example, the existence of credit black lists). A similar approach would be helpful in the smart metering context and go a long way to avoiding consumer misunderstanding. British Gas is keen to work with Ofgem, Consumer Focus and others to develop such an education and awareness programme. To help with this, we are seeking to develop more detailed consumer guidance on how their consumption information is used, as well as other education tools.

Finally, it is vital that suppliers are able to be a part of the Privacy & Security Advisor Group. This will ensure a practical, real-world understanding of managing data privacy and security is included in the Programme. A workable, but customer-focused privacy framework may otherwise not be developed.

Question 5: Do you have any comments on the proposed approach to smaller non-domestic consumers (in particular on exceptions and access to data)?

British Gas welcomes the Government's proposal that Suppliers be required to take all reasonable steps to ensure that all smaller non-domestic customers have smart meters installed. We strongly agree that wherever possible a smart meter, rather than an advanced meter, should be installed at all supply points within the smaller non-domestic sector.

Our experience in this market sector confirms that there are many different types of non-domestic customer and that these customers have varying needs and requirements relating to the provision of data.

We therefore believe that the most appropriate way to provide customers with access to data should be on an agreed contractual basis between the Supplier and the customer and be based upon the specific requirements of the individual customer.

We agree with the proposed approach to exceptions and believe that the majority of technical issues identified to date can be resolved during the course of roll-out. However, there will undoubtedly be scenarios encountered where the installation of a smart meter will not be achievable.

Please see our response to the questions posed within the 'Non-Domestic Sector' supporting document for a more detailed response on the proposed approach to smaller non-domestic customers.

Question 8: Do you have any comments on the proposals that energy Suppliers should be responsible for purchasing, installing and, where appropriate, maintaining all customer premises equipment?

Whilst generally supportive of Energy Suppliers taking responsibility for customer premises equipment, we fully support the separation of the communications module from the meter because this removes interdependencies between fuels during the installation process and reduces the risk of meter asset stranding as communications technologies evolve. However we believe that the proposals for ownership of the WAN communications module as proposed in the Prospectus are unworkable. We support the DCC having the accountability for the end-to-end WAN connectivity and therefore the responsibility for owning the WAN communications module. Suppliers should be responsible for the installation and maintenance of the communications module. We recognise that processes will need to be developed to set out how Suppliers should manage the maintenance of shared infrastructure. These processes should protect the customer experience by facilitating a seamless process wherever possible.

Question 9: Do you have any comments on the proposal that the scope of activities of the central data and communications function should be limited initially to those functions that are essential for the effective transfer of smart metering data, such as data access and scheduled data retrieval?

We agree that data access and retrieval should be included in the initial scope of the Data Communications Company. In addition, we believe there is a case for the inclusion of registration processes from day one. We have already made clear our appetite for the earliest introduction of the Data Communications Company, and it is in this context that we believe that it may

be easier and faster to introduce registration processes into DCC from the outset.

New interfaces must be built anyway. Suppliers need an ability to communicate with the DCC and, if registration systems are not included, the DCC will need interfaces to be able to communicate with the registration companies (14 electricity systems, 1 system for large gas network owners, and 5+ for Independent Gas Transporters). The cost of excluding registration may be significant.

Changes to industry data flows and processes are required anyway. This is especially problematic with regard to electricity because of the complexity in the design that requires multiple interdependent data flows to be exchanged across numerous parties. Put simply, building on a green-field site may be far easier and faster than building on a cluttered brown-field site.

In addition, there are risks and costs associated with introducing a further implementation phase beyond 2013. Probably the biggest of these risks is that it does not happen at all and that our industry is left with a sub-optimal design and that, as a result, improvements in customer service do not rise in the way that is expected by customers and anticipated in the IA.

The DECC IA attaches £1.031 billion benefits to improvements of the change of supply process arising from smart meters. The only benefit we have identified, that arises from Option A, is a reduction in the volume of disputed change of supply readings.

By taking our current volumes of disputed reads and the operational costs to resolve them (and assuming costs are driven by market share) we can extrapolate the costs for the industry for the twelve year duration of the IA. If we make the generous assumption that all disputed reads will be eradicated, we are still left with **an IA benefits shortfall of over £1 billion**.

Further, the deployment of smart meters will increase the volume of data passing through industry processes. This has the potential to increase the number of exceptions that we receive and will be required to process. So without reform to industry processes there is potential for additional costs that could further erode the benefits set out in the IA.

Ensuring the alignment and synchronisation of many data items across multiple industry systems is problematic today. This is because there are multiple databases and multiple data flows required to populate them, which provide multiple opportunities for data to be processed out of sequence, corrupted and misaligned. Ownership for this data and responsibility for processing data flows is dispersed, so accountability is fragmented across various industry parties.

Failure to successfully align data on industry systems due to poor industry design and processes results in the following:

- Poor customer service – increased customer calls, escalations and complaints
- Delayed bills and consequential revenue loss
- Debt build up and bad debt write-offs
- Back office processing costs
- Management overheads including Supplier hub and agent management costs
- Misalignment between energy Settlement and billing that manifests as imbalance

We have set out below how three key industry processes - Change of Supplier, Meter Read Utilisation and Meter Exchange - are affected by the introduction of smart meters.

Change of Supplier

The present industry change of Supplier processes require the provision of numerous industry interactions across multiple industry participants.

Currently, following the acquisition of a customer, before billing and other activities can commence, meter asset data must be obtained from third parties with whom the new Supplier has no contractual relationship. This requires the exchange of multiple, sequential data flows. There are currently no incentives on third parties to provide these flows in a timely manner.

This issue will not be resolved by the introduction of smart metering and will continue to be problematic without reform:

- the incoming Supplier will continue to rely on the provision of asset information from the outgoing Supplier's agent
- issues will still be encountered where a meter exchange occurs at the same time as change of Supplier
- data will continue to conflict across different industry systems

Once an energy Supplier has access to a smart meter, they should be able to interrogate it and establish the meter details and readings that are necessary to enable billing. However today's industry arrangements prohibit the full legitimate use of that data and readings unless:

- they agree with historical data related to the meter
- the data is first passed through a daisy chain of agents that includes Meter Operators, Data Collectors, and so on

In our view this fundamental design issue will mean that ultimately only a proportion of the potential customer transfer issues and disputes will be resolved. If the present industry design remains we will still be dependent upon the receipt of data from our competitors and their agents before we can finally complete the change of Supplier process.

Meter Read Utilisation

Meter read provision and utilisation requires the collection and processing of meter readings onto Supplier billing systems and industry databases such that:

- they are processed in chronological order
- only accurate readings are processed
- they are permitted and processed within defined timeframes
- the overall energy use recorded on billing and settlement systems is the same.

Any misalignment between those systems will result in misallocation of costs between Suppliers. For example, if the industry data used to populate central Settlement systems is different to that used for billing purposes then there will be a difference between the energy use billed to customers and the energy use apportioned to Suppliers.

If meter readings are processed out of sequence, are inaccurate or conflict with previous read history, customers' bills can be either be delayed or inaccurate. However, today's industry read validation regime can result in a delay to meter readings being processed onto billing and industry systems. This delay creates a risk of subsequent sequencing issues. As the volume of readings increases the risk of sequencing issues proliferates.

Smart meters will enable the collection of greatly increased volumes of meter readings. However many of these may be wasted if the present industry arrangements remain unaltered as:

- only readings that agree with historical, legacy read data can be utilised
- good smart meter readings will be blocked by poor legacy data

- increased volume of readings will produce an increased volume of exceptions
- more meter exchanges will create more meter reading and meter asset conflicts

Until existing industry arrangements are amended it is expected that for only a proportion of smart meters will the reads obtained be able to be processed without either delay or exception.

A significant amount of resource and effort is currently undertaken to resolve exceptions resulting from the procurement of meter readings. For example we currently process 20.7m electricity meter readings per annum, of which 250k fail validation by the third party Data Collector and result in an exception.

We anticipate that the volume of smart meter readings procured will increase significantly. Without changes to the industry design, we expect the volume of meter readings that will ultimately result in an exception will also increase equivalently. Costs associated with the resolution of these exceptions will also increase.

Customers with smart meters expect, and have been promised, the provision of accurate energy bills. Our experience has been that whilst outdated industry arrangements persist, smart meter reads will be blocked or compromised by industry arrangements and particularly a validation regime that is no longer fit for purpose.

Meter Exchange

In order to complete the processing of data further to exchanging a meter we must ensure that at least thirteen data flows have been successfully transferred between six different industry parties. Until this is done subsequent meter readings cannot be processed.

Due to these complexities, there is a large volume of meter exchanges that result in either a delayed bill or an exception. We incur significant costs in resolving these issues, including direct operational costs of resolution and indirect costs such as debt build up, customer complaints, etc.

We believe that as the volume of meter exchanges and data traffic increases in line with the deployment of smart meters, so will the level of exceptions. This is because the synchronisation processes that already struggle today will not be able to keep up in the future, especially with the increased mismatches between meter asset data and meter reading data.

The ability provided by smart meters to upload meter readings and meter details direct from the new meter asset will not prevent or reduce the degree of exceptions and data misalignment described. Without reform the validation of these readings will continue to follow existing industry processes, so outgoing meter asset details and meter readings will only be useable if they agree with legacy meter asset and reading history. This means that new smart meter readings will be blocked until the legacy issues have been resolved.

This will be especially problematic during the rollout phase because of the high volume of poor quality legacy data. An approach to resolving legacy data issues will need to be developed in support of any industry solution.

It is not clear to us that any exclusion of reform to registration processes will delay the implementation of an enduring solution because, to date, Ofgem has not undertaken any analysis of to compare the critical path for the delivery of DCC with and without registration process reform. That analysis is

fundamental to any decision on when registration processes should be reformed and must be undertaken as a matter of urgency.

Question 10: Do you have any comments on the proposal to establish DCC as a procurement and contract management entity that will procure communications and data services competitively?

We are broadly supportive of this approach. What is most important is that there is a single point of accountability for the provision of these services and that Suppliers are not left exposed as a result of fragmented and confused ownership and accountability within the supply chain.

Naturally we are keen to make sure that the DCC delivers value for money and are in agreement with Ofgem's proposals as to how this can be achieved.

Question 11: Do you have any comments on the proposed approach for establishing DCC (through a Licence awarded through a competitive Licence application process with DCC then subject also to the new Smart Energy Code)?

We support the creation of a licensed entity with direct accountability to Ofgem. It is important that there is proper regulatory oversight of such a critical industry function. We therefore fully agree that it is inappropriate for the DCC to be created on the back of existing industry Licences, such as, for example, the way Elexon's obligations fall out of National Grid's Licence.

We are concerned over the relationship between the DCC and the administrator of the Smart Energy Code. The administrator must be completely independent of the DCC in order to avoid the services and industry rules specified in the Code being unduly influenced by the DCC. For example, if the DCC has a disproportionate role in the funding or control of the

code administrator then this might result in the creation of processes and rules that increase DCC revenues or reduce obligations.

Energy Suppliers have a natural incentive to reduce costs to remain competitive. Regulated entities have a natural incentive to increase revenues whilst minimising the services or service levels that they need to provide to earn them. Therefore, Energy Suppliers must be afforded maximum influence over the services that they receive because this will drive higher service levels and improved value for consumers.

Question 12: Does the proposal that Suppliers of smaller non-domestic customers should not be obliged to use DCC services but may elect to use them cause any substantive problems?

British Gas believes that the decision not to obligate Suppliers in the non-domestic sector to use the services of the DCC for meters with smart functionality is an appropriate decision at this stage.

We welcome the Government's view that the decision not to mandate the use of DCC in the smaller non-domestic sector could be reviewed in the future if it is evident that there are serious interoperability issues or if smart grid requirements are not being met.

Please see our response to the questions posed within the 'Non-Domestic Sector' supporting document for a more detailed response on the use of DCC services and interoperability.

Question 13: Do you agree with the proposal for a Smart Energy Code to govern the operation of smart metering?

British Gas fully supports the introduction of a Smart Energy Code, but do not support the governance structures that are proposed (for the reasons set out

in answer to Question 11 above). These governance structures leave the DCC with undue influence over the services that it needs to provide and will thus deliver poor outcomes for energy suppliers and consumers. Essentially the proposals allow the DCC to adopt a role of game keeper and poacher and this is not appropriate.

We recognise that fairer more appropriate governance structures will take more effort and time to establish, but do not believe that this is a critical path activity. Moreover once governance structures are established they are very difficult to amend and for this reason they must be fit-for-purpose from day one.

The establishment of a dual fuel code creates an opportunity to fully harmonise common processes in the electricity and gas sector. The Code will provide the framework for improved data quality, enhanced processes and should reduce overall the regulatory burden associated with industry governance.

Question 14: Have we identified all the wider impacts of smart metering on the energy sector?

The assumptions that have been made about the meter inspection regime are fundamentally flawed. We have explained this and the resulting £2.69billion IA risk to Ofgem on numerous occasions and are disappointed that this has still not been recognised in the Prospectus..

Today meter inspections are carried out during a pedestrian routine meter reading at relatively minor incremental cost. The additional activity associated with a visual inspection of the meter is negligible. Typically we visit a domestic customer's premises eight times every two years⁶ to obtain a meter reading, and therefore accumulate an overall access rate of over 90% over

⁶ For some non domestic customers there can be as many as 24 visits in two years.

this time period. Therefore, there are only a small number of visits required solely for the purpose of a meter inspection

When routine meter readings are not required, a dedicated meter inspection visit to a customer's premises will be required. The costs of this dedicated visit have not been factored into the IA.

There is a direct relationship between the number of visits made and access rates. Routine pedestrian reading costs are cheap, ad hoc visits are expensive, not least because typically these are geographically dispersed, and so not pedestrian.

One pedestrian visit every two years to a property would leave 35% of properties requiring a more expensive follow up ad hoc visit, eight visits (today's practice) would leave fewer than 10% of properties requiring a more expensive follow up visit. Our modeling shows that multiple permutations of pedestrian and ad-hoc visits can be used to achieve a meter inspection, but they all result in similar levels of costs. These costs are broadly similar to the costs we experience today for a service that delivers quarterly meter reads.

Aside from the £2.69bn gap in the IA this will appear highly irregular to consumers. Customers frequently complain today about having to allow access for meter inspections – they will simply not understand why a smart meter must be inspected, given its capability for remote health checks and tamper alerts.

Question 15: Is there anything further we need to be doing in terms of our ensuring the security of the smart metering system?

We believe that the following elements of a security approach are not adequately covered by the Prospectus:

- The DCC should have end-to-end ownership of the communications infrastructure and security thereof, up to and including the communications hub in the customer's home. This will ensure the DCC has full responsibility for security of the public element of the communications network
- Each party should assess and mitigate risks posed by its full supply chain. Meters and other elements of the infrastructure will be manufactured or hosted in a variety of countries and territories. Parties must take steps to ensure robust security measures are employed throughout the smart metering supply chain.
- Consideration should be given to additional security measures to be employed on the in-home components of the smart meter. For example, this could include whether certain sensitive messages delivered to an In Home Display should be password or PIN code protected.

October 2010

Dear Stakeholder,

Improving the Meter Inspection Regime

As you know, British Gas is committed to working with Ofgem and other stakeholders to ensure the successful delivery of the smart meter implementation programme. The earlier these reforms can be agreed, the sooner customers will start to benefit from the energy efficiency and cost and carbon savings that smart meters will deliver.

A key aspect of the industry reform that is needed to start to unlock these benefits is reform of the meter inspection regime. The Supply Licence requires Suppliers to physically inspect meters every two years. This is an obligation that must be addressed now as it directly and materially affects the incentives Suppliers have to roll out smart meters in advance of the mandate deadline. One of the key benefits to Suppliers and customers of smart meters is the avoided cost of pedestrian meter reading. If we do not need to collect pedestrian meter reads but are still required to inspect meters every two years, then the full cost of this activity will be attributable to the inspection requirement and the savings we can make from scaling back our pedestrian meter reading activity, and therefore pass on to customers, will be hugely reduced.

For the industry as a whole this means that the majority of the £2.7 billion of benefits that DECC has attributed to avoided meter reading in its smart meter Impact Assessment will not be delivered. It will also distort and delay Supplier decisions about how and when to roll out smart meters, potentially delaying the huge carbon and energy efficiency benefits that smart metering will bring.

The ability for Suppliers to apply for derogation from the Licence requirement to inspect meters was put into the Licence in 2007 so that suppliers could initiate reform in this area. This is what precisely what British Gas has done by submitting a request for derogation to Ofgem in August 2009 and is now looking to expedite, by pursuing this open consultation with Ofgem and other stakeholders.

The British Gas Proposal

We propose that our obligation to inspect every two years is replaced by an obligation to undertake a risk-based approach to meter inspection, supported by a number of specific commitments. We will do this in a way which will enhance customer safety. In particular we will make the following commitments:

- We will commit to take all reasonable steps to ensure that we inspect all gas and electricity meters and associated installations within our ownership, at least once every five years.
- We will commit to undertake our revenue protection activity and theft detection activities for the period of the derogation.
- We will take reasonable steps to ensure that valid reads are obtained and used for billing at least once every two years for all customers each year, so that billing accuracy is maintained.
- We will keep inspecting meters every two years for vulnerable customers on our Priority Services Register.

Our proposals will deliver the following benefits to customers, compared to the requirement we are obliged to meet today:

- Improved safety. British Gas has commissioned an independent assessment (undertaken by GL Industrial Services UK Ltd, formerly known as Advantica), which concludes that our proposals will lead to an overall improvement in safety. A copy of the GL report is attached to this letter.
- A crackdown on energy theft (now estimated to cost customers over £440m per year) by targeting more inspections in higher risk properties.
- Reduced cost and inconvenience to customers. The current obligation forces us to have expensive escalation processes to ensure we gain entry to customers' homes to perform the inspection.

Our proposal, if approved, will provide benefits to the wider industry:

- It will provide a major stepping stone towards the reform of the safety inspection regime necessary for smart metering. It will provide a catalyst for engagement with the Health and Safety Executive as well as generating crucial empirical data which may support further reforms.
- Network Owners will see reductions in system losses as a result of our crackdown on energy theft. Since our proposals deliver an overall improvement in safety, energy networks will be safer, without the need for further action or investment by the Networks to reflect these measures.
- Other Suppliers will also benefit from the reduction in theft that we deliver (this is because there will be less residual unallocated gas and electricity that is charged back to Suppliers).

- Granting our request may also prompt other Suppliers to consider applying for a similar derogation. The more other Suppliers present their own cases for reform to Ofgem, the more the benefits of improved safety, reduced theft and cost, and earlier smart metering will start to flow through to all customers immediately.

Further details about our derogation request are attached to this letter, together with a copy of the independent risk assessment of our proposals. We will also facilitate an industry seminar to provide further clarification and discussion about the case for action now on this issue. If you would like to express an interest in attending this seminar or would like to discuss this in further detail please contact [REDACTED]
[REDACTED]

Yours sincerely,

[REDACTED]

[REDACTED]

[REDACTED]

British Gas

Background

1. British Gas has a Supply Licence obligation⁷ to read and inspect all meters at least once every two years. We have requested that Ofgem grants to British Gas derogation from this Licence requirement. This possibility was specifically provided for in amendments to the revised Supply Licence made further to the Supply Licence Review in August 2007.
2. In finalising the new Licence Conditions in 2007, Ofgem stated that, *“We still think that the current obligation could be modified to give Suppliers greater control over the management of the safety of meter installations and effective measures to deal with theft. The current obligation specified that an inspection of the meter and associated installation must be carried every two years. This may be too prescriptive”*. We share this view.
3. In commenting on the proposed changes to the obligation that was under discussion in 2006, the HSE stated that although it was *“not against a change to the status quo as such, any changes should be risk and evidence based and should not result in any reduction in existing levels of safety.”* *“The aim should be to at least maintain current safety standards and, preferably, to improve them”*. We believe we have gathered the necessary evidence to underpin our proposed alternative set of arrangements.

Our proposal

4. Our specific proposal for the derogation is that Ofgem amends the current two-year “reasonable steps” requirement to a “risk-based approach” requirement. We do not propose complete removal of the inspection

⁷ Gas Supply Licence Standard Condition 12.8-12.16 and Electricity Supply Licence Standard Condition 12.14-12.16

requirement. We have suggested that Ofgem grants the derogation for five years with a review prior to its expiry in 2015. We propose to support this requirement with the following commitments:

- We will commit to take all reasonable steps to ensure that we inspect all gas and electricity meters and associated installations within our ownership, at least once every five years.
- We will commit to maintain revenue protection activity dedicated to the proactive detection of theft that will deliver broadly the same levels of theft detection and prevention set out in further detail later in our risk assessment.
- We will keep inspecting meters every two years for vulnerable customers on our Priority Services Register.
- To take reasonable steps to ensure that valid meter readings are obtained and used for all customers at least once every two years
- To continue to comply with our Billing Code obligations, particularly we will continue to:
 - provide opportunities for customers to provide their own readings at any time of day; and
 - seek to educate customers about the importance of sending in accurate readings.

Our proposals will improve the safety of customers

5. British Gas has commissioned an independent assessment, undertaken by GL Industrial Services UK Ltd. (formerly known as Advantica), which quantifies the scale of the safety benefits associated with the current

obligation. This demonstrates that the existing obligation generates very low safety benefits for customers.

6. We are concerned that in reforming the obligation safety is improved at the same time as the other customer benefits of reform are unlocked. Our formula for delivering this is a proposal to replace our two-year meter inspection compliance process with an inspection regime which has a risk based approach, supplemented by a five-year obligation and a targeted theft and revenue protection commitment. The GL report compares the safety benefits of our proposal with the existing obligation and concludes that our proposals will lead to an overall improvement in safety.

Our proposals will not require additional action by network owners

7. Our proposals will make customers safer and so, we believe, will make a positive contribution to the safety agenda of electricity and gas Network Owners. The proposal to change the frequency of safety inspections, rather than remove them, and to support this with additional risk-based activity will not require additional action by Network Owners. For example, the Electricity Safety, Quality and Continuity Regulations 2006 and Gas Safety Management Regulations 1996 do not prescribe a specific inspection frequency
8. We do not believe therefore that our proposals will result in a transfer of costs to Network Owners. Nor would we wish this to be the case, given that such transfer of costs would ultimately be returned to Suppliers and customers via increased transportation charges.

Our proposals will reduce theft and so deliver reduced costs to all Energy Suppliers and Network Owners

9. Customers who try to steal energy will naturally seek to avoid detection of their theft, either by refusing entry to their property or by removing the signs of tampering in advance of an appointment. This leads not only to sustained theft but also to the perpetuation of unsafe metering situations. This helps to explain why meter inspections themselves rarely result in the detection of meter tampering and are, therefore, an ineffective way of seriously reducing theft or providing reassurance on safety in homes and businesses.
10. This means we need more targeted arrangements. Our proposals draw on our experience in 2009, when we began a new approach to detecting and investigating cases of suspected theft. This new approach included a doubling of our field-based resources devoted to tackling theft. As a result, theft cases identified by British Gas have increased by 112%. In the vast majority of cases, the meters were in a dangerous condition and would have remained so were it not for our revenue protection activity.
11. Our process is based on a combination of the intelligence that our Revenue Protection Officers obtain from working in their local communities, and the insights we get from relevant industry data. We work closely with the Police, Distribution Network Operators and metering agents to generate leads for investigation (e.g. intelligence on cannabis farms, or landlords marketing free energy to tenants). We interrogate all sorts of industry data to identify potentially suspicious customer situations, such as repeated cases of refused entry, lower than expected consumption levels or non-purchase by pay-as-you-go energy customers when we know the property is not vacant. We also have a free-phone tip-off line and are considering how we use the media to raise awareness.

Our proposals will reduce costs and inconvenience to customers

12. The combined result of all the own-initiative revenue protection activity that we undertake is a much better return for customers, not only in terms of

safety and theft, but also in terms of cost. The current obligation forces us to incur unnecessarily high costs leading to higher bills for customers, as well as inconvenience for them as a result of the escalation process that we are required to operate to ensure we obtain entry to perform the inspection. The revised inspection requirement that we propose will reduce costs to consumers associated with visits to inspect meters.

13. The commitments we are prepared to make to tracking down theft will deliver some additional savings to the wider industry and, therefore, customers. These savings will come through reduced industry smearing charges, such as reconciliation by difference and group correction factors, as well as reduced electricity losses.
14. The GL report does not take into account an important element of the current arrangements that we propose to retain, which is to keep the two-year requirement for vulnerable customers, defined as those who are on our Priority Services Register. Some of these customers may be less likely or less able than the average customer to call their Supplier if they have a potential safety issue. Furthermore, vulnerable customers are less likely than the average customer to provide us with a read themselves. So for both these reasons we propose that we retain the two-year inspection requirement for these customers.
15. To address any concerns that there may be an impact on billing accuracy from a reduced number of pedestrian visits, we will also commit to take reasonable steps to ensure that valid meter readings are obtained and used for all customers at least once every two years. This will relieve us of the requirement to visit the customer to collect a meter read at least every two years, even when we have a complete, validated set of customer own reads from the customer. This will also encourage us to invest further in automated technology to make it easier for customers to give us their reads in the future.

Our proposals will provide a catalyst for the wider reform necessary to promote smart metering

16. As well as failing to provide value-for-money for customers now, the current obligation is also an obstacle to Suppliers and customers realising the benefits of smart metering. It should therefore be a question of when, not if, the obligation is reformed. One of the key benefits to Suppliers and customers of smart meters is the avoided cost of pedestrian meter reading. If we do not need to collect pedestrian meter reads, but are still required to inspect meters every two years, then the full cost of this activity will be attributable to the inspection requirement and the savings we can make (from scaling back our pedestrian meter reading activity once smart meters are in place) will be hugely reduced.
17. For the industry as a whole this means that the majority of the £2.69bn of benefits that DECC has attributed to avoided meter reading in its smart meter impact assessment will not be delivered if the two-year inspection requirement remains in place. Much more of this saving will be delivered under a regime which has a risk-based approach, with a five-year obligation.
18. Our proposal, if approved, will provide a major step towards the reform necessary to the safety inspection regime in readiness for smart metering. It will provide a catalyst for engagement with the Health and Safety Executive as well as generating crucial empirical data in support of further and possibly wider-ranging reform that will benefit Energy Suppliers and customers as a whole.