Title: Provision of third party access to licence exempt electricity and gas networks	Impact Assessment (IA)			
	IA No: DECC0013			
Lood department or ageney	Date: 07/10/2010			
Lead department or agency: Department of Energy and Climate Change Other departments or agencies:	Stage: Consultation Source of intervention: EU			
				Ofgem
	Contact for enquiries:			
	chris.chown@decc.gsi.gov.uk			
	bernabe.sancheznaffziger@decc.gsi.gov.uk			

Summary: Intervention and Options

What is the problem under consideration? Why is government intervention necessary?

Many businesses distribute and supply energy as an associated part of their core activities. In most cases these businesses are exempt from the requirement to hold and comply with a licence. The exempt energy sector is, however, still required to comply with certain obligations of EU law.

Following the European Court of Justice (ECJ) ruling on the Citiworks case, these proposals aim to ensure that licence exempt electricity and gas distribution networks offer third party access as required under the Electricity Directive and the Gas Directive. This is a minimum cost implementation option.

What are the policy objectives and the intended effects?

The policy's intended objective is to ensure third party access to licence exempt energy distribution networks. This will ensure energy customers benefit from competition in the energy supply market and ensures the compliance of the GB electricity market with EU law.

What policy options have been considered? Please justify preferred option (further details in Evidence Base)

The main proposal is to provide third party access to licence exempt networks. In doing so the self-certified class exemption regime for licence exempt distribution networks will be retained. The requirement that third party access must be provided to these networks will be set out in legislation. Guidance will be published describing how compliance might be achieved. There are at least four implementation models available for stakeholders to achieve compliance.

When will the policy be reviewed to establish its impact and the extent to which the policy objectives have been achieved?	It will not be reviewed
Are there arrangements in place that will allow a systematic collection of monitoring information for future policy review?	No

Ministerial Sign-off For consultation stage Impact Assessments:

I have read the Impact Assessment and I am satisfied that, given the available evidence, it represents a reasonable view of the likely costs, benefits and impact of the leading options.

Signed by the responsible Minister:..... Date: 7 Oct 2010

Summary: Analysis and Evidence

Policy Option 1

Description: Provision of third party access to licence exempt electricity and gas networks

Year 2010 COSTS (£n		se	Time Period		Net Benefit (Present Val	ue (PV)) (£m)
COSTS (£n	Year 2	2010 Years 20 Low: -£48m High: £677m		£48m High: £677m	Best Estimate: £165m	
	n)		Total Tra		Average Annual	Total Cost
			(Constant Price)	2 Years	(excl. Transition) (Constant Price)	(Present Value)
Low High			Optional		£3.4m £5.2m	£48m
Best Estimate			Optional			£74m
		o of ka	0	oto by in	£5.2m nain affected groups'	£74n
metering – ei across the co models are e administratio of having to a	ither me omplian estimate n costs add the	eter proce mo ed to ca only), costs	ovision, meter r dels above. Th arry the lowest whereas the 'o for the provision	eading on the common impleme pt in / op n of full s	rty access to these networks and or 'deemed' metering. These con- nercial agreement and 'deemed ntation costs (additional meter of out' model is expected to be t settlement meters for customers	osts will vary substantially ' metering implementation reconciliation and wice as costly (as a result
Other key nor None.	n-mone	tised o	osts by 'main a	ffected g	roups'	
BENEFITS	(£m)		Total Tra (Constant Price)	nsition Years	Average Annual (excl. Transition) (Constant Price)	Total Benefi (Present Value)
Low	n Optional £		0	(
High				£52.8m	£750n	
Best Estimate	9		0		£16.8m	£239n
stakeholders Other evidend achieved. Th he 6% price	have s ce sugg le top e differer	suggests send of ntial estates	sted no additions avings to consist the range of but the range of but the stimated by Of	onal ber sumers enefits i gem in t	which these benefits are like nefits will accrue from increa of similar levels to the rest of s given by assuming all custo heir Energy Supply Probe. A h the Ofgem Energy Supply	sed competition in suppl the supply market could b mers switching would sav simplified assumption of
Other key nor None.	n-mone	tised k	penefits by 'main	n affected	d groups'	
electricity price	tions re ces are	gard tł made	ne size of the lic . The key sens	itivities u	empt network market, potential ised to produce the range of co rice saving for customers switch	st-benefit estimates are the
Key assumpt electricity price	tions re ces are on moc	gard tł made lel chc	ne size of the lic . The key sens sen and the po	itivities u	ised to produce the range of co	switching rates and st-benefit estimates are the ning.

Enforcement, Implementation and Wider Impacts

What is the geographic coverage of the policy/option?				ain			
From what date will the policy be implemented?			2011	2011			
Which organisation(s) will enforce the policy?			DECC, C	DECC, Ofgem, EC			
What is the annual change in enforcement cost (£m)?			0	0			
Does enforcement comply with Hampton principles?			Yes	Yes			
Does implementation go beyond minimum EU requirements?				No			
What is the CO_2 equivalent change in greenhouse gas emissions? (Million tonnes CO_2 equivalent)			Traded:	1	Non-t	raded:	
Does the proposal have an impact on competition?				Yes			
What proportion (%) of Total PV costs/benefits is direc primary legislation, if applicable?	tly attributal	ole to	Costs: Benefi		efits:		
Annual cost (£m) per organisation (excl. Transition) (Constant Price)	Micro	< 20	Small	Med	ium	Large	
Are any of these organisations exempt?	No	No	No	No		No	

Specific Impact Tests: Checklist

Set out in the table below where information on any SITs undertaken as part of the analysis of the policy options can be found in the evidence base. For guidance on how to complete each test, double-click on the link for the guidance provided by the relevant department.

Please note this checklist is not intended to list each and every statutory consideration that departments should take into account when deciding which policy option to follow. It is the responsibility of departments to make sure that their duties are complied with.

Does your policy option/proposal have an impact on?	Impact	Page ref within IA
Statutory equality duties ¹	No	8
Statutory Equality Duties Impact Test guidance		
Economic impacts		
Competition Competition Assessment Impact Test guidance	Yes	8
Small firms Small Firms Impact Test guidance	No	8
Environmental impacts		
Greenhouse gas assessment Greenhouse Gas Assessment Impact Test guidance	No	8
Wider environmental issues Wider Environmental Issues Impact Test guidance	No	8
Social impacts		
Health and well-being Health and Well-being Impact Test guidance	No	8
Human rights Human Rights Impact Test guidance	No	8
Justice system Justice Impact Test guidance	No	8
Rural proofing Rural Proofing Impact Test guidance	No	8
Sustainable development	No	8
Sustainable Development Impact Test guidance		

¹ Race, disability and gender Impact assessments are statutory requirements for relevant policies. Equality statutory requirements will be expanded 2011, once the Equality Bill comes into force. Statutory equality duties part of the Equality Bill apply to GB only. The Toolkit provides advice on statutory equality duties for public authorities with a remit in Northern Ireland.

Evidence Base (for summary sheets) – Notes

Use this space to set out the relevant references, evidence, analysis and detailed narrative from which you have generated your policy options or proposal. Please fill in **References** section.

References

Include the links to relevant legislation and publications, such as public impact assessment of earlier stages (e.g. Consultation, Final, Enactment).

No.	Legislation or publication
1	Ofgem, 2008 Energy Supply Probe: http://www.ofgem.gov.uk/Markets/RetMkts/ensuppro/Documents1/Energy%20Supply%20Probe%2 0-%20Initial%20Findings%20Report.pdf
2	DECC, July 2010 Non-domestic Smart Meter Roll-out Impact Assessment: http://www.decc.gov.uk/assets/decc/Consultations/smart-meter-imp-prospectus/222-ia-smart-roll- out-non-domestic.pdf
3	
4	

+ Add another row

Evidence Base

Ensure that the information in this section provides clear evidence of the information provided in the summary pages of this form (recommended maximum of 30 pages). Complete the **Annual profile of monetised costs and benefits** (transition and recurring) below over the life of the preferred policy (use the spreadsheet attached if the period is longer than 10 years).

The spreadsheet also contains an emission changes table that you will need to fill in if your measure has an impact on greenhouse gas emissions.

Annual profile of monetised costs and benefits* - (£m) constant prices

	Y ₀	Y ₁	Y ₂	Y ₃	Y ₄	Y ₅	Y ₆	Y ₇	Y ₈	۲ ₉
Transition costs										
Annual recurring cost										
Total annual costs										
Transition benefits										
Annual recurring benefits										
Total annual benefits										

* For non-monetised benefits please see summary pages and main evidence base section

Evidence Base (for summary sheets)

Purpose

To ensure the GB electricity and gas markets comply with the European Court of Justice (ECJ) ruling on the Citiworks case on third party access, as well as the EU Third Package more broadly.

Background: the Citiworks case and the EU Third Energy Package

The requirement to provide for third party access to energy systems is set out at article 32 of the EU Directive concerning common rules for the internal market in electricity² (the "Electricity Directive"), and article 32 of the EU Directive concerning common rules for the internal market in natural gas³ (the "Gas Directive"). These provisions require Member States to ensure the implementation of a system of third party access to gas and electricity transmission and distribution systems based on published tariffs, applicable to all eligible customers and applied objectively and without discrimination between system users. Tariffs, or the methodologies underlying them, are required to be approved prior to their entry into force by Ofgem, as the national regulatory authority. In addition, tariffs and methodologies are required to be published.

In May 2008, the European Court of Justice's ruling in *Citiworks* AG^4 clarified that the requirement to provide for third party access applied in respect of all transmission and distribution systems (as defined in the Directives), and that it was not open to Member States to exempt certain types of transmission or distribution systems from the requirement. The complaint in *Citiworks* had been brought by an electricity supplier seeking to compete with a monopoly supplier at Leipzig airport. The ECJ ruled that the German law which exempted the owners of certain systems from the requirement to provide third party access to distribution systems. The judgement made it clear that all distribution networks must be open to third party access so that customers connected to those networks have the option to choose their own electricity and gas suppliers.

The objective of the Directives is to ensure fair competition, which ultimately protects consumer choice and also to improve productivity and efficiency.

Under the Electricity Act 1989, it is illegal to generate, transmit, distribute or supply electricity without a licence or an exemption. A system of exemptions in Great Britain was formalized by the Electricity (Class Exemptions from the Requirement for a Licence) Order 2001 (the "Class Order 2001"). Amongst other things, an entity which operates under a distribution exemption is currently exempt from the requirement (present in distribution licences) to provide third party access to the system.

Similarly, under the Gas Act 1986, a licence is required to [convey gas through pipes to premises or to a pipe-line system operated by a gas transporter], to supply gas which is conveyed to premises through pipes, or to arrange for gas to be put into, conveyed on or taken out of a pipe-line system. Exemptions from the requirement to hold a licence are contained in various exemptions orders made under s.6 Gas Act 1986. An entity which distributes gas under an exemption from the requirement to hold a gas transporter's licence is, like an exempt electricity distributor, exempt from the requirement to provide third party access to the system.

In light of the *Citiworks* ruling, the Government needs to make provision for third party access to licence exempt systems.

In addition, the Third Package contains other requirements which must be applied to licence exempt undertakings. The Government proposes to deal with third party access and these other requirements at the same time.

² Directive 2009/72/EC. This Directive must be implemented into domestic law by 3 March 2011 and replaces Directive 2003/54/EC, which contained a similar requirement.

³ Directive 2009/73/EC. This Directive must be implemented into domestic law by 3 March 2011 and replaces Directive 2003/55/EC, which contained a similar requirement.

⁴ Case C-439/06

Data availability

The potential costs and benefits of ensuring third party access to licence exempt distribution networks is highly uncertain. Precisely because these networks are licence-exempt, the evidence base is thin. Thus, the extent of licence exempt private networks, the degree to which they already provide third party access, the likelihood of customers switching and the potential savings to be achieved are all unknown. The call for evidence preceding the current consultation has delivered some anecdotal evidence but for the most part highlights the poor knowledge that exists of this sector across energy market stakeholders. The anecdotal evidence and views submitted to the call for evidence are often of contradictory sign. This is shown in the table below.

Issue	Call for evidence responses
Scale of the Licence Exempt Sector	The scale and range of the networks is vast. Their type and scale vary considerably. No information. Intuitively large (station, airport, universities, retail and office environments). Examples: Network Rail supplies 130,000 MWh at over 1,000 supply points per annum; Bristol Port supplies 40,000 MWh per annum. 65% of commercial property is rented. The majority of offices and retail units are multi-let, and therefore have private wire networks with the building used to supply energy to those occupiers. In the domestic sector the majority of social occupiers and private renters would be able to choose their energy supplier.
Evidence of prices charged by licence exempt electricity network operators relative to suppliers commercial tariffs	Variable. Some operators use the exempt network to generate additional profits.
Revenue levels and profitability	Across all sectors this is unknown. Example: Network Rail £10 million revenue (£10,000 per annum per supply point)
To what extent is third party access already provided	Variable. Opt in / opt out application can already exist. Other operators can provide full settlement metering. Fairly limited at the moment. Bristol Port already grants third party access to two large consumers.
How many customers in a licence exempt network would consider switching and what would be the costs	The number of customers that would opt out is difficult to estimate. The costs cannot be estimated as these would vary considerably with the complexity of the engineering works and admin burden. Unknown – hopefully none. Unlikely as they would lose on-site benefits.
What are the potential cost savings to consumers from switching	It would vary from case to case (up to 15%?). None, only cost disbenefits. Smaller customers would benefits, but level unknown. Near zero. Unit cost of electricity may be lower, but the use of system charge would remove any material savings. Ofgem review of distributed energy suggested there would be considerable cost disadvantages in brining schemes under full governance arrangements and the same might be expected to apply in this case. Savings would be negative.
Impact on current business operation	Solutions do not seem to bring any tangible business opportunity for suppliers. Expand the need for metering. Increased management, metering and administration costs for operators.

Example: Network rail - £750k-£1.5m in meter installation costs
plus £75k per annum additional operational costs.

Based on the evidence gathered, the following simplified assumptions are used on the scale of the sector:

- Of 93TWh of non-domestic, non-industrial electricity consumption (DUKES 2010) half is supplied through private networks. The total electricity supplied via licence exempt distribution networks is therefore assumed to be 47TWh. This assumption is consistent with the evidence presented by the British Property Federation that 65% of all commercial property is rented and that the majority of this relies on private wires for the supply of electricity.
- The average annual consumption per supply point is 90 MWh, in line with the evidence presented by Network Rail. The total number of supply points is therefore assumed to be 520,000.
- The price of energy (excluding network costs) for these consumers is the average price paid by consumers in the 20-500MWh per annum bracket. The Eurostat average for 2008-2010 of £98 per MWh excluding taxes is used.
- A simplified assumption of a switching rate of 13% is made, consistent with the Ofgem Energy Supply Probe⁵ findings for small businesses.

Options for compliance

The options for ensuring compliance with the Citiworks ruling are summarised in Annex A of the consultation document. The consultation envisages that these would all be available to licence exempt network operators (the choice on which one to implement would be left to the network owner):

- (1) Commercial agreement the customer's chosen supplier enters a commercial agreement with the private network operators.
- (2) 'Deemed' metering without installing a full settlement meter for any customer, an administrator deems readings for each customer, which are then used by suppliers to charge.
- (3) Opt in / opt out customers are able to switch to a supplier of their choice or default to existing arrangements if not. For 'opt out' customers a full settlement meter would be installed.
- (4) Full settlement metering installation of full settlement metering at all end customers within the private network.

Approach to costing

The proposed approach to ensuring compliance does not go beyond the minimum requirements of the Citiworks ruling. Providing businesses a menu of compliance options will enable them to choose the lowest cost option depending on their circumstances and risk profile. This impact assessment aims to assess the costs of compliance and so measures costs and benefits against a **counterfactual of no Citiworks ruling** (not non-compliance, which would have penalties associated with it).

The **benefits from competition are treated as a resource saving**. In reality they are a mix of a transfer from producer to consumer surplus and a resource saving associated with a reduced deadweight loss. In the case of relatively inelastic electricity demand the transfer component will account for a larger share of the gains from competition. However, there are also likely to be allocative efficiency savings from the transfer from producer to consumer surplus. Increased competition will also lead to lower costs and improved productivity within firms. This increased productivity comes from "within firm" effects (increased managerial incentives to bear down on costs) and "between firm" effects (exit from the market of lower productivity firms and the entry of higher productivity firms).⁶ It is therefore reasonable to treat these benefits as a resource saving.

Finally, the impact assessment only attempts to cost the impact on licence exempt electricity networks. However, the ruling also applies to **licence exempt gas networks**. The informal call for evidence

⁵ <u>http://www.ofgem.gov.uk/Markets/RetMkts/ensuppro/Documents1/Energy%20Supply%20Probe%20-</u> %20Initial%20Findings%20Report.pdf

⁶ The theoretical and empirical literature is summarised in *Productivity and competition : an OFT perspective on the productivity debate*, January 2007.

undertaken prior to this consultation included questions on the extent of licence exempt gas networks and likely impacts of the Citiworks ruling on them. The conclusion is that electricity licence exempt networks are much more pervasive (only two out of twenty respondents owned or represented parties owning licence exempt gas networks) and most of the costs and benefits of complying with the Citiworks ruling will fall on them. However, additional evidence as part of the current consultation is welcome.

Costs

The main costs associated with providing third party access to these networks are those associated with metering – either meter provision, meter reading or 'deemed' metering. These costs would vary substantially across the compliance models above.

In line with the evidence included in DECC's impact assessment on the roll out of smart and advanced meters to small and medium sized businesses in July 2010⁷, the cost of installation of an advanced smart meter for full settlement metering across all supply points would be £383 per meter. This cost is likely to be an overestimate, as a large proportion of consumers within licence-exempt networks are unlikely to need advance meters. Asset and installation costs of standard non-domestic smart-meters are expected to be just £72. It seems appropriate to use the conservative higher-cost assumption, particularly in light of the fact that the only respondent providing a cost estimate for meter installation of meters is not a necessary requirement for compliance, but is merely an option open to the network owners and its customers (the latter would be expected to bear the costs of the meters).

The cost of full installation of advanced meters then gives a cost estimate of £199m. We assume across the board full settlement metering would not lead to any additional operational costs.

The commercial agreement and 'deemed' metering models would incur additional operational costs for those customers demanding supply from a third party. Network Rail's response to the call for evidence assumes these to be about £50 per annum. Assuming 13% of customers wanted to switch suppliers, the additional cost of these models would be £3.4m per annum - £48m in present value terms to 2030.

The costs associated with the "opt in / opt out" model are in between these two estimates. Full settlement metering would be required for those customers wanting to switch (but only them) and the additional operational costs would still be incurred. Thus, the costs associated with these model would be the \pounds 48m above plus the cost of providing full settlement meters for customers demanding third party supply, estimated at \pounds 26m – a total cost of \pounds 74m in present value terms.

The costs associated with providing third party access to licence exempt networks would, other things being equal, reduce the incentives to build the networks. This could result in additional resource costs to society as alternative, more costly, arrangements for energy supply might have to be made. However, given that these networks are generally provided as part of a broader package of services we assume for the purpose of this impact assessment that this impact is negligible. Views and evidence on this assumption are welcome as part of the current consultation exercise.

Benefits

The main benefit from ensuring third party access is consumers will benefit from lower energy prices. The call for evidence responses are ambiguous on the extent to which these benefits are likely to be achieved.

A number of responses, mainly from licence exempt network operators, state that price savings to customers will be negative. Other responses suggest smaller businesses could benefit, with an energy supplier estimating savings of up to 15% would be available for those customers switching.

For the purposes of this impact assessment the range of price benefits from increased competition are therefore estimated to range from zero to 6% for those switching suppliers, estimated to be £90m per annum or £512m in present value terms to 2030. The 6% assumption is in line with evidence from

⁷ <u>http://www.decc.gov.uk/assets/decc/Consultations/smart-meter-imp-prospectus/222-ia-smart-roll-out-non-domestic.pdf</u>

Ofgem's 2008 Supply Probe, which showed that is the average saving a customers could make switching away from the incumbent regional supplier. The assumption is that licence exempt network owners might behave in a similar way to former regional incumbents. As discussed above, these benefits from competition are treated as a resource saving to society for the purposes of this impact assessment.

Smart meters are also expected to play a role in enabling businesses to save energy. In order to be consistent with the impact assessment on the roll out of smart and advanced meters to small and medium sized businesses, this impact assessment assumes that smart/advanced meters will bring savings through a reduction in energy consumption of 2.8% (the Smart Meter IA central case).

Net Present Value

Overall, the range for the NPV of these proposals goes from a net cost of £199m (with full settlement metering costs and zero benefits being delivered) to a net benefit of £1,231m (with the commercial and/or 'deemed' metering models being applied and maximum potential benefit being achieved).

Both these extremes appear unlikely. Firstly, because existing licence exempt networks will not choose the option of providing full settlement metering across the board (although new networks might choose this model). Secondly, because the 15% price saving seems like a potential maximum saving for some consumers, but not for the average consumer.

The range for the NPV presented in the summary sheets of this impact assessment is therefore given by the following scenarios (also summarised in the table below):

(1) A low benefit estimate given by the commercial/deemed metering model with no benefits being achieved – a net cost in present value terms of £48m to 2030;

(2) A medium benefit estimate given by the 'deemed' metering and/or commercial agreement models with an average price saving of 6% per customer switching. This provides a cost of £48m and a benefit of £512m, which gives a net benefit of £464m in present value terms to 2030;

(3) A high benefit estimate given by the scenario in which the costs are equal to those of the opt-in/optout model and switchers achieve gains from competition resulting in 6% reduction in bill prices plus a 2.8% saving in energy consumption. This results in costs to 2030 of £74m in present value terms and benefits of £53m per annum in current prices and £750m in present value terms to 2030. A net present value of £676m to 2030;

(4) A best estimate of the net present value is given by the scenario where the costs are equal to those of the opt-in/opt-out model, with switchers receiving no price benefit but saving 2.8% in energy consumption. This results in the best estimate for costs of \pounds 74m in present value terms to 2030, or \pounds 5.2m per annum in current prices. The best estimate for total benefits is \pounds 239m in present value terms, or \pounds 16.8m per annum in current prices. Thus, our point estimate for the NPV of these measures is a net benefit of \pounds 165m.

Costs and benefits, Present Value, £ million, 2010-30					
	Costs				
Low benefit scenario: Commercial/deemed metering, switchers achieve no reduction in bills	48.0	0	-48.0		
Medium benefit scenario: Commercial / deemed metering, switchers achieve 6% reduction in bill prices	48.0	511.6	463.6		
High benefit scenario: Opt in / opt out, switchers achieve 6% reduction in bill prices and 2.8% saving in consumption	74.0	750.4	676.4		
Best estimate scenario: Opt in / opt out, switchers achieve no price benefit but save 2.8% in energy consumption	74.0	238.8	164.8		

Specific Impact Tests

No additional impacts are expected on competition, small firms, human rights, race equality, gender, disability, health, environment, legal aid, the judicial system, sustainable development or the rural economy.

Annexes

Annex 1 should be used to set out the Post Implementation Review Plan as detailed below. Further annexes may be added where the Specific Impact Tests yield information relevant to an overall understanding of policy options.

Annex 1: Post Implementation Review (PIR) Plan

A PIR should be undertaken, usually three to five years after implementation of the policy, but exceptionally a longer period may be more appropriate. A PIR should examine the extent to which the implemented regulations have achieved their objectives, assess their costs and benefits and identify whether they are having any unintended consequences. Please set out the PIR Plan as detailed below. If there is no plan to do a PIR please provide reasons below.

Basis of the review: [The basis of the review could be statutory (forming part of the legislation), it could be to review existing policy or there could be a political commitment to review];

Review objective: [Is it intended as a proportionate check that regulation is operating as expected to tackle the problem of concern?; or as a wider exploration of the policy approach taken?; or as a link from policy objective to outcome?]

Review approach and rationale: [e.g. describe here the review approach (in-depth evaluation, scope review of monitoring data, scan of stakeholder views, etc.) and the rationale that made choosing such an approach]

Baseline: [The current (baseline) position against which the change introduced by the legislation can be measured]

Success criteria: [Criteria showing achievement of the policy objectives as set out in the final impact assessment; criteria for modifying or replacing the policy if it does not achieve its objectives]

Monitoring information arrangements: [Provide further details of the planned/existing arrangements in place that will allow a systematic collection systematic collection of monitoring information for future policy review]

Reasons for not planning a PIR: European Court of Justice ruling. Not complying not an option.