Smart energy outlook

February 2016
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Research methodology

Populus conducted 10,119 interviews using a bespoke online survey, designed to be representative of the population of Great Britain. The interviews took place between the 19th and 30th November 2015.

Smart meter customers featured in this publication did not necessarily take part in the Populus research.
Introduction

Millions of homes in Great Britain are already benefitting from smart meters and more are being installed every day. Every household in Great Britain will be offered a smart meter by 2020, at no extra cost.

This is 21st century technology that will benefit everybody. Smart meters give a clear picture of energy consumption, in pounds and pence, and bring an end to estimated bills. They put customers in control of their energy use.

Smart energy outlook is published twice yearly by Smart Energy GB, the national campaign for the smart meter rollout, as part of our statutory task to inform the public about smart meters and their benefits. It was carried out by Populus, who surveyed more than 10,000 people across Great Britain and is the largest independent piece of research on energy and smart meters. It gives a picture of people’s attitudes towards and experiences of smart meters and provides essential insight for our campaign.

There is a growing level of understanding among consumers of what smart meters are and the benefits they bring. With wider understanding, the appetite for smart meters is also increasing.

The experience of those who have upgraded to a smart meter is overwhelmingly positive. Levels of satisfaction with the new technology are high, they enjoy greater control over their gas and electricity bills and most have taken steps to reduce their energy use.

At a glance:

- more than half (52 per cent) of those with smart meters say their new meter is helping them save money
- eight in ten (80 per cent) with a smart meter have taken at least one step to reduce how much energy they use
- eight in ten (79 per cent) people with a smart meter would recommend them to others
Janet Thickpenny, Barry, South Wales

Janet lives in a bungalow in Barry, with her two teenage daughters, two dogs and a cat.

When Janet first got her smart meter she found the display fascinating and couldn’t stop playing with it, much to her daughters’ amusement, and it is still an important part of her life today. The traffic light system that warns how much energy is being used has led to a change in behaviour in the household. “When the warning sound beeps my youngest daughter goes scurrying around the house unplugging things. If it’s just me in the house I spend about £2 per day on electricity, but if my daughter isn’t in school it’s more like £12, a revelation that has become a bit of a running joke between us,” she said.

Janet has noticed small changes in her own behaviour: “I make my coffee straight away, rather than forgetting and then having to re-boil the water ten minutes later. You’d be surprised how much energy a kettle uses.”

In the past Janet relied on estimated energy bills because taking a meter reading was at the bottom of her to-do list. Her final manual reading revealed she was greatly in credit. Using the new information at their fingertips she and her girls took steps to reduce their energy consumption. Janet sums it up: “we received £480 of refunds in less than a year.”
Smart meters -
the verdict from those
who already have one
Most smart meter customers would recommend one to others

Every month the number of homes in the country with a smart meter increases. Four out of ten had theirs installed in the past six months. This research shows that the vast majority of people with smart meters would recommend one, suggesting a high level of appreciation of the benefits they bring.

Figure 1. Likelihood to recommend a smart meter to others (smart meter customers)

* Figures may not add up to 100% exactly due to rounding
People with smart meters are changing their behaviour and saving money

A smart meter in the home is an invitation to think twice about energy consumption and paves the way for some experimentation, to see where money can be saved. 80 per cent of people with smart meters have taken at least one step towards cutting back. For some it’s as simple as turning off a light. Others have monitored the consumption of particular devices and changed their behaviour accordingly. For busy people it might just be a case of turning the heating down a degree or two, or unplugging a fully charged laptop, and being able to see the saving.

Figure 2. Steps taken to reduce energy use among smart meter customers

<table>
<thead>
<tr>
<th>Step</th>
<th>Men</th>
<th>Women</th>
</tr>
</thead>
<tbody>
<tr>
<td>Have taken one step to do at least one different thing around the home</td>
<td>54%</td>
<td>56%</td>
</tr>
<tr>
<td>Turned off lights</td>
<td>49%</td>
<td>54%</td>
</tr>
<tr>
<td>Turned heating down/off</td>
<td>48%</td>
<td>42%</td>
</tr>
<tr>
<td>Monitored energy used more closely</td>
<td>38%</td>
<td>48%</td>
</tr>
<tr>
<td>Changed the way household appliances are used</td>
<td>31%</td>
<td>34%</td>
</tr>
<tr>
<td>Encouraged others in household to use less energy</td>
<td>16%</td>
<td>15%</td>
</tr>
<tr>
<td>Purchased energy efficient appliances</td>
<td>12%</td>
<td>13%</td>
</tr>
<tr>
<td>Researched how to make home more energy efficient</td>
<td>13%</td>
<td>8%</td>
</tr>
<tr>
<td>Researched energy efficient appliances</td>
<td>10%</td>
<td>8%</td>
</tr>
<tr>
<td>Researched how to use less energy</td>
<td>9%</td>
<td>8%</td>
</tr>
</tbody>
</table>
Smart meter customers feel better informed and in control

Being better informed is at the heart of the smart meter experience. It’s a world away from the days of having to shine a torch under the stairs to take meter readings. The smart meter display shows you clearly how much energy you are using. It can be left anywhere in the home, or some might prefer to use an app on a smart phone. Information is provided in the simplest way possible, in pounds and pence. No calculators are needed to convert readings in kwh. Most people with smart meters say they are saving money, with three out of four now conscious of costs and feeling more in control.

Figure 3. Experience of smart meter customers

<table>
<thead>
<tr>
<th>Experience</th>
<th>Percentage</th>
</tr>
</thead>
<tbody>
<tr>
<td>Better idea of what I’m spending on energy</td>
<td>85%</td>
</tr>
<tr>
<td>More conscious about the energy I use</td>
<td>74%</td>
</tr>
<tr>
<td>Feel more in control of the energy I use</td>
<td>73%</td>
</tr>
<tr>
<td>Think twice about using high energy appliances</td>
<td>65%</td>
</tr>
<tr>
<td>Less worried about my bills</td>
<td>52%</td>
</tr>
<tr>
<td>Helping me to save money</td>
<td>52%</td>
</tr>
</tbody>
</table>
Smart meter customers are more confident about their energy bills. This confidence grows with time

With smart meters more people feel in control of their gas and electricity and their bills. The evidence shows that people with smart meters are much more confident that their bills are accurate. They are also better informed and feel better armed with the information they need to choose the right energy tariff and supplier for them.

Figure 4. Attitudes towards energy: smart meter customers vs. those without smart meters

<table>
<thead>
<tr>
<th>Statement</th>
<th>Without a smart meter</th>
<th>With a smart meter</th>
</tr>
</thead>
<tbody>
<tr>
<td>I think my energy bill is accurate</td>
<td>64%</td>
<td>81%</td>
</tr>
<tr>
<td>I understand my energy bills</td>
<td>61%</td>
<td>75%</td>
</tr>
<tr>
<td>I think I have the information I need to choose the right energy supplier</td>
<td>59%</td>
<td>77%</td>
</tr>
<tr>
<td>I think I have the information I need to choose the right energy tariff</td>
<td>57%</td>
<td>72%</td>
</tr>
<tr>
<td>I think I pay the right amount for the energy I use</td>
<td>51%</td>
<td>65%</td>
</tr>
<tr>
<td>I trust my energy supplier(s)</td>
<td>41%</td>
<td>59%</td>
</tr>
<tr>
<td>I’m not concerned about running up a big energy bill (without realising it)</td>
<td>31%</td>
<td>34%</td>
</tr>
<tr>
<td>I trust all energy suppliers</td>
<td>8%</td>
<td>9%</td>
</tr>
</tbody>
</table>
Understanding and interest
Understanding of smart meters is growing

Understanding of what a smart meter is has hit the 25 per cent mark. This number is steadily increasing and 25 per cent is the highest figure recorded since these surveys began.

To test whether people understand what a smart meter is, respondents had to be able to identify that smart meters:

- can only be installed by an energy supplier
- allow you to see in pounds and pence how much energy you are using in near real time
- mean you will receive accurate bills rather than estimated ones from your energy supplier

Figure 5. Understanding of what a smart meter is among the population of Great Britain

* These are publication dates. Surveys were conducted in November 2014, May 2015 and November 2015

18% *March 2015

23% *September 2015

25% *February 2016

5 percentage point increase (equates to 2.5m people)

2 percentage point increase (equates to 1m people)
More people are interested in getting a smart meter

Smart energy outlook (September 2015) showed that, of those who understand what a smart meter is, 7.6 million were interested in having one installed, or already had one. Six months later, that figure is at 8.3 million. There is no doubt that appetite is growing, as the benefits of smart meters become more widely known and as the national upgrade gathers pace.

**Figure 6.** Number of people interested in getting a smart meter or who already have one (among those who know what a smart meter is)

<table>
<thead>
<tr>
<th>Interest Level</th>
<th>Percentage</th>
</tr>
</thead>
<tbody>
<tr>
<td>Has one installed already</td>
<td>14%</td>
</tr>
<tr>
<td>Very interested</td>
<td>25%</td>
</tr>
<tr>
<td>Fairly interested</td>
<td>27%</td>
</tr>
<tr>
<td>Neither</td>
<td>15%</td>
</tr>
<tr>
<td>Not very interested</td>
<td>9%</td>
</tr>
<tr>
<td>Not at all interested</td>
<td>8%</td>
</tr>
<tr>
<td>Don’t know</td>
<td>2%</td>
</tr>
</tbody>
</table>

66% equates to 8.3m people interested or have one installed.
Accurate bills and visibility of what we’re spending are the most popular features

There’s been little change in what people see as the appeal of smart meters. Customers would prefer to see the cost of energy displayed in pounds and pence. Another joy for people with smart meters is the eradication of estimated bills. Smart meters mean an end to shock bills and no more having to get on the phone to query a bill.

**Figure 7.** Appeal of smart meters (among those who know what a smart meter is)

- **Choose to use energy when it’s cheapest:** 27%
- **See information on a smart meter display:** 25%
- **No need for energy company to visit your home to read meter:** 19%
- **Installed at no extra cost to every customer who wants one:** 31%
- **Help every household in the country waste less energy:** 28%
- **Receive accurate bills rather than estimated:** 43%
- **See in pounds and pence the energy you are using:** 59%
- **Easier to choose the right deal for me:** 12%
- **Smart meters help create a smarter energy sector:** 15%
- **Energy companies will know when you’ve lost power (e.g. storm):** 9%
- **Easier to choose the right energy supplier:** 8%
- **Prepay customers can top up via their mobile or online:** 7%
- **There’s been little change in what people see as the appeal of smart meters. Customers would prefer to see the cost of energy displayed in pounds and pence. Another joy for people with smart meters is the eradication of estimated bills. Smart meters mean an end to shock bills and no more having to get on the phone to query a bill.**
Understanding about smart meters is growing across Great Britain

Smart meters are coming to every corner of Great Britain, from Devon to Dundee, but there are regional variations in understanding. Leading the way is North East England where 30 per cent of the population understand what a smart meters is. By comparison, the figure for London is 20 per cent.

**Figure 8.** Geographical breakdown showing understanding of what a smart meter is

- **30%** North East
- **27%** North West
- **26%** West Midlands
- **26%** Wales
- **26%** Scotland
- **25%** East Midlands
- **25%** East of England
- **25%** South East
- **23%** Yorkshire and Humberside
- **23%** South West
- **20%** London
People in London are leading the way in levels of interest

There’s no mistaking the appetite for smart meters. Of people in London who understand what a smart meter is, 71 per cent are interested in getting one or already have one. Levels of interest in the North East and North West of England are only a step behind. Even in the South West of England where the figure is lowest it’s still close to six out of ten people.

Figure 9. Geographical breakdown showing those who are interested in getting a smart meter installed or who have one already (among those who know what a smart meter is)
Understanding is growing among different groups of people

**Figure 10.** Understanding of smart meters broken down by demographic group

<table>
<thead>
<tr>
<th>Demographic Group</th>
<th>Understanding (%)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Total population</td>
<td>25%</td>
</tr>
<tr>
<td>Anyone with a physical impairment in the household</td>
<td>29%</td>
</tr>
<tr>
<td>Anyone with a disability in the household</td>
<td>27%</td>
</tr>
<tr>
<td>Low income</td>
<td>26%</td>
</tr>
<tr>
<td>In fuel poverty</td>
<td>25%</td>
</tr>
<tr>
<td>Anyone with a mental health condition in the household</td>
<td>24%</td>
</tr>
<tr>
<td>Renters</td>
<td>23%</td>
</tr>
<tr>
<td>Pay by prepay</td>
<td>22%</td>
</tr>
<tr>
<td>Group renters</td>
<td>15%</td>
</tr>
</tbody>
</table>
Demographic groups who are especially interested in smart meters

Once they understand what a smart meter is there are some people for whom the benefits are especially welcome including those in fuel poverty, on prepay meters and renters. Prepay customers will be offered more competitive tariffs and they will be able to top up online or over the phone instead of having to go to the shops. Renters will find that moving home becomes just that bit easier as they escape the aggravation of being chased for the bills of previous tenants.

Figure 11. Breakdown by demographic group of those who are interested in having a smart meter installed or who have one already (among those who know what a smart meter is)

<table>
<thead>
<tr>
<th>Demographic Group</th>
<th>Interest (%)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Anyone with mental health condition in household</td>
<td>73%</td>
</tr>
<tr>
<td>Pay by prepay</td>
<td>69%</td>
</tr>
<tr>
<td>Group renters</td>
<td>67%</td>
</tr>
<tr>
<td>In fuel poverty</td>
<td>66%</td>
</tr>
<tr>
<td>Renters</td>
<td>66%</td>
</tr>
<tr>
<td>Anyone with a disability in household</td>
<td>64%</td>
</tr>
<tr>
<td>Anyone with a physical impairment in household</td>
<td>64%</td>
</tr>
<tr>
<td>Low income</td>
<td>60%</td>
</tr>
</tbody>
</table>
Maureen Fenlon, Lincolnshire

Maureen is retired and lives with her husband, Viv, in a bungalow in Sutton Bridge in Lincolnshire.

Maureen has had her smart meter since February 2015. She found installation to be quick and easy and she still pays by direct debit in the same way as before.

She was soon sold on the technology. “I keep the display in the kitchen and I check it all the time - it's really interesting to see what we're spending as we go along. On an average morning, after we've had a few cups of tea, used the washing machine, and had the computer switched on, it's often still only around 30p. Ours has a particularly useful function that predicts what we're likely to spend during the rest of the day,” said Maureen.

The meter has certainly led to a change of behaviour. “Being more aware of what I'm using has encouraged me to be more careful around the house. I keep an eye on the central heating and if I'm cooking a meal in the oven, I try to roast everything at the same time rather than doubling up and using the microwave or hob for my vegetables. We're much more economical than we used to be.”

For Maureen there is additional icing on the cake. As she puts it: “I always recommend having a smart meter, particularly because I don’t have to go outside in winter and contend with the spiders in order to take a meter reading.”
To find out more about smart meters please visit smartenergyGB.org