

Sustainable Development Indicators



The UK Government and Devolved Administrations set out a strategy for sustainable development, *Securing The Future*, in 2005. Drawing on this framework and stakeholder feedback, we focus on the five themes which we think capture how the Gas and Electricity Markets Authority should contribute to the sustainability challenges of the 21<sup>st</sup> century.

The third of the five themes is promoting energy saving. Energy conservation and improved energy efficiency are critical elements in any sustainable development strategy. Saving energy can deliver a huge range of environmental, social and economic benefits. We are committed to playing our part to encourage all energy consumers to be more energy efficient and to facilitating the provision of energy services by market participants.

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#### Indicator 9: Energy consumption and intensity

Figure 14 - Non-transport Energy Consumption (updated October 2011) Source: DECC DUKES

Over the past 9 years, gas consumption has fallen while consumption of electricity and other sources of energy has remained relatively stable. There was a dip in gas consumption in 2009 due to the UK's adverse economic conditions, and a rise in 2010 due to the cold weather.



#### Figure 15 - Energy intensity by sector (updated October 2011)

Source: DECC Energy Consumption in the UK

All sectors of the economy are now less energy intensive than they were in 1990. The service sector has progressed the most in recent years, with the transport sector making the least progress. The sharp increase in domestic energy intensity in the past year was mostly due to the cold weather.



## Figure 16 - Energy intensity and carbon dioxide emissions of power generation (updated January 2012)

Source: DECC UK Energy Sector Indicators

There has been an increase in CO2 emissions from electricity generation in the last year, but emissions are still lower than they were in 2008. A similar slight increase in electricity generated and GDP means that the UK's energy intensity has also increased, but the overall downward trend shows that we are using electricity more efficiently over time.

### Indicator 10: CO<sub>2</sub> savings from the CERT



## Figure 17 - Carbon dioxide emissions savings from the CERT, including carry-over (updated July 2012)

Source: Ofgem

The government's Carbon Emissions Reduction Target (CERT) scheme has achieved savings of nearly 250m lifetime tonnes of CO2 since it began in 2008.

At the end of year four of CERT, suppliers have achieved 78% of their overall target, 42% of their Insulation Obligation and 22% of their Super Priority Group obligation.



### Indicator 11: Gas and electricity losses

#### Figure 18 - Electricity transmission losses (updated January 2012) Source: Ofgem data

Transmission losses fell significantly in the 2010/11 reporting year, to their lowest point in over ten years. A major factor responsible for this drop is an increase in generation in the south with high load factors which have reduced the North - South flows.

Changes to the reporting time scale for Distribution losses means the 2010/11 data for the distribution system will be available in 2013.



# Figure 19 – Methane emitted from gas distribution networks (updated January 2012)

Source: Ofgem data

This chart shows a decline in methane emissions from gas distribution networks as the gas mains replacement programme proceeds. Emissions have fallen by over 13,000 tonnes in two years, or the equivalent of 288,729 tonnes of  $CO_2$ .