

What's in my energy bill?



Last modified: 26 Jan 2016

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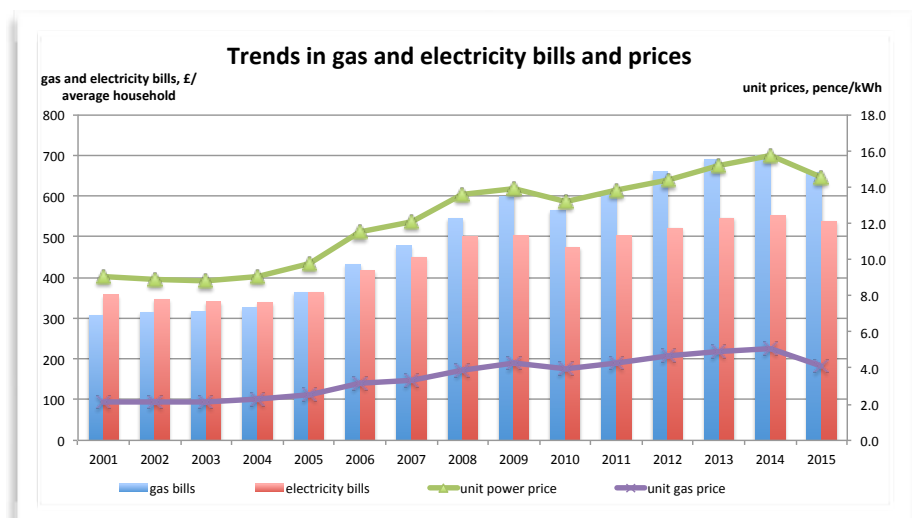
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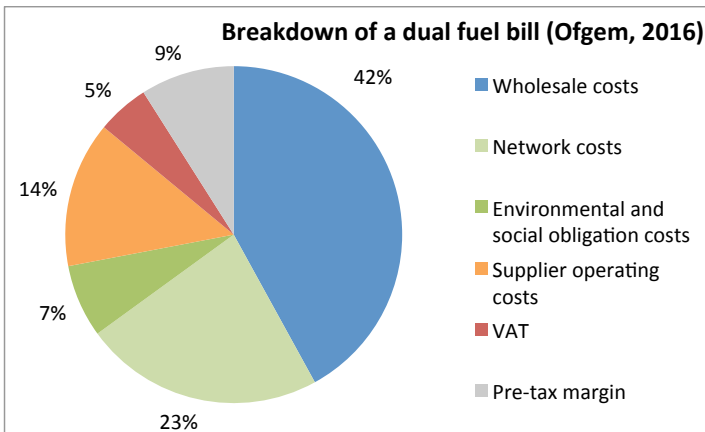
Household bills for gas and electricity almost doubled in the decade to 2014. But the trend reversed in 2015, as bills fell, tracking falling wholesale prices for gas and coal. Now the government is projecting much slower rises in residential gas and power prices, while bills overall may fall until the end of the decade.

Energy bills include more than just the cost of gas and electricity. They also include network costs, various government taxes and policies, and the profits of energy utilities. Environmental policies can have the important effect of reducing bills, by driving investment in energy efficiency.



What are we paying for?

The wholesale price of gas and electricity accounts for nearly half of the average UK energy bill, according to the regulator [Ofgem](#). In addition to these direct energy costs, bills also include the costs of transporting gas and electricity, environmental and social policies, VAT, and supplier profits.



Household bills [almost doubled](#) in the decade to 2014, data from the Department of Energy and Climate Change (DECC) show. Most of this increase was due to rising energy costs. Only [about 20%](#) was due to low-carbon policies, according to the Committee on Climate Change (CCC), which advises the government on emissions targets.

2015 marked a reversal: both energy prices and household bills fell. DECC now projects [much slower rises in residential power and gas prices](#) in coming years, compared with the previous decade.

Wholesale energy prices are the biggest single contributor to bills, at 42% of the total. Gas is the most significant fuel, accounting for [nearly two thirds](#) of domestic energy, for heating and cooking.

Gas is also a significant fuel indirectly, through its contribution to electricity generation. Electricity accounts for a quarter of domestic energy use. It is generated from gas and coal, at [30% each](#), and from renewable and nuclear power, at about 20% each. Britain plans to [phase out coal by 2025](#).

The direction of wholesale fossil fuel prices is hard to predict. However, [the International Energy Agency](#) expects global gas prices to remain low as a result of ample supplies, and also expects low coal prices, due mainly to falling Chinese consumption.

Government 'green policies'

The phrase 'green levies' is sometimes used as a shorthand for government measures intended to encourage expansion of low carbon power, to subsidise home insulation and to tackle fuel poverty. These levies were a focus of growing concern when energy bills were rising in the year up to 2014. Prime Minister David Cameron is rumoured to have [referred to them as 'green crap'](#).

In fact, these levies account for only about 7% of household bills. They can be divided between support for energy efficiency, especially to [help the less well-off insulate their homes](#), and for low-carbon electricity technologies. Low-carbon support will contribute about £60 to the average annual household energy bill of nearly £1,300 in the year to March 2016, [according to Ofgem](#). Support for energy efficiency and vulnerable people will add about £35.

Because support for efficiency reduces energy consumption, the net effect of these low-carbon and efficiency measures is actually to reduce bills overall. Without them, DECC estimates that bills on average would be [around 6% higher](#).

Green levies [will rise through 2020](#), as energy companies progressively switch to a cleaner power system and invest in energy efficiency. However, the government has set a cap on low-carbon energy support under its [Levy Control Framework](#).

Transporting and distributing energy

The network for transporting gas and electricity comprises a combination of high capacity, national transmission lines, and more local distribution systems to the end consumer.

Network costs account for nearly a quarter of consumer bills. The cost of the distribution network [accounts for most of this](#).

Ofgem expects the much smaller costs of electricity transmission [to rise by about a fifth to 2020](#), to connect new wind and solar power and upgrade the system. But it also expects electricity distribution costs to fall.

Ofgem says overall network costs will remain about the same.

Energy company profits

Electric utilities pass their running costs on to consumers. These costs account for about 14% of bills, [says Ofgem](#). In addition, suppliers extract a profit margin, which they need for reinvestment and to reward shareholders. That margin has recently varied between 3% and 9% of consumer bills, according to Ofgem.

A big question is whether suppliers are making excessive profits, at the expense of consumers. Ofgem raised concerns in 2011 that the 'Big Six' utilities faced too little competition. Since then, it has [forced them to report profits](#) in each segment of their business and has [opened up the market](#) to smaller suppliers. And the government has forced suppliers [to simplify their tariffs](#) and allow easier switching of supplier.

Still worried about fairness, in 2014 Ofgem referred the energy market to the Competition and Markets Authority (CMA).

[The CMA reported provisional findings in mid-2015](#), declaring that the 'Big Six' were overcharging consumers on standard tariffs and that consumers could make big savings from switching to alternative suppliers. The CMA concluded that the 'Big Six' had 'unilateral market power' which allows them to exploit customers. It said they were charging households more than smaller independent suppliers, and were charging about 5% more than might be expected in a competitive market.

And the future?

The next big step in the regulation of domestic energy will come when the CMA makes its final recommendations for reform, [in June 2016](#). Already it [has made some provisional recommendations](#). One of these was to require suppliers to charge a 'safeguard regulated tariff', which stopped the 'Big Six' from

overcharging customers less interested in switching. The CMA also proposed a simpler, Ofgem-led price comparison service for households, to promote switching. Ofgem [has already supported](#) these recommendations.

Apart from suppliers' profits, there are various other factors driving the size of consumer energy bills going forwards. Both the government and analysts expect wholesale energy prices to remain low, or to rise only slowly, for the rest of this decade. Meanwhile, Ofgem expects network costs to remain about the same, while the CCC expects efficiency gains to offset rises in green levies.

Overall, both the [previous government](#) and [the CCC](#) expect domestic energy bills to fall in real terms up to 2020, before rising again in the decade to 2030.

One big change in domestic energy markets in the next few years will be [the roll-out of smart meters to almost all households](#) by 2020. For customers, they may allow a switch to cheaper, 'time-of-use' tariffs, if they can use less power during peak periods. For utilities, they will cut costs by bringing an end to property visits for manual meter readings.