

## Remarks for launch of BP Statistical Review of World Energy 2013

Good morning everyone and welcome to the launch of BP's 62<sup>nd</sup> Statistical Review of World Energy since 1952.

A couple of practical points to begin with. We have no fire drills scheduled today - so if the alarm sounds we will have to evacuate the building. The exits are clearly marked and the emergency route is shown in the details on your seats. Also please can I ask you to turn off or your phones or please keep them silent.

This Review looks at the world of energy in 2012 – how it was produced, how it was consumed and how it was traded. It's a great piece of work by our economics team led by our chief economist, Christof Ruehl.

The Stats Review has become a standard work of reference for those who work in and around the energy industry and it provides new insights each year.

So what can we learn from the data for 2012? I'll hand over to

Christof to look at the detail but I'll open with a few observations and messages that I take from this Review.

## **Observations**

The first observation is about demand. This Review reports that the rate of growth in energy demand worldwide slowed to 1.8% last year from 2.4% in 2011. This reflects the general economic slowdown of the globe but it also indicates how individuals and businesses have responded to high prices by becoming more efficient in their use of energy.

In the OECD world, demand for energy has fallen for four out of the last five years. This is where we have really seen the impact of higher prices in driving improvements in energy efficiency.

Meanwhile demand from the emerging economies of the non-OECD world overtook that of the OECD in 2008 and it has kept on rising. Non-OECD demand grew at 4.2% last year while OECD demand fell by 1.2%.

This shift of global energy demand growth – away from the mature OECD economies to the rapidly-growing emerging countries – has been well documented and much debated. But the data presented here shows just how dramatic that shift has been. Just twenty years ago, the emerging economies accounted for only 42% of global consumption; now that figure is 56% and by 2030 we expect it to be 65%.

This is the main reason why consumption is still growing on a global scale – and why we project it will continue to grow for at least the next two decades.

On the supply side, the big phenomenon remains the American shale revolution - which led to another record-breaking year. US oil and gas production grew faster than that of any other country – and for oil, the US saw the largest increase ever.

The growth in US output was a major factor in keeping oil prices from rising sharply despite a second consecutive year of large oil supply disruptions – along with the recovery in Libya and record

output in Saudi Arabia.

Moreover, the rise in supply in the US has not only transformed the country's energy industry and sharply reduced the country's energy imports, but has also created jobs and provided a much-needed boost to the US economy.

US shale developments drove down North American natural gas prices with the result that gas displaced coal in power generation. Indeed globally gas was the only fossil fuel for which demand accelerated last year.

For the OECD countries, these two dynamics that I have described – improved energy efficiency, and in the US substituting gas for coal in power – have reduced carbon emissions at scale. US emissions of carbon dioxide are now back to 1994 levels.

The Review also highlights the flexibility of the world's energy system. While gas gained ground from coal in the US, the opposite occurred in Europe.

Expensive natural gas lost ground – firstly to renewables – which continue to grow robustly, in part due to continued government support – and secondly to cheaper coal, much of it imported from the US. And as gas lost ground in Europe, LNG cargoes turned instead to Japan, helping to offset an 89% decline in nuclear power output in the aftermath of the tragedy at Fukushima.

## **Messages**

So what messages do we draw from these developments? For those of us in the industry, the challenges are about how we respond to the big shifts we are seeing – a shift in demand towards emerging economies and a shift in supply towards a greater diversity of energy sources including unconventional.

The data shows there is ample energy available. Our challenge as an industry is to make the best choices about where to invest. We want to provide energy in ways that enable us to be both safe and competitive – deploying our strengths while reducing our risks, and managing our costs.

In BP, we believe the Review supports the approach of putting value before volume – not chasing every last barrel of production but focusing on the barrels that deliver the most value with large-scale, long-term, high quality projects – such as those in our four major upstream regions of the North Sea, Angola, Azerbaijan and the Gulf of Mexico.

This is the approach that has led us to divest \$38 billion of non-strategic assets and focus on our core strengths of exploration, deepwater, giant fields, gas value chains, world-class downstream businesses, relationships and technology. Technology is central in driving safety, reliability and competitiveness – for example through digital monitoring of equipment and producing fields.

In the downstream, we have responded to falling oil demand in the US by divesting some of our refining capacity but then investing in new capacity and new technology at the refineries we have retained.

Meanwhile, we're fuelling the growth of demand in the non-OECD

world, for example by investing in gas production and supply in India and by providing gas to China as an alternative to coal. Just last month we announced a major gas discovery offshore India with our partners.

The Review also reminds us why we have continued to invest in Russia and have taken a stake of nearly one fifth in Rosneft. By any measure, Russia is massively significant in the energy world. Russia once again produced more oil and gas combined than any other country in 2012 – but the real story is its potential to increase that production still further. It has ample proved reserves and vast expanses yet to explore – with tight oil being a particularly promising area.

In terms of messages on carbon emissions, the Review shows the potential for material progress. In the US, the competitive environment in some states has enabled shale gas to be developed at scale. Gas prices were competitive with those of coal in 2012 – and gas displaced coal in power generation. Meanwhile consumers responded to higher prices at the pump and carbon

dioxide emissions fell.

The US experience demonstrates that gas can be competitive with coal in power generation where it can be developed at scale. That would be even more the case were there to be a more widely applied and meaningful carbon price, something we continue to support.

More generally the Review shows how flexible the world's energy system can be when consumers and producers are able to respond to market signals.

However the Stats Review also shows how outcomes often defy expectations when markets operate naturally. Go back ten years and you'll find people worrying about America being addicted to energy imports – today it is heading towards self-sufficiency. You'll find people saying oil is running out – today the reserves are greater than ever. Today some people are saying the shale boom is a bubble that will soon burst – while others predict it will spread in time to China, Russia and eventually Europe.



Whatever people's views are, the Stats Review will be there to chronicle what actually happens and provide the facts, collated by the economics team here at BP. My thanks to them for the hard work that goes into the Review. I hope you all find it interesting and useful – and now let me hand you over to Christof Ruehl.