

Three steps to a low-carbon economy

THE GOAL OF ZERO NET EMISSIONS CAN BE ACHIEVED

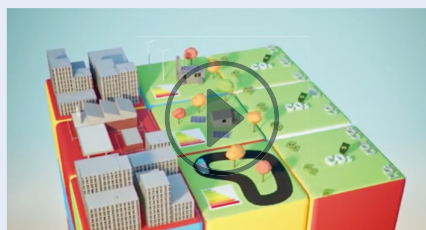
- ▶ **To limit the impact of climate change**, net greenhouse gas emissions must fall globally to zero by the end of the century.
- ▶ **Three policy approaches** are essential to meeting this goal:
 - We must strengthen** carbon pricing and remove fossil fuel subsidies;
 - We must remove barriers** to green investment; and
 - We must align policies** across the economy to leave fossil fuels behind as well as improve transparency on climate finance.

What's the issue?

Fossil fuels account for around 81% of the energy we use. Despite the increasing focus on renewable sources of energy, the share of fossil fuels in the energy mix has changed little since the 1990s. But as well as supplying our energy needs, fossil fuels are also the major source of the carbon emissions that are fuelling climate change.

The legacy of human activity on the planet means that some level of climate change is now inevitable. But there is still time to limit the extent of the temperature rise to under 2°C, rather than the 3 to 5°C rise we are currently facing. For this to happen, we must achieve zero net greenhouse-gas emissions globally by the end of the century.

Reaching this goal will be challenging but by no means impossible. At the policy level it will require governments to disentangle their often contradictory approaches to climate change and energy. On the one hand, most governments are now committed to reducing carbon emissions. But, at the same time, many still subsidise fossil fuel producers and the use of coal and other fossil fuels. Many, also, are doing too little to encourage investment in alternative sources of energy and the rest of the green economy. Resolving these contradictions, and developing a genuine global partnership to fight climate change, are essential to getting to zero net emissions.



Meeting climate goals will require stronger policies to cut emissions.

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Why is this important?

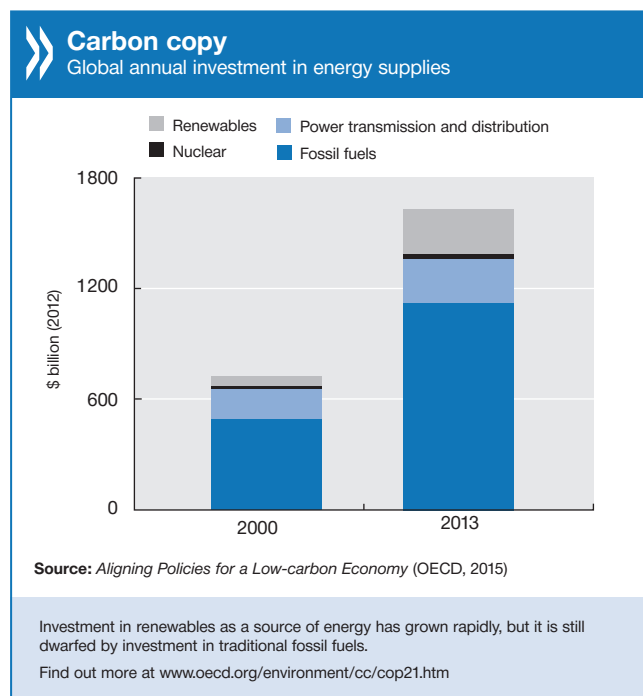
Unless governments take concerted action, fossil fuels will remain humanity's energy source of choice, contributing still further to the build-up of greenhouse gases. Despite the urgency of the challenge, policies in many countries continue to favour fossil fuels. Take coal: it is usually the least heavily taxed of all fossil fuels and is also generally subject to very low or no import tariffs. By contrast, renewable energy sources may be subject to import tariffs of at least 10%, and in some cases as high as 30%.

Unfortunately, there is often strong resistance to reducing our reliance on fossil fuels, with critics warning of risks to economic growth and competitiveness. However, there is little evidence that many of the steps essential for the transition to a low-carbon economy – such as subsidy reform and improving energy efficiency – pose any such threats. Equally, there is a high economic cost to doing nothing: research by the OECD suggests that, by 2060, climate change could reduce global GDP by between 1% and 3.3% a year.

A second challenge is posed by the extent to which our economies and societies remain deeply entangled with fossil fuel use and exploitation. For example, many government budgets and pension funds still rely heavily on returns from the coal and oil industries. Disentangling these linkages will require clear and predictable policies that ensure the true environment cost of fossil fuels is transmitted to producers and users.

What should policy makers do?

The potential for making rapid cuts in carbon emissions is greater than many people realise. It can be made to happen if governments act quickly in three main policy areas: strengthen carbon pricing and remove fossil fuel subsidies;



remove barriers to investment in the green economy; align policies across the economy – and not just in climate-related areas – and increase transparency on climate finance flows.

Strengthen carbon pricing and cut fossil fuel subsidies:

Despite rising investment in renewables, we remain overly reliant on fossil fuels. In part, this is because the cost of fossil fuels to consumers does not reflect the environmental damage caused by these fuel sources. Equally, a range of subsidies, soft tax arrangements and investment allowances insulate producers from the true cost of extracting and using fossil fuels. While a gradually rising carbon price is necessary, there is an urgent need for governments to remove subsidies on fossil fuels to strengthen price signalling, both for producers and consumers. But with some notable exceptions, too few countries have taken action. Similarly, more needs to be done to introduce realistic carbon taxes. And while there has been progress on introducing emissions trading systems, allowance prices within these systems are generally too low.

Remove barriers to investing in the green economy: The underpricing of fossil fuels also serves as a barrier to investment in energy efficiency and renewable energy sources. For example, because the cost of pollution is not being accurately priced, fossil fuel projects appear more competitive than clean infrastructure projects. But there are other barriers to such investment. These include unpredictable policy and regulatory environments; market and regulatory arrangements that favour existing fossil fuel power generators; high financing costs; and barriers to

international trade and investment, such as local-content requirements for solar and wind-energy projects. The need to tackle these policy shortcomings is urgent, especially in light of the opportunities for green investment that are opening up as existing power plants reach the end of their operating lives.

Align policies across the economy and support climate

finance: The complex challenge of tackling climate change requires transformative domestic policies that build extensively on international trust and co-operation. Leaving fossil fuels behind implies change that will cut across every aspect of the economy. Tracking progress effectively is essential to providing a clear sense of whether or not carbon-pricing instruments and other policies to address greenhouse gas emissions are being implemented.

A major international effort is also needed to support climate change mitigation and adaptation in developing countries, many of which face particular risks from rising temperatures. Developed countries have committed to provide \$100 billion a year by 2020 and have made significant progress towards meeting this goal: in 2014, climate finance reached an estimated \$61.8 billion. That is encouraging, but it is also clear that a sustained effort will be needed to meet the 2020 goal.



Sources

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