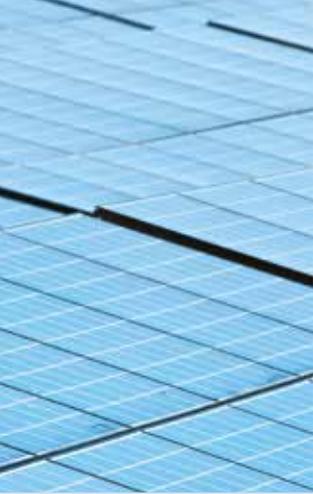


Mobilising private investment in clean- energy infrastructure

what's happening
2015





Why is scaling up investment in clean-energy infrastructure important?

Investment in clean-energy infrastructure needs to be scaled up significantly in the coming years to hold the increase in global average temperature below 2°C above pre-industrial levels.

Scaling up investment in clean-energy infrastructure creates opportunities and benefits. These include: facilitating cost-effective access to energy in rural and remote areas; reducing local air pollution and associated health costs; reducing fossil-fuel reliance for energy-importing countries; creating domestic jobs; and fostering innovation. Investing in clean energy is also profitable from an economic point of view. The International Energy Agency estimates that every additional dollar invested today in clean energy can generate three dollars in future fuel savings by 2050.

Given the current strains on public finance, mobilising investment in clean-energy infrastructure will require leveraging both domestic and international private investment. However, investment in clean energy remains seriously constrained by specific barriers, including market and government failures.





Barriers include:

- Inefficient fossil-fuel subsidies.
- Weak or non-existent carbon pricing.
- A lack of a predictable policy and regulatory environment.
- Market and regulatory rigidities that favour fossil-fuel incumbency in the electricity sector.
- A lack of support policies to help immature green technologies achieve competitiveness with incumbent technologies.
- High financing costs.
- Barriers to international trade and investment.

A broad range of policy interventions are needed to transform the energy system and shift investment away from fossil fuels towards clean energy.

The OECD has extensive experience in helping governments create an enabling environment to maximise investment flows to clean-energy infrastructure in OECD countries and developing and emerging economies.

The OECD has extensive experience in helping governments create an enabling environment to maximise investment flows to clean-energy infrastructure...





OECD policy guidance for investment in clean-energy infrastructure

The Policy Guidance is a non-prescriptive tool to help policy makers identify ways to mobilise private investment in clean-energy infrastructure.

It raises key issues for policy makers to consider, including in the areas of:

The Policy Guidance involves an in-depth review process designed to help governments assess and reform their domestic policy framework for clean-energy investment...

- **INVESTMENT POLICY:** applying investment policy principles such as non-discrimination, investor and intellectual property protection, contract enforcement and transparency.
- **INVESTMENT PROMOTION AND FACILITATION:** improving coherence of the broad system of investment incentives and disincentives, e.g. by setting long-term goals, removing inefficient fossil-fuel subsidies, pricing carbon emissions, setting well-targeted and time-limited incentives (e.g. feed-in tariffs), and facilitating the licensing of renewable-energy projects.
- **ENERGY MARKET DESIGN AND COMPETITION POLICY:** creating a level playing field between independent power producers and state-owned enterprises and between national and foreign actors to tackle market rigidities that favour fossil-fuel incumbency in the electricity sector.
- **FINANCIAL MARKET POLICY:** strengthening domestic financial markets and providing specific financial tools and instruments to facilitate access to long-term finance.



- **GOVERNANCE OF ENERGY MARKET INSTITUTIONS:** enhancing co-ordination between different levels of governance (e.g. to align national and sub-national policies), ensuring the independence of the electricity market regulator, and co-ordinating the planning and deployment of the electricity grid with that of clean-energy generation.
- **OTHER POLICIES AND CROSS-CUTTING ISSUES:** regional co-operation, making and implementing the choice between public and private provision of clean-energy infrastructure, and ensuring that clean-energy policies are compatible with World Trade Organization (WTO) rules.

The Policy Guidance benefited from substantial contributions by the World Bank and the United Nations Development Programme (UNDP) and was annexed to the Communiqué of G20 Finance Ministers and Central Bank Governors at their meeting in October 2013.

In partnership with interested countries and international organisations, the Policy Guidance is now being applied to specific country contexts. This involves an in-depth review process designed to help governments assess and reform their domestic policy framework for clean-energy investment. One of the main outcomes of this project will be the publication of **Clean-Energy Investment Policy Reviews** for interested countries, which will include a road map of actionable reforms.



Overcoming barriers to international investment in clean energy



This forthcoming report takes stock of policy restrictions to international investment in solar PV and wind energy, and assesses their impacts across the value chains.

The report highlights the rise of indirect and hidden protectionism in the solar-PV and wind-energy sectors since 2008. In a post-crisis recovery context, the perceived potential of clean energy to support employment has led several OECD and emerging economies to design green industrial policies aimed at protecting domestic manufacturers. In particular, some governments have established Local-Content Requirements (LCRs), which require solar or wind developers to source locally a specific share of jobs, components or costs. Such requirements have been designed or implemented in the solar and wind-energy sectors in at least 21 countries, mostly since 2009.

The report provides evidence that shows that LCRs have hindered international investment across the solar PV and wind-energy value chains by increasing the cost of inputs for downstream activities. In addition, it finds that the impact of LCRs on domestic manufacturing and local job creation is mixed or negative. By assessing the impacts of LCRs across different segments of the solar-PV and wind-energy value chains, this report provides policy makers with evidence-based analysis to guide their decisions in designing support policies for solar PV and wind energy, and to reconcile potential policy trade-offs.



Institutional investors and green infrastructure



Traditional sources of green-infrastructure investment such as governments and banks face increasing constraints due to structural reasons, deleveraging and impending financial regulations.

In this context, institutional investors such as pension funds, insurance companies and sovereign wealth funds could play a key role in financing the transition to a low-carbon economy.

However, only 1% of large pension fund assets are allocated directly to infrastructure projects and an even smaller portion goes to green infrastructure.

An OECD report published in 2013 (Kaminker et al., 2013) and transmitted to G20 leaders lists key actions governments can take to attract institutional investment in green infrastructure:

- Ensuring a stable and integrated policy environment.
- Addressing market failures.
- Providing an infrastructure road map.
- Facilitating the development of appropriate financing instruments and funds or de-risking tools.
- Promoting market transparency and improving data collection.

Building on this analysis, the OECD has produced a report that provides a framework to help policy makers better understand the processes and channels through which institutional investors make sustainable-energy investments (in projects or companies) and the methods available for facilitating these types of investments. This report, entitled **Mapping Channels to Mobilise Institutional Investment in Sustainable Energy** (OECD, 2014a), is part of a broader effort to develop policy guidance on long-term investment focusing on the role of institutional investors.



In addition to promoting and facilitating policy dialogue between institutional investors and policy makers on green investment and financing, the OECD has launched the Green Investment Financing Forum (GIFF). The first GIFF, held in June 2014, focused on the role of special purpose “green investment banks” to mobilise domestic climate finance and investment, including from institutional investors. The GIFF will be an annual event addressing key issues on the topic.

References

IEA (2014a), *Energy Technology Perspectives 2014: Harnessing Electricity's Potential*, OECD/IEA Publishing, Paris, http://dx.doi.org/10.1787/energy_tech-2014-en.

IEA (2014b), *World Energy Outlook 2014*, IEA/OECD Publishing, Paris, <http://dx.doi.org/10.1787/weo-2014-en>.

Kaminker, C. et al. (2013), "Institutional Investors and Green Infrastructure Investments: Selected Case Studies", OECD Working Papers on Finance, Insurance and Private Pensions, No. 35, OECD Publishing, Paris, <http://dx.doi.org/10.1787/5k3xr8k6jb0n-en>.

OECD (2015 forthcoming), *Overcoming Barriers to International Investment in Clean Energy*, OECD Publishing, Paris.

OECD (2014a), *Mapping Channels to Mobilise Institutional Investment in Sustainable Energy*, OECD Publishing, Paris, <http://dx.doi.org/10.1787/9789264224582-en>.

OECD (2014b), *Policy Guidance for Investment in Clean Energy Infrastructure: Expanding Access to Clean Energy for Green Growth and Development*, OECD Publishing, Paris, <http://dx.doi.org/10.1787/9789264212664-en>.

OECD (2013a), *Annual Survey of Large Pension Funds and Public Pension Reserve Funds: Report on pension funds' long-term investments*, October, 2013, www.oecd.org/daf/fin/private-pensions/LargestPensionFunds2012Survey.pdf.

OECD (2013b), "The Climate Challenge: Achieving zero emissions", Lecture by the OECD Secretary-General, Mr Angel Gurría, London, 9 October 2013, www.oecd.org/about/secretary-general/the-climate-challenge-achieving-zero-emissions.htm.

Contacts

Karim Dahou (karim.dahou@oecd.org)

Robert Youngman (robert.youngman@oecd.org)

For more information:

www.oecd.org/daf/inv/investment-policy/clean-energy-infrastructure.htm

www.oecd.org/daf/inv/investment-policy/level-playing-field-for-green-energy-investment.htm

www.oecd.org/finance/lti



This work is published on the responsibility of the Secretary-General of the OECD. The opinions expressed and arguments employed herein do not necessarily reflect the official views of OECD member countries. This document and any map included herein are without prejudice to the status of or sovereignty over any territory, to the delimitation of international frontiers and boundaries and to the name of any territory, city or area. © OECD 2014.

November 2014