DEVELOPMENT FINANCE

Underinvestment in energy hinders sustainable development Despite measurable progress in recent years, finance committed for energy access and



The IEA estimates that \$41bn is required annually to achieve universal residential electrification Photo: SEforALL

he United Nations' Sustainable Development Goal 7 (SDG7) calls for affordable, reliable, sustainable and modern energy for all by 2030. Currently, there are around 789mn people worldwide who have no access to electricity and 2.8bn people with no access to clean fuels or technologies for cooking.

Meeting SDG7 targets for electrification, clean cooking, energy efficiency and renewable energy is impossible without huge volumes of finance, judiciously deployed. Politicians, development agencies and businesses continuously state the importance of closing energy access gaps, boosting efficiency and deploying clean technologies. But only finance – not words – will help bring sustainable energy to

Investment in sustainable energy is urgently needed because of energy's tangible, positive impact on people's lives. This point is amply demonstrated in the context of COVID-19. Reliable energy access is a matter of life and death – health facilities rely on stable power supplies to treat patients, and the distribution of vaccines hinges on the ability to

clean cooking is still not targeted where it is most needed. Olivia Coldrey looks at how financiers can address the problem and help the world get on track with sustainable development targets.

preserve them through cooling, which is only possible through cold chains powered by electricity.

Beyond health implications, investment in sustainable energy supports the achievement of all 17 SDGs and the realisation of Paris Agreement commitments. For example, we cannot end poverty or empower women without creating new economic opportunities, using energy as an input. And we cannot limit global warming to 1.5°C above pre-industrial levels without accelerating the energy transition away from fossil fuels.

Tracking energy finance

The IEA estimates that universal energy access will require an investment of at least \$45bn annually until 2030. Impactfully deploying this volume of finance requires an understanding of the amount and type of finance currently committed to countries with large energy access deficits, how quickly and effectively it is disbursed and absorbed, the types of energy access solutions that receive finance, and the financing needs of enterprises delivering those solutions.

Providing these insights to inform policy and investment decisions is the aim of Sustainable Energy for All (SEforALL)'s Energizing Finance research series. In November 2020, two new reports were published as part of the series, offering the latest data and evidence on energy finance commitments and disbursements.

Financing energy access is a two-sided problem. First, we need sufficient volumes of committed finance from the full spectrum of investors, including development finance institutions, commercial banks and governments. Second,

finance must be efficiently disbursed to initiatives and projects on the ground. The latest findings from Energizing Finance show that the world is failing to meet both challenges.

Chronic underinvestment

Energizing Finance: Understanding the Landscape 2020 tracks finance commitments for electrification and clean cooking in 20 countries in Africa and Asia with the largest energy access deficits, based on best available data for 2018. It found that finance for electrification increased to an aggregate \$43.6bn in 2018 - up 26% from the \$34.6bn tracked in

These numbers show promise, but a closer look reveals that finance committed for energy access is not targeted where it is most needed. While the IEA estimates that \$41bn is required annually to achieve universal residential electrification, Energizing Finance tracked only one-third of this -\$16bn - in 2018 for residential access in the 20 countries that are home to 80% of the world's population without electricity.

Even within this group, electricity sector investment is highly concentrated. Sub-Saharan Africa accounts for 70% of people in the 20 'high-impact' countries without electricity access. But in 2018, the 14 countries we tracked in Sub-Saharan Africa received less than 20% of the total \$43.6bn finance for electrification tracked in the broader group of 20

Meanwhile, finance for clean cooking in 20 tracked countries tripled from an aggregate \$48mn in 2017 to \$131mn in 2018. While this growth is an important step forward, finance remains a fraction of the IEA's estimated annual \$4.5bn required to achieve universal clean cooking access by 2030.

As the world recovers from COVID-19, we cannot continue to ignore the challenge of expanding clean cooking access, with its positive impacts on health, climate and gender equality. Current investment is dominated by international and public capital from a small number of funding institutions and concentrated in a few recipient countries. Bangladesh alone accounted for 47% of total clean cooking finance commitments in 2018, dominated by two large projects.

Increasing investment in fossil fuel projects

Finance can be committed to energy projects across a range of generation sources. Knowing that the energy transition is incompatible with continued investment in fossil fuels, and with continued declining costs of renewable energy technologies, one would think fossil fuel investment would be on the decline

However, we found that fossil fuel finance commitments to developing countries increased substantially in 2018, accounting for the largest portion of electricity finance for the first time in at least six years, up from \$5.5bn in 2017 to \$21.7bn in 2018. This was accompanied by a commensurate fall in commitments for grid-connected renewable energy in countries with large electricity access deficits.

Investment in mini-grids and off-grid electricity solutions attracted less than 1.5% of the total electrification finance we tracked in 2018. This is especially troubling considering the vital service that off-grid electricity provides in remote, hard-to-reach communities. Decentralised electricity solutions are essential for affordably powering healthcare facilities and other critical infrastructure in these communities, along with businesses and homes.

The problem of disbursement

There is an additional challenge in financing energy access – prompt and efficient disbursement of committed funds. Until disbursement occurs, there is no positive impact on the ground.

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Energizing Finance: Missing the Mark 2020 identified gaps and lags in disbursement of development

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finance for energy in developing countries. It found that disbursement delays are currently plaguing the energy sector and depriving millions of electricity access and clean cooking solutions. In the countries tracked, between 2002 and 2018, more than half of all energy finance commitments suffered from delayed disbursement. As a result, 48% of energy projects suffered implementation delays.

The world is already underinvesting in SDG7. But even with significantly greater committed finance, providing universal access to energy by 2030 would be impossible without addressing inefficiencies in disbursement of committed funds.

The way forward

The international community can consider several strategies to address existing shortfalls in energy finance commitments and regular disbursement delays.

Development financiers and donors can better coordinate to expand their energy access investment portfolios, particularly in Sub-Saharan African countries, and ensure their efforts are complementary and recognise the co-benefits of energy access. In so doing, funders can shift from unilaterally financing individual energy projects to providing programmatic support grounded in countries' long-term, integrated energy plans.

In this context it is especially critical that funders and governments address the unique barriers women face in accessing finance for energy access.

Development financiers should combine their investment activities with technical assistance and local capacity building efforts that target the reasons for disbursement delays. Their expertise can lead to improved energy project design, more efficient administrative processes, and better coordination between stakeholders, all of which are factors that influence how quickly development finance reaches energy projects.

The continued financing of fossil fuel projects as a means to close the energy-access gap has proven ineffective and must be rapidly phased out to align with global climate goals. Instead, funds should be allocated to projects that provide sustainable energy access, such as grid-connected and off-grid renewable energy.

In many countries, expansion of decentralised renewable energy is hampered by unsupportive policies and regulations, small deal sizes, and limited access to growth capital, de-risking instruments and local currency finance. Policy reforms that create a more conducive investment environment, and continued innovation in business models and financial instruments, can help overcome these barriers.

Rwanda is a strong example of how supportive polices for mini-grid developers, including clear licensing requirements, tariff regulations, provisions for grid arrival and risk mitigation facilities, have increased private sector participation in, and finance commitments to, the decentralised electricity sector.

National governments are key to expanding clean cooking access. Making it easier for small and medium-sized enterprises and clean cooking innovators to access the finance they need to commercialise solutions should be a high priority. Governments can also send price signals to support a transition to clean cooking by phasing out fossil fuel subsidies and removing taxes on cleaner fuels and technologies.

This would go a long way in moving the sector beyond improved cookstoves and supporting the development of innovative solutions like ethanol and electric cooking. The viability of these emerging solutions would be further boosted with injections of public finance to de-risk private sector investment in the nascent clean cooking sector.

These are just some recommendations, informed by data and evidence, to promote increased energy finance commitments and more efficient disbursement of committed funds.

Governments, the energy and financial sectors, and the development community might consider them as they pursue a shared SDG7 agenda and support the delivery of new energy solutions to countries with stubbornly high energy access deficits. Only purposeful, concerted action will accelerate the transition to sustainable, universal energy access where it is currently most lacking.

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