

THE NEED FOR SMARTER, BETTER TARGETED CLIMATE FINANCE



Image credit: Adam Dean / Panos

Speed read

- Adaptation costs could be up to three times higher than previous estimates
- The challenge will be to efficiently get funding to where it is most needed
- Adaptation must be integrated into broader development plans

[LIMA] The need for funding to help developing countries adapt to climate change is growing as global temperatures continue to rise. But the cost of this adaptation also appears higher than before: a study published last week says that it may be up to three times higher than previously thought.

So the challenge now is not only to channel more money to help vulnerable nations build resilience, but also to deliver it where it is most needed at the same time as improving the

efficiency of new projects. This year's UN Conference of the Parties (COP), currently taking place in Lima, Peru, moves the debate forward as fresh research takes stock of a decade of climate finance and suggests ways to invest smartly, boosting development while improving adaptation.

In its Fifth Assessment Report, the Intergovernmental Panel on Climate Change (IPCC) estimates the overall global cost of climate adaptation in developing countries at between US\$70 billion and US\$100 billion a year by 2050. [1] But a report released last week by the UN Environment Programme (UNEP) suggests that the bill is "likely two-to-three times higher ... and plausibly much higher than this towards 2050". [2]

It adds that "national-level studies indicate far higher global cost figures than global-level studies: towards 2050, costs could be as much as four-to-five times higher than the estimates reported in global-level studies".

The report also warns that scientists may have overlooked factors that hold back climate action in developing countries when making global predictions of emission reductions. For example, in countries such as India or Indonesia, political instability can prevent the implementation of mitigation strategies, encouraging the further use of fossil fuel plants, which remain cheaper to install and more profitable than renewable energy systems.

And the researchers point out that the cost of adaptation increases in proportion with emission levels – and so failing to mitigate climate change in those countries may aggravate the need for adaptation measures.

Adaptation measures are important when climate change impacts cannot be avoided. Erratic weather patterns, droughts, coastal erosion and coral reef bleaching are just a few well known examples of how man-made climate change is affecting the planet.

Researchers have identified agriculture, water management, coastal areas protection and disaster risk reduction as adaptation priorities for the developing world. And various forms of response are already being tested. For example, in flood-prone Bangladesh, farmers are now

using floating garden beds to cultivate leafy vegetables [3] while in arid parts of Africa, improved seeds can help protect yields from droughts.

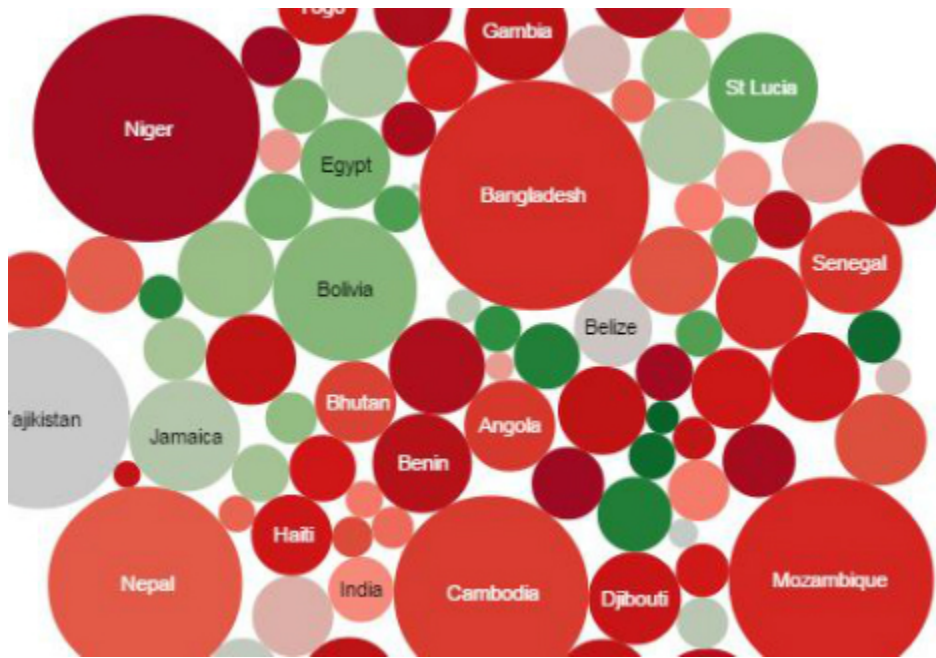
But the report says that climate action for adaptation as well as mitigation is unevenly distributed across the world, and developing countries still struggle to build resilience to climate impacts in a robust, long-lasting way.


“Development and adaptation are closely interlinked. What we generally find is that the higher the level of development, the lower the vulnerability,” says economist Anne Olhoff, one of the lead authors. “We also see that climate change risks are very unequally distributed around the world and what we identify as mean global temperature increase in fact covers large variations. For example, Africa is likely to experience five to six degrees [Celsius] warming under the global two degrees scenario.”

The UNEP findings reveal that each part of the global South faces a unique set of economic and environmental challenges from climate change, and these must be considered when planning adaptation interventions.

For many developing countries, adaptation is a necessity that must be added to other pressing issues such as poverty or the burden of disease. Now the question is how to enable an effective and long-lasting climate response. A comprehensive analysis, released in Lima on Monday by think-tank the Overseas Development Institute (ODI), [4] tracks the flow of climate funds over the past ten years to provide new insights into the effectiveness of climate finance to help developing countries mitigate and adapt.

The study examines countries’ vulnerability to climate change and how much climate funding they have received in the past decade, and ranks their carbon emissions. It also evaluates what has been achieved with those funds and makes recommendations to increase the effectiveness of implemented projects. You can explore the landscape of climate finance in the interactive graph by the ODI. (Figure 1)



 Figure 1. Countries with the highest vulnerability rank are most at risk from climate change. The left-hand axis ranks countries by their greenhouse gas emissions, with the larger emitters higher up the graph. Credit: ODI Click to open this interactive graph. “We found that the funds have been targeting the right places, mostly delivering money where it was most needed and it was most likely to be spent appropriately,” Marigold Norman, a climate finance researcher and one of the study’s two lead authors, tells *SciDev.Net*. “For example, funds for mitigation and forest conservation within the [UN’s] REDD+ programme have gone to countries who showed political commitment to reduce deforestation, such as Brazil and Indonesia, which are also big emitters.”

The list of the top ten recipients of multilateral climate funding also includes Morocco, which received US\$607 million, Mexico with US\$591 million and South Africa with US\$466 million. India, the world’s third biggest emitter of greenhouse gases after China and the United States, received US\$464 million. (Figure 2)

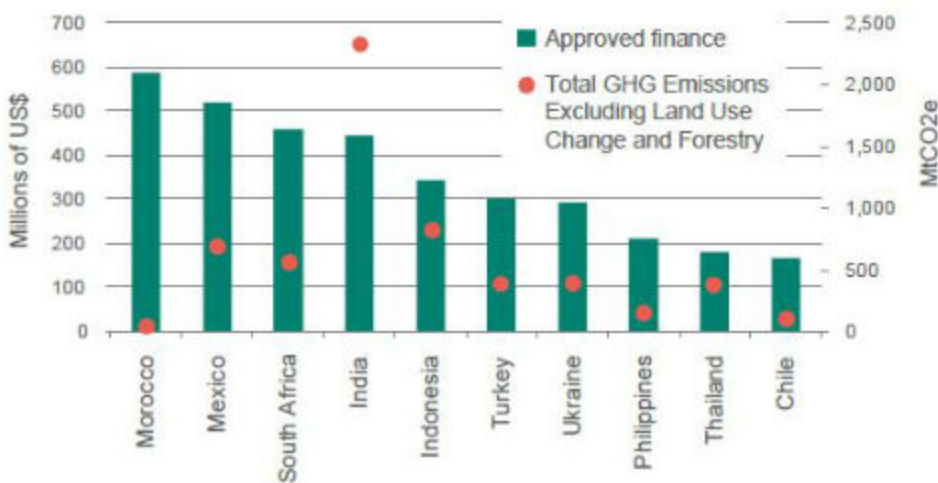


Figure 2. Top ten

recipients of mitigation funding and their greenhouse gas emissions. The red dots show nations' emissions of the various greenhouse gases [measured as an equivalent weight of carbon dioxide measured in millions of tonnes, MtCO₂e]. Credit: ODI. [Click here to see the report.](#) So far, approximately ten per cent of the world's total climate funding has been spent on adaptation in developing nations.

Smita Nakhooda, the other lead author of the ODI report, believes that the introduction of the UN's Green Climate Fund in 2010 during COP 16, which aims to spend half the pot on adaptation in developing nations, is a noteworthy development. "Nearly US\$10 billion has been already pledged [before COP20] and, if the pledges are deposited, this would increase the amount of public funding available for adaptation by at least four times," she says. "But it's important to know that, compared to the cost of adaptation, this will remain a relatively modest sum." Smita Nakhooda, one of the lead authors of the ODI report, talks about the need to invest in innovation to make climate finance more effective

The key for adaptation to make an impact is for it to be integrated into broader plans for development and resilience building, she adds. "Investing in climate-incompatible development is no longer a viable option," Nakhooda says. "If we don't invest in solutions to climate change, we run the risk of reversing the development gains made over the last 50 years."

Nakhooda points out that transport-related investment has great potential to boost development

as well as reducing emissions. Agriculture is also crucial for improving living standards while increasing climate resilience in vulnerable countries, she adds. But although agriculture, transport and forest conservation projects are already being funded, the biggest hurdle to scaling them up is a lack of innovation. “This is in part because many funds are very risk averse and subject to enormous scrutiny that makes them shy away from investing in less-proven approaches and technologies,” says Nakhooda. She points out that technological innovation is a “hugely important frontier to achieve cost reductions that are essential to make low-carbon and climate-resilient development viable”.

Saleemul Huq, a Bangladeshi climate change expert at the International Institute for Environment and Development in the United Kingdom, comments on the need for a clear roadmap to define and implement adaptation as part of the global climate agenda. At the Lima summit, developing countries are asking for greater awareness of and funding for adaptation measures. They want half of all the money pledged globally for climate action to be spent on adaptation and as a form of compensation for the damage rich countries have caused over the past century. It will then be up to negotiators to bring the new scientific evidence presented in Lima to the table at the next COP in Paris, France, at the end of next year and build the framework for faster, more effective climate finance.

Source : <http://www.scidev.net/global/climate-change/feature/smarter-better-targeted-climate-finance.html>