

COULD BIODIVERSITY CREDITS FUND A SIGNIFICANT PART OF INDONESIA'S CONSERVATION POLICIES IN THE FUTURE? AND HOW CREDIBLE IS IT TO EXPECT CREDITS WITHOUT OFFSETS?

Indonesia has some of the richest biodiversity on earth. The country's biodiversity strategy and action plan requires an estimated \$5bn annually, of which just 13% is expected to come from public sources. The government expects contributions from national and international financial institutions and the private sector to bridge the funding gap, i.e. to pay \$4,35bn annually.

Biodiversity credits are seen as a tool to mobilise such private financing for conservation. With support from the British government and the International Advisory Panel on Biodiversity Credits (IAPB), the Indonesian government has prepared a policy framework and developed a biodiversity credits pilot project.

We find that biodiversity credits are not a promising avenue to fund the protection of Indonesia's biodiversity for several reasons:

1. LIMITED EXPECTED REVENUES

Biodiversity offset credits **have existed for decades and failed to raise significant funding**: The regulated, national biodiversity offset schemes are currently mobilising jointly about US\$ 6-9 billion annually.¹

To put this figure in perspective, this represents **1% of the \$700bn global annual funding gap**, and 0,3% of the \$2600bn existing global annual subsidies to harmful activities that could be redirected.

Voluntary biodiversity credits for their part sold **\$3,2million in 2025**, and total sales are estimated to be at around **\$10 million**.²

The main political goals of biodiversity credit markets also mean that **there is little political interest in actually developing these markets in the future**. Most Global North governments continue to prioritize short-term economic growth and competitiveness for their industries over anything else; they are willing to address the biodiversity crisis but only to the extent that it does not get in the way of achieving these objectives. These governments are however mindful of the need to be perceived as acting decisively on the biodiversity and climate crises, in order to avoid social unrest from their populations.

¹ Carbon4 / Nature Finance, Harnessing Biodiversity Credits for People and Planet, June 2023 https://oneplanetsummit.fr/sites/default/files/2023-06/230622-reportonharnessingbiodiversitycreditsforpeopleandplanet-final-en_0.pdf; UNEP assessed that US\$11.7 billion was invested in biodiversity offsets in 2022, UNEP, State of Finance for Nature 2023, <https://www.unep.org/resources/state-finance-nature-2023>

² Bloomlabs, Monthly Market Overview - February 2026, <https://newsletter.bloomlabs.earth/p/monthly-market-overview-february>

Understood this way, biodiversity credits are a perfect policy tool to give the impression that governments are acting more than they really are: just as with carbon offsets before them, they enable to avoid addressing the well-known root causes of biodiversity loss and curb destruction at source, by promising to address the issue downstream, through some remedial action. Companies with harmful activities are not required to curb their destruction, but at best to pay a tiny fee to buy the credits, a small cost of doing business that enables the status quo to continue.

Such a political motive means that there is no real political desire to make these markets actually scale and function; as long as they fulfil their role of giving the illusion of action, and diverting the media and public attention away from calling for more ambitious biodiversity policies, the goal has been achieved. As long as Global North governments can claim a tiny bit of progress at each biodiversity COP, there is no need to do more.

Making these markets actually scale and work would actually get in the way of the overarching growth and competitiveness objectives of most Global North governments, as the price of credits would likely rise to a level unpalatable to their companies with harmful activities. For this reason, we believe that the current balance of political forces will ensure that these markets stop short of imposing significant costs on harmful industries, especially for Global North companies.³

The implication for Global South countries expecting to be able to rely on the sale of biodiversity credits to fund their conservation policies in the future is that **biodiversity credits are unlikely to generate significant revenues for issuing countries**.

2. UNSTABLE TYPE OF FUNDING

Revenues from the sale of biodiversity credits are **extremely exposed to regulatory risk**: since biodiversity credits are not real commodities with an intrinsic value, like wheat, coffee or aluminium, there is very little voluntary demand for them, and most demand would be linked to a requirement for companies to purchase these credits. Yet, this would make demand much more exposed to changes in government and regulation than any other market and commodity, with potential drastic consequences. UK's Biodiversity Net Gain market is a textbook case of the regulatory risk of compliance markets on pseudo commodities.⁴

Revenues from the sale of biodiversity credits are also exposed to scandals similar to those that have plagued carbon offsets (see the Verra scandal⁵ and others), creating major **reputational risks** for corporate buyers and leading to large fluctuations in demand. Early scandals have already started to appear in the media regarding biodiversity credit projects.⁶

³ The same political dynamics exist in carbon markets and explain why voluntary carbon offset markets never raised significant funding despite decades of existence (2024 sales raised a mere \$1 billion). Annual auction revenues from cap-and-trade markets are higher; with EU's cap and trade market raising €43 billion in 2025, and €258 billion cumulatively since inception. It is important to point out however that cap and trade markets are very different mechanisms from biodiversity credits, as they include an annual declining cap on pollution, do not require any remedial action, whereas biodiversity credits do not include any cap on biodiversity destruction and require conservation and/or restoration outcomes, similar to offsets. It is also important to point out that the EU ETS did not bring any revenues at all during the first 8 years of its existence (2005-2013) and then saw very little revenues for the next 5 years. Sources: European Commission, What are ETS revenues used for?

[https://climate.ec.europa.eu/areas-action/carbon-markets/eu-emissions-trading-system-eu-ets/what-are-ets-revenues-used_en#:~:text=From%202013%20to%20the%20end%20of%202025,**%20**EU%20Emissions%20Trading%20System%20\(EU%20ETS\)**%20**auctions%20have%20raised%20over%20%E2%82%AC258%20billion%20in%20revenue](https://climate.ec.europa.eu/areas-action/carbon-markets/eu-emissions-trading-system-eu-ets/what-are-ets-revenues-used_en#:~:text=From%202013%20to%20the%20end%20of%202025,**%20**EU%20Emissions%20Trading%20System%20(EU%20ETS)**%20**auctions%20have%20raised%20over%20%E2%82%AC258%20billion%20in%20revenue)
European Environment Agency, Auctioning revenues and reported usage, (Billion EUR), 2013-2023, scope EU-27,
<https://www.eea.europa.eu/en/analysis/indicators/use-of-auctioning-revenues-generated-1765968581/auctioning-revenues-and-reported-usage>

⁴ See page bottom of page 3 and page 4 <https://greenfinanceobservatory.org/wp-content/uploads/2026/05/Indonesia-open-letter-biodiversity-credits-v2.pdf>

⁵ The Guardian, Revealed: more than 90% of rainforest carbon offsets by biggest certifier are worthless, analysis shows, 18/01/23, <https://www.theguardian.com/environment/2023/jan/18/revealed-forest-carbon-offsets-biggest-provider-worthless-verra-aoc>

⁶ Africa Uncensored, GreenFakes: How multinationals use 'greenwashing' launder ecocide, 17/02/25, <https://africauncensored.online/series/greenfakes/>

In addition, experience from carbon markets suggests that **biodiversity credit prices will likely be very volatile**, due in part to the allowance for secondary market trading aka speculation, and to the aforementioned regulatory risk. In turn, this would lead to highly fluctuating revenues for conservation. Yet, conservation and restoration policies require consistent funding, as stop-go protection could lead to irreversible losses.

3. MORE ROBUST FUNDING ALTERNATIVES

Reforming and shifting a fraction of existing harmful subsidies would entirely close the funding gap, without straining public finances. Globally existing annual harmful subsidies represent \$2600 trillion⁷, a multiple of the often quoted annual \$700 billion funding gap. In the case of Indonesia, Indonesia spent IDR 634,3 trillion (\$35,5 billion at today's exchange rate) on fossil fuel subsidies in 2024 (oil, gas, coal, and fossil-fuel-based electricity),⁸ to which you would need to add some of the fishing and fertilizer subsidies.⁹ These subsidies far exceed the \$4,35 billion funding for biodiversity that the government expects to get from biodiversity credit markets.

Reforming part of these subsidies would be a delicate political exercise, that would require a phased approach, better targeting and a gradual shift in public spending toward clean energy and social protection, according to the IISD. It would however offer much more realistic and stable revenues for conservation than biodiversity credit markets.

In addition, existing funding mechanisms such as the suboptimal implementation of Access and Benefit Sharing (ABS) through the Nagoya Protocol could be better implemented in the future.¹⁰

For all of the above reasons, we believe that **Global South countries should be wary of the overhyped future revenue promises of biodiversity credit markets**, and focus instead on more credible alternatives.

4. HOW CREDIBLE IS IT TO EXPECT CREDITS WITHOUT OFFSETS?

There are diverging views about whether governments should set up biodiversity credit or biodiversity offset national schemes.

Proponents of biodiversity credits that can't be used for offsetting claims know the well documented major environmental integrity issues of biodiversity offsetting¹¹ and still hope to raise private funding for conservation via credits. Proponents of offsets typically tend to focus on the hope that offsets might bring in more revenues, and tend to ignore environmental integrity concerns.

In the vast majority of cases, there will be no credits without offsets. This is because there is no alternative business case at scale other than offsetting. Indeed, why would corporations buy these credits, if not for offsetting claims?

Purchases related to Corporate Social Responsibility are typically too small to create a functioning market at scale.

⁷ Earth Track, Protecting Nature by Reforming Environmentally Harmful Subsidies: An Update, September 2024

<https://www.earthtrack.net/blog/environmentally-harmful-subsidies-update-26-trillion-year-and-continuing-threat-nature>

⁸ IISD, Indonesia spent IDR 713.5 trillion on energy subsidies in 2024, mostly for fossil fuels, press release, 09/02/26

<https://www.iisd.org/articles/press-release/indonesia-spent-idr-7135-trillion-energy-subsidies-2024-mostly-fossil-fuels>

⁹ Firdausi S; Supriyanto R; Alta A, Targeting efficiency: Reviewing Indonesia's fertilizer subsidy reform, Center for Indonesian Policy Studies (CIPS), Jakarta <https://www.econstore.eu/bitstream/10419/322207/1/1929234422.pdf>

¹⁰ US Department of Commerce, Indonesia Country Commercial Guide, <https://www.trade.gov/country-commercial-guides/indonesia-agriculture>

¹¹ The Jakarta Post, Between the commodification of nature and biocultural violence,

<https://www.thejakartapost.com/business/2026/08/07/between-the-commodification-of-nature-and-biocultural-violence>

¹¹ Spash, C.L. (2015). Bulldozing biodiversity: The economics of offsets and trading-in Nature. *Biological Conservation*, 192 (December): 541-551. <https://www.sciencedirect.com/science/article/abs/pii/S0006320715300446>

Some have claimed that private corporations could buy credits to **address their impacts and dependencies on nature**. Regarding impacts, it is claimed that companies could address residual adverse biodiversity impacts that remain in their value chain, after implementation of the mitigation hierarchy through the purchase of biodiversity credits. Addressing residual destruction through purchasing credits that fund conservation or restoration actions is arguably the very definition of compensation. As for companies purchasing biodiversity credits to address their dependencies on nature, such as fires and floods, supply chain disruptions, asset damage, raw material price spikes, and lower-valued or stranded assets, there is absolutely no need for tradable credits and markets for that purpose, companies could also far more simply directly hire project developers. Such local and specific use-cases would on the contrary go against the fungibility of credits.

As stated in a recent peer-reviewed article, another *“corporate motive for non-compensatory credits demand can be the desire to mitigate against future regulatory risks, i.e., forestalling, preparing for, or even shaping future environmental regulations (...) Purchasing credits might reduce their future regulatory risks. The voluntary purchase of credits shows evidence that firms are “doing good” for biodiversity, which may delay, mitigate, or even reduce future regulation.”*¹² Buying credits could indeed help companies with activities harmful to biodiversity keep their social licence to operate. Yet, such purchases would typically not be very large nor stable, as spending a lot of money on credits purchases would defeat their purpose, which is to save the company costs. Companies will typically be willing to spend on such goals only when they fear that there is a real and imminent risk of new regulation that would hurt their profits.

The main use currently being promoted for biodiversity credits is that of a nature positive contribution going beyond the mitigation hierarchy. This is for example the case of EU’s forthcoming nature credits: its roadmap¹³ explained that these credits are to be used to reward nature-positive action *“beyond individual legal obligations and the mandatory mitigation hierarchy.”* The mitigation hierarchy is defined in the same document as *“the EU’s mitigation hierarchy, legally enshrined in the Birds and Habitats Directives (Directive 2009/147/EC and Council Directive 92/43/EEC) but also in the EU guidance on integrating ecosystems and their services into decision-making, requires developers to avoid, minimise and only as a last resort compensate for residual effects.”* In other words, biodiversity credits are to be used for biodiversity net gain, once all adverse impacts have been avoided, minimised and the residual ones have been offset. As such, under this approach, **biodiversity credits are the next step after offsetting, thereby implicitly supporting and legitimizing offsetting.**

The lack of alternative use cases for biodiversity credits outside of offsetting is probably what led the IAPB, the largest lobby group promoting these markets to allow offsetting in its framework.

Last, there will likely be a **blurred line between credits and offsets in practice**. As stated in a recent article, *“biodiversity credits in these national or regional systems traded as offsets have existed for approximately 30 years (...) In practice, nothing thus hinders market actors to supply and use biodiversity credits to indirectly offset negative impacts in pursuit of claims of No Net Loss or Net Gain (...) In real-world settings some demand-side fungibility between credit types will exist (...), allowing buyers to choose among different credit types to meet their obligations or voluntary goals. First, effective avoidance, mitigation and restoration of project-scale biodiversity impacts is a goal few firms can fully achieve; residual impacts likely remain (TBC 2022; Maron et al. 2024). Alleged non-*

¹² Wunder, S., C. Fraccaroli, J. Bull, et al. 2025. “Biodiversity Credits: An Overview of the Current State, Future Opportunities, and Potential Pitfalls.” *Business Strategy and the Environment* 34, no. 7: 8470–8499. <https://doi.org/10.1002/bse.70018>.

¹³ EU Commission, Roadmap towards Nature Credits, 07/07/25, <https://eur-lex.europa.eu/legal-content/EN/TXT/PDF/?uri=CELEX:52025DC0374>

compensatory biodiversity credits could thus come to be used as de facto compensation for unaddressed losses under existing regulatory frameworks.”¹⁴

For all these reasons, we find that **promoting biodiversity credits with the hope that they won’t be used for offsetting is politically idealistic**. Once you open the door to biodiversity credits, the balance of political forces will most often ensure that credits are in the end allowed be used for offsetting, under the usual arguments of boosting demand, bringing more revenues etc.

¹⁴ Wunder, S., C. Fraccaroli, J. Bull, et al. 2025, *ibid*