

Principles for selecting nature metrics

A short guide to help financial institutions begin to measure nature

The challenge: growing nature exposures and opportunities, complex metrics

Nature-related risks, such as water stress, deforestation, and biodiversity loss, are increasingly material for financial institutions. These risks affect commodity supply chains, infrastructure resilience, real estate valuations, and insurance pricing. At the same time, nature-related opportunities, such as labelled products (e.g. ESG funds, green bonds), carbon and biodiversity credit markets, and nature-based solutions are emerging as potentially significant new lines of business.

To manage their nature-related risks at the project and portfolio levels, and identify the opportunities for nature-linked products, requires financial institutions to measure the appropriate nature metrics. However, unlike climate finance, which benefits from the widely adopted ‘financed emissions’ metric, there is as yet no equivalent measure for nature.

Instead, financial institutions face a patchwork of ESG ratings, voluntary disclosures, and emerging frameworks. These sources lack the granularity and consistency needed for robust decision-making, risk management, or opportunity identification. At the same time, frameworks like the Taskforce for Nature-related Financial Disclosures (TNFD) and the Corporate Sustainability Reporting Directive (CSRD) are introducing new expectations and guidance, leaving many financial institutions struggling to integrate the latest nature-related metrics and measurements into existing operational and data systems. The complexity can be paralysing.

It is within this wider context that we seek to provide some clarity to the question: how might financial institutions select nature-related metrics?

Align metrics with use cases

Before selecting specific metrics, financial institutions can begin by defining their strategic purpose for measuring nature and specific use cases. Metrics are only useful if they serve a clear purpose in decision-making. Different objectives call for different metrics, with different characteristics, degrees of granularity and accuracy. Even within a single institution, different teams may use nature metrics differently, based on their function or asset class. It is therefore important to have clarity about the metric's required characteristics and thresholds for it to enable decision-making.

Typical use cases for measuring nature include:

- **Measuring and managing nature-related dependencies, impacts, risks and opportunities (DIRO)**, e.g., TNFD-type assessments
- **Monitoring sector progress over time**, for transition and green finance (e.g., KPI-linked loans, sustainability-linked bonds)
- **Attributing finance to a nature claim**, including labelled products (e.g., green or ESG funds), and location-based project finance (e.g., infrastructure, natural capital).

All metrics need to serve their intended use cases in terms of design and data needs and contribute to the institutions' wider strategic objectives (see figure below).



Positioning metrics within the bigger picture helps identify the most appropriate metrics, as well as enabling target-setting and monitoring of progress.

As an example of a use case of attributing finance to a nature claim, [FinDev Canada](#) will publish a short guide later this year, supported by TBC, entitled *Scaling Nature Finance: Practical Insights for DFIs and Investors*.



Types of metrics to measure

Nature-related metrics fall into three broad categories:

Metric type	What it measures	Examples
Pressure	Environmental pressures caused by activities	Water withdrawal, land conversion
Response	Actions taken to reduce nature risks	Traceability systems, deforestation pledges, water policies
Outcome/state of nature	Actual ecological results	Habitat recovery, improved water quality

These categories of metrics have different levels of detail and specificity, with response metrics tending to be less complex than pressure and outcome metrics. Similarly, they tend to serve different levels of risk management.



Level of risk management	Negative screen	Positive screen	Nature positive
	exclusion list	response metric	pressure and state of nature metrics
Portfolio level - risk management			
Product level - labelled products	Avoidance of and reduction of portfolio exposure to high-risk sectors, assets, locations	Verification of ESG and nature-related activities, responses, claims	
Project/asset level - project finance			Investments into nature positive – reduce pressure on nature or restore state of nature

For each objective, decide what the most appropriate metric is, what the right target is and how to track progress.



In practice, detailed pressure metrics are only meaningful if tailored to industry sector and asset location. Unlike carbon emissions, which are fungible (i.e. one tonne of reduced carbon emissions has the same impact regardless of location or method), **nature impacts and dependencies vary from place to place** (i.e., they are non-fungible), and pressure and outcome metrics will need to include the specific context of where they are applied.

Financial institutions are also usually at least one level removed from direct impacts on nature, typically acting as a lender to or shareholder in portfolio companies. These levels of impact can be thought of in a similar manner to scopes 1, 2 and 3 for carbon emissions (which relate respectively to direct emissions impacts, indirect emissions from power or heat, and supply chain or financed emissions), but they nevertheless introduce further complexity to measuring nature.

Navigating this complexity is difficult. However, a helpful rule is to **start simple**. Identifying, collecting, and reporting nature-related metrics is an emerging field and it will be a multi-year journey for most financial institutions.

The first step on the journey is to define the most important impact pathways – a logical framework that connects commercial activities with likely impacts and pressures on nature. This grounds the basket of metrics to choose from to the specific context that the institution is in. From here, financial institutions can consider the appropriate types of metrics and the associated suite of measurements appropriate to its level of maturity.



Key principles for selecting nature metrics

Once impact pathways have been defined, the possible nature metrics along those impact pathways can now be identified. But how should financial institutions select the most appropriate ones to measure?

For that, we have outlined simple tests for three key principles, each with its own set of guiding questions:

Test 1

Relevant and material?	Metric
Is it relevant and useful for the decisions you are looking to make (e.g., lending, screening)?	
Is it aligned with regulatory frameworks (e.g., CSRD)?	
Does it support forward-looking transition planning?	
Does it cover a material % of portfolio?	
Will it be useful in estimating a financial risk or opportunity?	



Test 2

Practical?	Metric
Is the data available or estimable ?	
Is it cost-effective to collect?	
Is it comparable across companies or sectors?	
Can it scale as your portfolio grows?	

Test 3

Credible?	Metric
Does it meet good data principles (e.g., ISO 8000, IASB)?	
Does it meet the requirements of Solvency II?	

Grading proposed metrics against these questions (e.g., ‘Yes’, ‘To some extent’, ‘No’) can provide a quick way to make a qualitative assessment of the suitability of that metric. Although these tests do not offer hard and fast rules, they provide a helpful framing for selecting nature metrics to meet the needs of the organisation.



From principles to practice: a structured approach

Nature-related metrics are complex, and the field is evolving, but financial institutions do not need to wait for perfect data to get started. By applying clear principles and aligning metrics with their objectives, they can build flexible, decision-useful frameworks that grow with their organisations' needs.

At The Biodiversity Consultancy, we suggest a four-step approach to measuring nature:

- 1. Build use cases and impact pathways:** define how commercial activities are dependent upon and impact or pressure nature.
- 2. Determine the scope of the approach to nature assessment:** consider the objectives and practicalities to assess nature-related metrics.
- 3. Review the suite of metrics and fill any gaps:** compare metrics along the impact pathway to the existing suite of metrics.
- 4. Collect and use data:** establish processes for gaining useful insights and informing actionable responses.

As discussed, the first step in establishing a robust set of metrics is to define the likely impact pathway. This allows for further steps of identifying the right metrics to measure, selecting approaches for monitoring and analysing the data, and taking any recommended actions needed to reduce nature impacts and dependencies.

At The Biodiversity Consultancy, we support financial institutions through this process, acting as a partner on their journeys to nature positive. We are technical experts on nature and biodiversity, with extensive experience helping to draw up industry standards, and in advising financial institutions on measuring and managing their nature-related risks and opportunities.

For further thoughts on how to start, see our paper [Measuring nature: how financial institutions can get started](#).

Contact the team

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