

Target setting
Biodiversity



Responsible investments and biodiversity

Threats and opportunities related to global biodiversity are important for DNB Asset Management (DNB AM), and we have had biodiversity as a focus area within responsible investments for several years. In pursuit of the achievement of the UN SDGs, those with direct relevance for biodiversity include SDG 14 (Life Below Water), SDG 15 (Life on Land), and SDG 13 (Climate Action). It has been suggested that biodiversity also underpins the delivery of more than 80 per cent of the SDGs in total.¹ For DNB AM, the starting point is the DNB Group's Instruction for Responsible Investments when considering sustainable investment practices related to biodiversity.²

Our responsible investment approach utilises tools including standard setting, exclusions, active ownership, and ESG integration in portfolio management. Our expectations to companies call for a high level of transparency around how they identify, assess, and manage their exposure to biodiversity risks and opportunities – both for the company and its value chain. To clarify our expectations, DNB AM has published a series of expectations documents. Most relevant for nature and biodiversity issues are those on biodiversity, oceans, climate change, sustainable food systems, water, and serious environmental harm.³

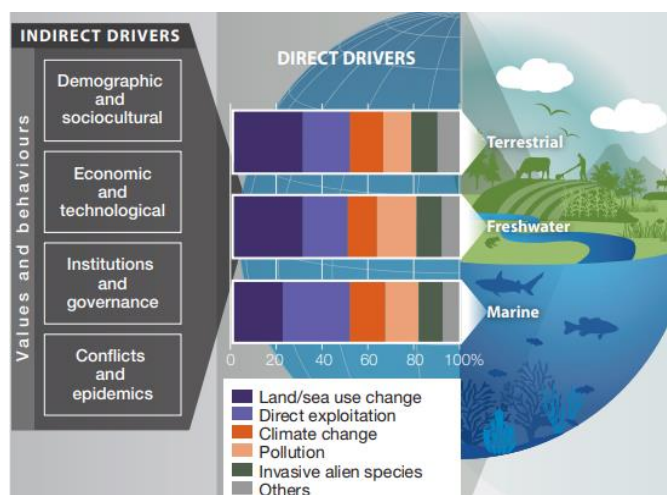
The Finance for Biodiversity Pledge and target setting for DNB AM



In 2021, DNB AM signed the Finance for Biodiversity Pledge, committing to five action points including setting biodiversity targets for our investment activities before the end of 2024.⁴ In our target setting work, the efforts of the Finance for Biodiversity Foundation (Biodiversity Foundation) have been highly valuable, and their frameworks align well with the TNFD (Taskforce on Nature-related Financial Disclosures) as well as with the EU CSRD (Corporate Sustainability Reporting Directive, specifically ESRS E2-5). On a fundamental level, the CBD-GBF (Kunming-Montreal Global Biodiversity Framework)⁵ as well as the UN panels on nature (IPBES), climate (IPCC), and resources (IRP) are important sources of information in our work.

The challenges of the loss of nature (biodiversity) and climate changes are intertwined, which is reflected in the studies from IPBES⁶, pointing out the five main drivers for biodiversity loss (see below). These five drivers form an important basis for setting DNB AMs biodiversity targets and our related engagement activities.

Drivers for biodiversity loss



Source: IPBES.

Viewed from another angle, the world's ever increasing material footprint is a major cause of biodiversity and climate challenges, well described by IRP in their flagship report Global Resources Outlook 2024 (see the

¹ <https://www.unpri.org/download?ac=11357>

² https://s3.eu-north-1.amazonaws.com/dnb-asset-management/231208_Responsible-investment-Group-Instruction.pdf

³ <https://dnbam.com/en/responsible-investments/guidelines-and-exclusions>

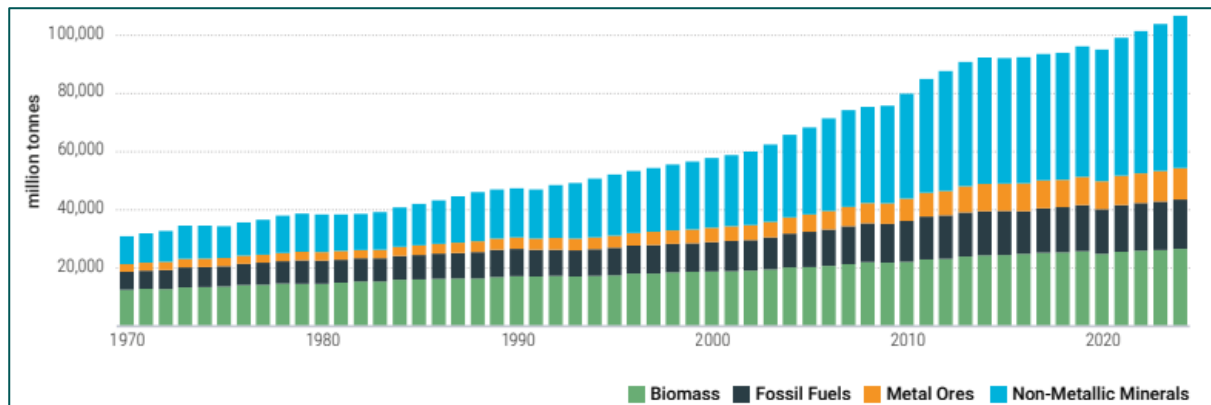
⁴ <https://www.financeforbiodiversity.org/about-the-pledge/>

⁵ <https://www.cbd.int/doc/decisions/cop-15/cop-15-dec-04-en.pdf>

⁶ <https://ipbes.net/global-assessment>

figure below).⁷ Consequently, we are mindful that we also need to orient our targets and engagements with companies towards encouraging solutions that entail moving from a linear economy to a circular economy.

Global material extraction, four main material categories



Source: IRP.

The scope of DNB AMs biodiversity target setting

DNB AM intends to cover all asset classes and all sectors in our work with biodiversity issues. However, the focus for our biodiversity target setting will be threefold. In the assessment, all sectors/industries will be included, but in engagements, we will prioritise industries (GICS level 3) with the highest biodiversity impact or with the highest biodiversity dependency. Here we will use the industries highlighted by the Finance for Biodiversity Foundation as a basis (see below).⁸ For the investment universe, defined as the equity index MSCI World, these industries cover around one quarter of the market cap.

Priority industries for biodiversity impact

Absolute impact ranking	Industry (GICS level 3)	Absolute impact score	Impact intensity score	Impact climate change	Impact pollution	Impact land use	Impact water use
1	Food Products	100	100	7%	12%	68%	13%
2	Oil, Gas & Consumable Fuels	88	40	54%	23%	12%	11%
3	Chemicals	33	59	11%	46%	14%	29%
4	Consumer Staples, Distr. & Retail	32	12	23%	18%	53%	5%
5	Metals & Mining	25	28	35%	48%	9%	8%
6	Electric Utilities	22	17	59%	31%	6%	4%
7	Trading Comp. & Distributors	18	6	22%	55%	14%	9%
8	Pharmaceuticals	18	25	5%	75%	12%	8%
9	Beverages	13	23	9%	13%	52%	26%
10	Hotels, Restaurants & Leisure	12	22	16%	10%	66%	8%

Source: The Finance for Biodiversity Foundation.

Priority industries for biodiversity dependencies

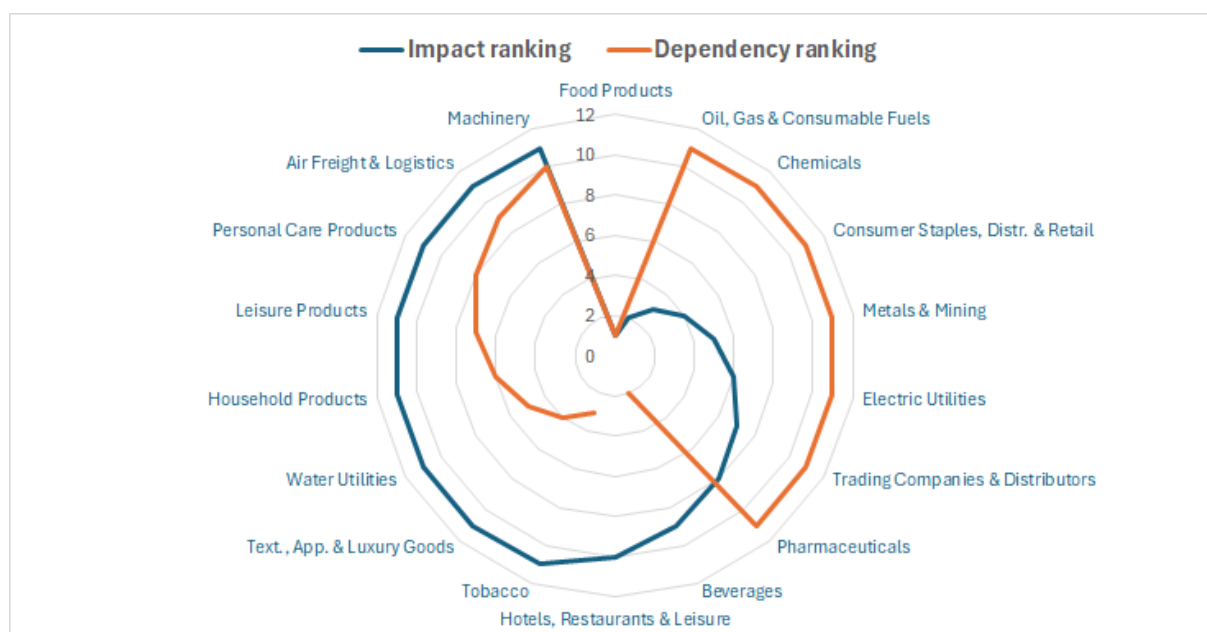
Depend. ranking	Industry (GICS level 3)	Average dependency score	1 st main ecosystem dependency	2 nd main ecosystem dependency
1	Food Products	100	Ground and Surface water	Flood and storm protection
2	Beverages	85	Ground and Surface water	Water flow maintenance
3	Tobacco	73	Ground and Surface water	Mass stabil. and eros. control
4	Text., App. & Luxury Goods	71	Ground and Surface water	Water flow maintenance
5	Water Utilities	70	Ground and Surface water	Water flow maintenance
6	Household Products	66	Ground and Surface water	Mass stabil. and eros. control
7	Leisure Products	65	Ground and Surface water	Water flow maintenance
8	Personal Care Products	64	Ground and Surface water	Water flow maintenance
9	Air Freight & Logistics	64	Ground and Surface water	Flood and storm protection
10	Machinery	64	Ground and Surface water	Flood and storm protection

Source: The Finance for Biodiversity Foundation.

⁷ <https://www.resourcepanel.org/reports/global-resources-outlook-2024>

⁸ https://www.financeforbiodiversity.org/wp-content/uploads/FfBF_multitool_report_final_021024.pdf

Combined ranking of industries for biodiversity impact/dependencies



Source: The Finance for Biodiversity Foundation. Note that if the industry is not among top ten in ranking, it is assigned the rank 11.

Second, several other criteria including significant/very significant controversies related to biodiversity will also be used to identify the most relevant engagement targets. In addition, the companies potentially contributing the most to species extinction, measured by PDF (Potential Disappeared Fraction of Species), will also be a priority in the engagement efforts.⁹ These data points can be seen as a proxy for substantial potential negative effect, and data from MSCI ESG will be used as a starting point.

Lastly, ownership will be leveraged to achieve impact in engagements. One can typically have a greater degree of influence through significant level of ownership, individually or collectively (through collaborative investor initiatives). Therefore, large ownership by DNB AM or major investor engagement initiatives (such as Nature Action 100 or FAIRR) will be the third angle for structuring the biodiversity engagement process.

The DNB AMs biodiversity targets

DNB AM has decided on a set of targets for our work with biodiversity, outlined in the table below. We will report on the progress annually and the associated reports will be available on our website.¹⁰

Target	Scope	Deadline	Status
1. Assess and quantify biodiversity impacts and dependencies	All managed equity funds	Assessment included in this report. Next annual reporting by the end of 2025	Initial assessment done
2. Engage companies in the most material industries (impact and dependencies)	All managed equity funds	End 2027: Engaged at least 40% of AUM in the most material industries. End 2030: Engaged at least 50% of AUM in the most material industries	Engaged 21% of AUM (counted from 2021)*
3. Provide education in biodiversity topics for all employees in DNB AM	All employees	End 2024	Completed
4. Aim to set targets for AUM in companies with biodiversity related commitments (including science-based targets for nature)	To be decided	To be decided	Under review

*We have conducted relevant engagements before 2021 as well, but for consistency the starting point is 2021.

⁹ PDF (Potential Disappeared Fraction of Species) indicates the potential contribution to global species extinction due to pressures which may be caused by a company, activity, or asset. The PDF values are scaled, e.g. 1000 indicates a company's potential contribution to the extinction of 1000 species (out of 100 million) in 100 years. ©2024 MSCI ESG Research LLC. Reproduced by permission.

¹⁰ <https://dnbam.com/en/responsible-investments/reporting>

Target 1

Assess and quantify biodiversity impacts and dependencies

DNB AM has already published a TNFD "light" report (for the year 2023), analysing our equity funds.¹¹ We mapped exposure to a defined set of high-risk industries for nature using the GICS-codes provided by TNFD. We also mapped exposure to companies with activities in sensitive locations (direct operations) using a similar methodology as for SFDR - PAI 7, and then combined the mapping with relevant data on controversies. About 1/3 of the holdings were either in high-risk industries or exposed to biodiversity sensitive areas. Combining with controversy data, 1 per cent of total holdings were identified, adding large ownership as a criterium increased the list to per cent (see below). This analysis has been used to prioritise engagements in 2024.

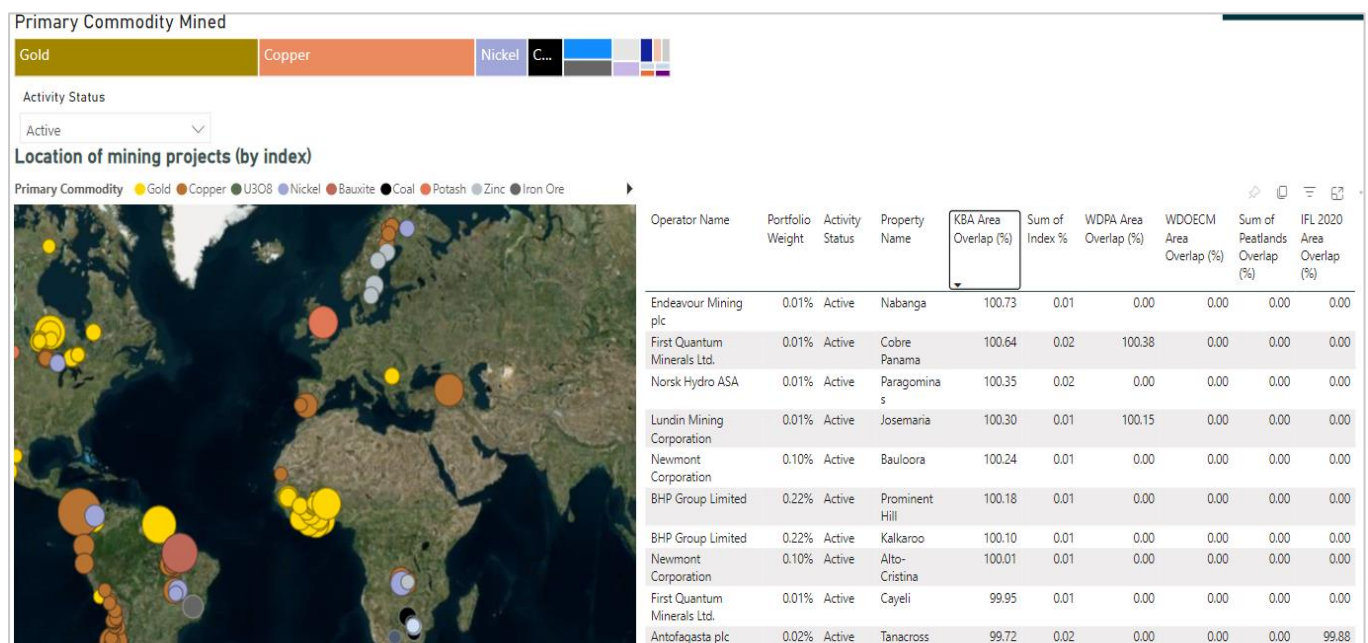
2023 assessment of equity funds managed by DNB AM

	Number	Share
All industries	2 686	100%
High-risk industries/biodiversity sensitive areas combined with very severe/severe controversies	26	1%
The above plus added minimum 1% ownership	70	3%

Source: DNB AM internal portfolio management system WorldPort and MSCI ESG Research.
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In the last years, we have also analysed and engaged DNB AMs holdings for several other relevant factors including deforestation, high-risk commodities, food systems, arctic oil & gas exposure, water risk, recycling of ships, mining tailings, offshore windmills, and deep-sea mining. Further, location-based data is important, for example when assessing deforestation. Rainforest Foundation Norway and WWF earlier this year, provided a valuable dataset on extractive industries and forest risk (see the report "Forest Risk Extractives: A Geo-Spatial Analysis")¹². Based on this dataset, we have built an internal tool to analyse and visualize holdings in DNB AM funds (see the screenshot below). We have also incorporated other location-based data in our internal tools including exposure to biodiversity sensitive areas.

Internal tool to analyse forest risks in mining and oil & gas



Source: DNB AM internal tool (Power BI), Rainforest Foundation Norway and WWF.

¹¹ <https://s3.eu-north-1.amazonaws.com/dnb-asset-management/Annual-Semiannual-reports/DNB-AM-Annual-Report-on-Responsible-Investments-2023.pdf>

¹² https://dv719tqmsuwvb.cloudfront.net/documents/High_risk_extractive_assets_forests_final_compressed-1.pdf

We have now reassessed DNB AM's equity portfolios using the most material industries for biodiversity, expanding the coverage to cover the "top 10" industries for both impact and dependencies. Furthermore, we have quantified individual company's biodiversity footprint using the metrics PDF (Potentially Disappeared Fraction of Species)¹³ and MSA (Mean Species Abundance)¹⁴ with data provided by MSCI ESG. This provides two uniform overall metrics useful for comparison across companies. However, there are limitations to their use, including not covering all aspects of biodiversity, lacking coverage of the whole value chain, and heavy reliance on modelled data. The findings are summarised in the table below. In the next version of this report, to be released by the end of 2025, the assessment part will be further expanded.

Metric	
Companies in equity funds managed by DNB AM	2 581 (100%)
Companies in the most material sectors for biodiversity impacts and dependencies	768 (30%)
Companies with operations in biodiversity-sensitive areas	987 (38%)
Companies with very severe/severe controversies linked to operations and ecosystems	9 (0.3%)
Companies with potential direct contribution to deforestation	74 (3%)
Top 30 companies on the score for PDF	30 (1%)
Companies that meet at least one of the five criteria above	1 378 (53%)
Asset under mgmt. (% AUM) engaged in the most mat. sectors for biodiversity impacts and depen.	21%
Average/median score for PDF for all companies	1 246/84
Average/median score for PDF-intensity for all companies	0.095/0.011
Average/median score for PDF for the comp. in the most material sectors for biodiversity impacts and depen.	2 612/369
Av./median score for PDF-intensity for the comp. in the most mat. sect. for biodiversity impacts and depen.	0.158/0.044
Average/median score for MSA.km2 for all companies	93/0.15
Average/med. score for MSA.km2 for the comp. in the most mat. sectors for biodiversity impacts and depen.	175/0.34

Source: DNB AM and MSCI ESG Research, Figures are omitted from calculations when no data. Average/median-numbers are not AUM-weighted. For PDF and MSA, intensity figures are normalized by sales (in million USD). ©2024 MSCI ESG Research LLC. Reproduced by permission.

A key takeaway is that 30 per cent of the companies in the equity funds managed by DNB AM are in scope for engagement based on the most material sectors for biodiversity impacts and dependencies. Adding additional five criteria (listed in the table above), expand the potential scope to 53 per cent of DNB AM holdings (by count).

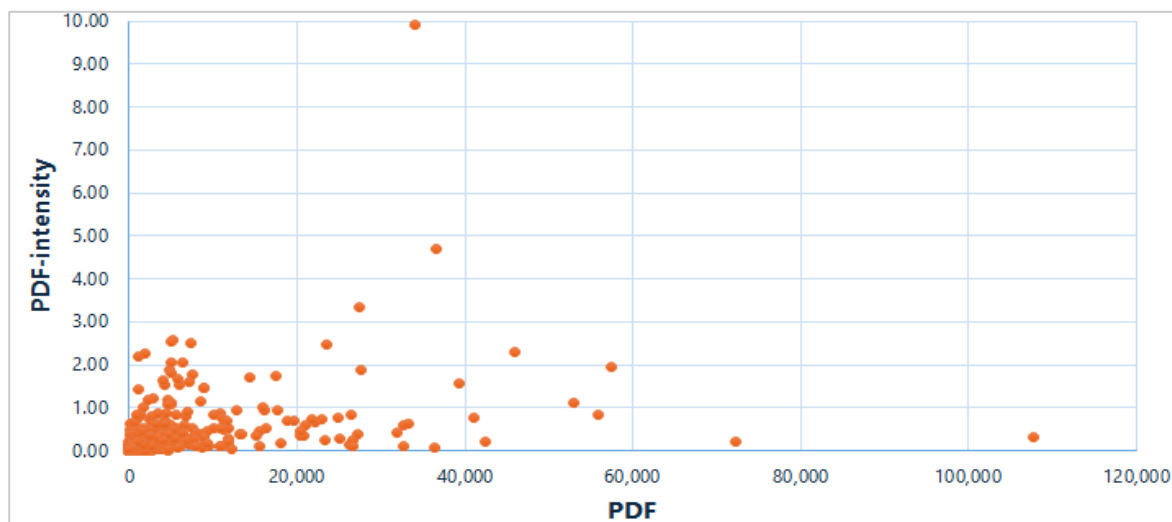
Furthermore, quantifying the impact by using the PDF metric, yields an average of 1 246 and a median of 84 (see footnote 9 for interpretation). As expected, the median PDF is much higher for companies in the most material sectors, and for this subset is more than four times the median of all companies (same picture using the MSA). Moreover, there is a wide range in the distribution of PDF, as visualised in the graph below. The outliers will receive special attention.

Another observation is that PDF and MSA measures similar aspects of impact, but the scoring varies significantly on the company level. This underscores the challenges in finding one good metric for impacts to use across the investment universe, and the importance of multiple angles of assessment.

¹³ PDF, see footnote 8 for more details.

¹⁴ MSA (Mean Species Abundance) measures the abundance of species relative to their abundance in an undisturbed ecosystem and understands any reduction through six drivers including climate change, land use, fragmentation, hunting, nitrogen deposition, and road disturbance (scale 0-1). MSA.km2 is measured as 1 minus MSA multiplied by the spatial footprint in in km2. ©2024 MSCI ESG Research LLC. Reproduced by permission

Distribution of PDF (absolute and intensity) in the companies in equity funds managed by DNB AM



Source: DNB AM and MSCI ESG Research. ©2024 MSCI ESG Research LLC. Reproduced by permission.

Zooming in on the deforestation risk, this is partly covered by focusing on material sectors for biodiversity impact and dependencies. A more direct metric is “companies with potential direct contribution to deforestation”, largely overlapping with the most material sectors, but increasing the number of relevant companies by sixteen. Deforestation is further covered by using location-specific data, on biodiversity sensitive areas as well as more granular data such as various protection designations, peatlands, and intact forest landscape. Finally, we believe it is important that the data driven assessment of deforestation, and biodiversity in general, is complemented with company dialogue for fact checking, further insight, and engagement.

Target 2

Engage companies in the most material sectors in equity portfolios

The assessment above will help informing engagements. In the engagement statistics, we have included relevant biodiversity engagements starting in 2021. In addition to the DNB AMs individual engagements, we participate in various collaborative engagements including Nature Action 100 and FAIRR.^{15 16} We only count collaborative engagements where DNB AM directly participate in engagement meetings. Furthermore, for all engagements, engagement goals are defined, and progress is tracked using milestones. Engagement goals are tied to best practice for handling biodiversity risks and opportunities such as defining science-based targets for nature, strong alignment with the TNFD framework, and having high quality biodiversity related policies and practices. As of December 2024, we have engaged 21 per cent of AUM in the most material sectors. The target is 40 per cent by 2027 and 50 per cent by 2030.

Target 3

Provide education in biodiversity topics for all employees in DNB AM

All employees in DNB AM are required to obtain a specific sustainability certification by the end of 2024, which includes biodiversity topics. Learning material has been provided to all in DNB AM.

Target 4

Aim to set targets for AUM in companies with biodiversity related commitments

We have not yet decided how to formulate this target for commitments of companies invested in. Some challenges are the lack of global consensus on relevant commitments as well as the level of maturity of several frameworks. One possible avenue is to set targets for AUM related to science-based targets for nature, similar to the targets on the climate side for DNB AM - embedded in the DNB group's transition

¹⁵ <https://www.natureaction100.org/>

¹⁶ <https://www.fairr.org/>

plan.¹⁷ One leading contender is the SBTN, focusing on nature targets.¹⁸ On biodiversity, SBTN states that while they currently do not have biodiversity-specific targets, their approach inherently supports biodiversity through comprehensive environmental impact management (see the cut-out below). The SBTN framework is expected to be more complete in 2025. Another possibility is to orient the commitment target towards alignment with the TNFD (or similar such as ESRS E4). We expect to have more clarity in how to formulate DNB AMs targets in this area in the coming years.

SBTN and biodiversity considerations

Biodiversity considerations are integrated throughout our technical guidance.

Biodiversity considerations are incorporated in the initial steps of target-setting through the environmental impact assessment, including the prioritization of sites for target-setting that are critically important for biodiversity and for mitigating biodiversity loss. This knowledge then guides the application of the freshwater and land targets (in Step 3) that focus on ecosystem-scale protection for biodiversity. The forthcoming ocean targets will address additional pressures on biodiversity, including overexploitation from fishing, the protection of endangered and threatened marine species, and the protection of marine habitats.

Therefore, while we currently do not have biodiversity-specific targets, our approach inherently supports biodiversity through comprehensive environmental impact management.

Source: SBTN.

In summary, we believe that the DNB AM biodiversity targets are aligned with the intentions in the CBD-GBF (Global Biodiversity Framework) of reversing nature loss and ensure ecosystem resilience. We will focus on our set targets in the years to come and report annually on our progress.

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¹⁷ https://www.dnb.no/portalfont/nedlast/no/om-oss/samfunnsansvar/231016_DNB_Transisjonsplan_digital_eng.pdf

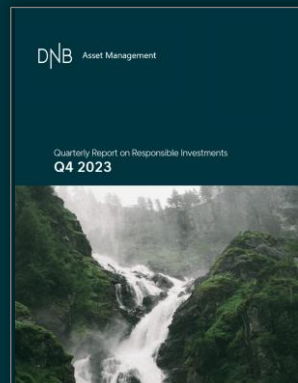
¹⁸ <https://sciencebasedtargetsnetwork.org/companies/take-action/>

Other relevant reports from DNB AM

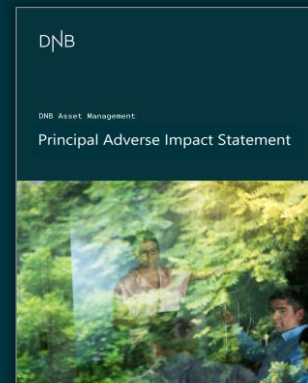
See our website <https://dnbam.com/en/responsible-investments/reporting> for a full and updated list of our reporting on sustainability topics.



DNB AM Report for Responsible Investments 2023



DNB AM Quarterly Reports for Responsible Investments



Principle Adverse Impact (PAI) Statement



DNB Renewable Energy Report on Potential Avoided Emissions 2022



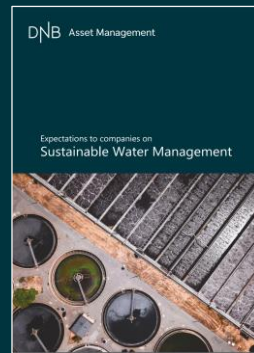
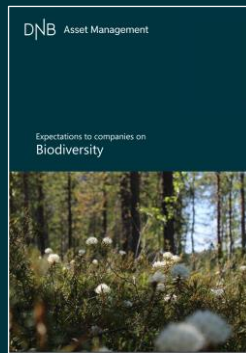
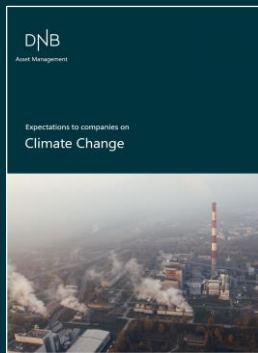
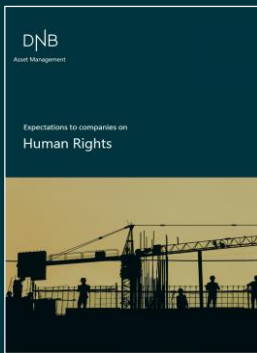
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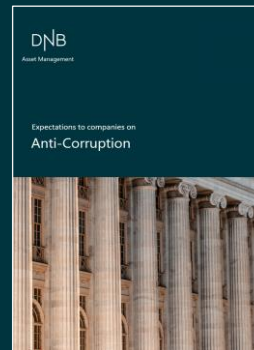
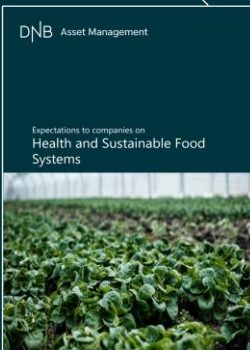
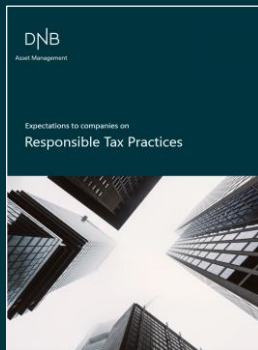
Norwegian Transparency Act Disclosure 2023

Expectation documents

See our website <https://dnbam.com/en/responsible-investments/guidelines-and-exclusions> for a full list and updated versions of our expectations to companies on a wide range of topics.



New



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