

Governance and reporting of climate change risks

Storebrand Asset Management

December 2022

Introduction

This paper is based on a response to a UK government consultation, in relation to the governance and reporting of climate change risks in the UK Local Government Pension Scheme (LGPS), submitted by Storebrand Asset Management (SAM) in November 2022. SAM is the largest private asset manager in Norway and our sole business is asset management, providing a broad range of investment services to over 300 institutional clients and manages approximately £84.1 billion as at 30 September 2022. SAM was the first Norwegian company to establish a sustainable investment department in 1995 and we have one of the most experienced environmental, social and governance (ESG) teams in the Nordic region.

Storebrand Asset Management manages £814m in assets on behalf of the UK Local Government Pension Scheme, in products designed to minimise climate-related investment risk in both global and emerging markets equities. We have engaged closely with the LGPS on climate risk management, reporting and our product offering. We believe that our experience in this area may be of wider interest to SAM clients in other jurisdictions and welcome engagement on this topic.

Governance and reporting of climate change risk is an important consideration for fiduciaries and investors around the globe. Yet, it is an area in which there is constant change due to rapid improvements in data, policy and our understanding of climate change. We firmly believe there is no simple answer, or single correct path, to managing and reporting climate change risks. Although regulation is an important driver of investor awareness and engagement in this area, we see a need for ongoing development and some flexibility in how investors respond to these issues. We need to do the best we can with imperfect, but rapidly improving, data and to learn as we go – but it is crucial that we are guided by the best available science and by climate change experts with an ability to interpret the science and the data and respond accordingly.

At SAM, our flagship, climate-aware equity product range (the "Plus Funds") contains both Global Equities and regional strategies in Emerging Markets, Swedish Equities and European Equities. It is designed and led by a climate change specialist portfolio manager and managed by a team with a proven ability to successfully combine portfolio construction expertise with sustainability data and insights. The same team has been managing the range since the launch of the first, global equity, vehicle in 2016. Our UK LGPS clients are invested in the Global and Emerging Markets strategies within the Plus Funds range.

The Plus Funds are market leading and designed to evolve with ever improving climate science, policy and data. This means they are at the forefront of the SAM offering on climate risk minimisation and reflect our best ideas in this area. For this reason, this paper is focused on the way we manage and report on climate change risks in the SAM Plus Fund range, specifically. Some of the ideas we present in this paper may be trickier to implement in other markets and asset classes but we welcome discussion and debate in those areas and aim to promote best practice.

Scenario Analysis

Regulatory Proposal: AAs (Administering Authorities of the UK LGPS - changed throughout this document to 'Schemes' for simplicity) will be required to carry out two sets of scenario analysis. This must involve an assessment of their investment and funding strategies. One scenario must be Paris-aligned (meaning it assumes a 1.5 to 2 degree temperature rise above pre-industrial levels) and one scenario will be at the choice of the Scheme. Scenario analysis must be conducted at least once in each valuation period.

SAM Response: The statutory guidance will need to be more specific about what the regulator means by 'Paris-aligned' if scenario analysis is to offer meaningful risk assessment or comparability across the LGPS. The consultation document conflates 'net zero' with 'Paris alignment' as well as referencing the "1.5 to 2 degree" temperature goal as the definition of Paris alignment. There are many published scenarios that claim to achieve net zero or a 1.5 or 2 degree temperature goal that are not 'Paris aligned'. Scenario analysis is easy to manipulate and to misinterpret or miscommunicate.

In terms of a temperature target, Article 2.1.a of the Paris Agreement stipulates, "*holding the increase in the global average temperature to well below 2 °C above preindustrial levels and pursuing efforts to limit the temperature increase to 1.5°C*", while Article 4.1 requires net zero emissions in this century¹. However, the proposed pathway/scenario to achieving these goals can vary widely and have a huge impact on, for example, fairness, equality and the ability to achieve the Sustainable Development Goals.

The IPCC assessed the climate outcomes of over 400 pathways in its Special Report on 1.5°C in 2018 (SR15) but did not determine which were "Paris-aligned"². Subsequently a great deal of work has gone into initiatives by academics, industry bodies such as the Institutional Investors Group on Climate Change (IIGCC) and benchmarking authorities, such as Science Based Targets initiative (SBTi) to identify "Paris-aligned scenarios" and credible approaches to net zero investing. As noted by SBTi, "*scenarios that achieve the same long-term temperature goal (LTTG) may vary enormously in terms of energy and land use requirements, technology deployment, and temperature overshoot; with critical implications for risk of failing to limit warming, sustainability (including, but not limited to food and water security), regional impacts, and economic development*".³

One of the challenges for investor application of "Paris aligned" or "net zero" scenarios has been the availability of granular, sector specific pathways that can be applied to portfolios. A recent study⁴ compared institutional decarbonisation scenarios, from the International Energy Agency (IEA) and Shell among others, to scenarios from Integrated Assessment Models (IAMs) to determine their climate outcomes. The study found that emissions levels of all institutional scenarios, except for the IEA NZE 2050, lie outside the range of low-overshoot pathways for 1.5°C - and the Shell Sky 1.5°C scenario even lies outside the interquartile range of the high-overshoot pathway with huge reliance on land-based Carbon Dioxide Removal (CDR). Further they highlight that these published institutional pathways provide important inputs for policymakers and investors but can "*provide a misleading view*

¹ Nature <https://www.nature.com/articles/s41467-022-31734-1>

² IPCC Special Report: Global Warming of 1.5°C

³ https://sciencebasedtargets.org/resources/legacy/2020/08/OG-Whitepaper_-_Analysis-and-Translation-of-Global-Scenarios-to-Inform-Paris-Aligned-Pathways-for-the-Energy-System.pdf

⁴ <https://www.nature.com/articles/s41467-022-31734-1>

of the transformations needed for reducing GHG emissions both in the near-term and the long-term", particularly in over-reliance on fossil fuels compared with IAMs.

We think this is relevant to investors for two reasons:

- First, it is important to recognise this performative nature of scenario adoption. The chosen pathway is more important than the end-goal as any delay to immediate emissions reductions will make it increasingly difficult, and ultimately impossible, for the Paris climate targets to be achieved.
- It is also a crucial finding for representations of investment risk and ongoing exposure to fossil fuel expansion and stranded assets. Both the IEA NZE 2050⁵ and the recently published UN HLEG report on the net zero commitments of non-state entities⁶ are clear that there is no place for ongoing investment in fossil fuel expansion in a 1.5°C aligned, net zero future. However, the majority of available institutional scenarios over-state fossil fuel projections when compared with Paris Aligned scenarios from the scientific community.

The consultation document⁷ states that the LGPS can play a part in increasing data availability and quality through the data quality metrics. **We would suggest that the LGPS could also play a part by collectively eschewing institutional scenarios that the scientific community does not find to be credible** and by focusing on scientifically credible, independent advice and evidence when it comes to scenario analysis and Paris Alignment. Further, a more robust public stance from the LGPS on its position on fossil fuel expansion and how that fits with any climate risk or indeed 'net zero/Paris alignment' targets would be welcomed by stakeholders.

Finally, recent research published by the Financial Sustainability Board (FSB) and Network for Greening the Financial System (NGFS) urges caution on the use of current climate scenario analysis, noting that "*measures of exposure and vulnerability are likely understated. Many exercises do not capture second-round effects, potential non-linearities in climate-related risks, and other potentially large sources of risk, such as those stemming from an abrupt correction in asset prices when transition shocks result in fire sales of assets in exposed sectors*". **The statutory guidance to the LGPS should include advice about the appropriate use and function of climate scenarios in recognition of the risks associated with using fallacious Paris Aligned scenarios and the potential for understating risks.**

⁵ [Net Zero by 2050 – Analysis - IEA](#)

⁶ [high-level_expert_group_n7b.pdf \(un.org\)](#)

⁷ <https://www.gov.uk/government/consultations/local-government-pension-scheme-england-and-wales-governance-and-reporting-of-climate-change-risks/local-government-pension-scheme-england-and-wales-governance-and-reporting-of-climate-change-risks>

⁸ <https://www.fsb.org/2022/11/current-climate-scenario-analysis-exercises-may-understate-climate-exposures-and-vulnerabilities-warn-fsb-and-ngfs/>

Risk Management

Regulatory Proposal: *Schemes will be expected to establish and maintain a process to identify and manage climate-related risks and opportunities related to their assets. They will have to integrate this process into their overall risk management process.*

SAM Response: We agree that climate-related risks are financially material risks that should be incorporated into the overall risk management process for any fiduciary. Climate-related risk should not be seen as separate to other portfolio risks. The climate challenge for investors is immense as it requires a global economic transition of a scale that is likely not fully understood or appreciated by markets. This means that it not only presents risks for existing investments but there is a risk in not fully appreciating the opportunity presented by the climate solutions required for the transition to a Paris aligned economy.

Scientific pathway analysis shows that a 1.5°C world requires a green economy "boom" – "similar to the technology sector, with rapid growth in its size and prevalence – resulting in green products and services firmly embedding themselves throughout markets"⁹. Growth in global green revenues has outstripped overall revenue growth by 2% p.a. since 2009 - but this level of expansion, in line with investments under Nationally Determined Contributions (NDCs)¹⁰, only aligns with a temperature goal of 2.6°C. If we are to meet the Paris goal of 1.5°C then the green economy needs to grow much faster, – and the majority of that growth, replacing carbon-heavy industry, needs to happen before 2030 due to the compounding nature of carbon emissions in the atmosphere.

The EU TEG¹¹ and the IIGCC¹² agree that in order to be 'Paris aligned' investors should both manage the risks from transition and channel assets towards climate opportunities. Many LGPS funds, and other investors, have sought to replace their passive equity exposures with 'Paris Aligned' or 'Low Carbon' index trackers aligned with the EU rules. These new benchmarks have prescribed decarbonisation pathways designed to meet an IPCC 1.5C scenario with low overshoot, defined as an initial 50% drop in carbon emissions relative to the market cap index, followed by an annual cut of 7%¹³. Yet, there is currently no agreed pathway or target for green revenues or climate solutions exposure in a 'Paris-aligned' benchmark (PAB). Our analysis¹⁴ shows that green revenues exposure is a major source of difference among climate indices and the opportunity to access green economy growth through these products is limited.

A particular challenge for PABs in delivering transition aligned portfolios is that the global large/mid-cap universes they track do not currently contain many companies providing pure-play exposure to climate solutions technologies. At the end of September 2022, of the 1,513 companies in the MSCI World Index only 79 (equivalent to just under 4% of the total index weight) derived more than half of their revenues from climate solutions activity¹⁵. This means that PABs and Climate Transition Benchmarks (CTBs) often have similarly low exposure to green revenues as the MSCI World Index.

⁹ https://content.ftserussell.com/sites/default/files/green_equity_exposure_in_a_1.5_c_scenario.pdf

¹⁰ [United Nations, All About NDCs](#)

¹¹ [EU TEG on Sustainable Finance \(2019\)](#)

¹² [IIGCC Net Zero Investment Framework Implementation Guide](#)

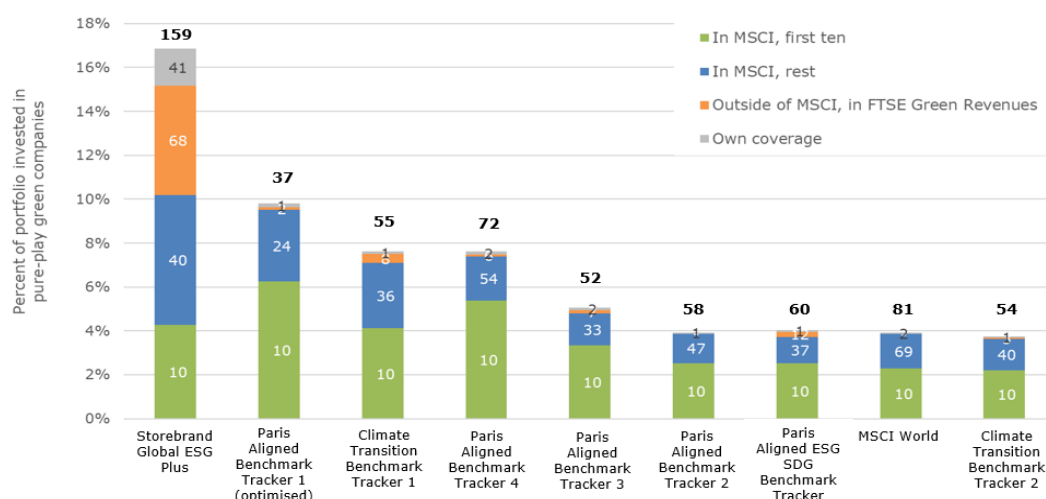
¹³ [SSGA, Understanding Paris Aligned Indexes, February 2022](#)

¹⁴ [Further analysis published in a recent paper: Climate Change Benchmarks: The Passive Pretenders](#)

¹⁵ [Storebrand analysis using FTSE Green Revenues. See Figure 1.](#)

Also, they tend to achieve the majority of their exposures through concentrated positions in just ten companies.

Figure 1 – Pure-play allocations to green revenues



Source: Storebrand, for illustration only. Calculated using an ETF tracker as proxy for each index, holdings from Morningstar. Pure-play defined as all companies with FTSE Green Revenues representing at least 50% of total revenues, plus 'own coverage'. 'Own coverage' represents companies where Storebrand has done proprietary research to allocate to off-benchmark climate solutions companies, where green revenues represent either >50% total revenues or >50% market cap.

We believe that a focus on green revenues exposure is missing from current climate reporting proposals and metrics. We would welcome the inclusion of a green revenues related metric which incorporates an analysis of green revenues diversification and exposure to 'pure play'¹⁶ climate solutions companies.

We report climate solutions and green revenues metrics in our quarterly Climate Metrics report for the Plus Funds.

Climate Metrics

Regulatory Proposal: Schemes will be expected to report on metrics as defined in supporting guidance. The proposed metrics are set out below.

Metric 1 will be an absolute emissions metric. Under this metric, Schemes must, as far as able, report Scope 1, 2 and 3 greenhouse gas (GHG) emissions.

Metric 2 will be an emissions intensity metric. We propose that all Schemes should report the Carbon Footprint of their assets as far as they are able to. Selecting an alternative emissions intensity metric such as Weighted Average Carbon Intensity (WACI) will be permitted, but AAs will be asked to explain their reasoning for doing so in their Climate Risk Report.

Metric 3 will be the Data Quality metric. Under the Data Quality metric, Schemes will report the proportion the value of its assets for which its total reported emissions were Verified*, Reported, Estimated or Unavailable.**

Metric 4 will be the Paris Alignment Metric. Under the Paris Alignment Metric, Schemes will

¹⁶ Defined as companies whose performance will be driven by delivering climate solutions, for example those with at least 50% revenues derived from climate solutions activity.

report the percentage of the value of their assets for which there is a public net zero commitment by 2050 or sooner.

Metrics must be measured and disclosed annually.

SAM Response: We agree with the proposal to include a range of, at least four, metrics. Climate risk is too complex to be explained by a single metric, such as Implied Temperature Rise (ITR).

Carbon emissions metrics

We agree that both an absolute metric and an intensity metric are useful to allow both total carbon risk exposures and relative exposures (across companies, sectors and asset classes) to be assessed. Absolute emissions are a crucial baseline assessment metric. Intensity targets do not facilitate measurement of total atmospheric carbon emissions which must be understood in relation to remaining carbon budgets for certain temperature goals. For example, a company which only sets intensity targets can demonstrate progress in reducing carbon intensity over time while still growing emissions output. However, as the consultation document states, absolute emissions are not useful for understanding relative exposures as a larger, more carbon efficient, company can have higher emissions than a smaller carbon intensive company, merely due to its size.

The proposed 'intensity' metric in the consultation, Carbon Footprint, is useful for investors to understand their individual portfolio exposures but does not measure relative carbon *efficiency*. Weighted Average Carbon Intensity (WACI) is a more useful metric for understanding the relative carbon efficiency, or revenues intensity, of companies and portfolios in relation to peers and benchmarks. For example, companies with high emissions and low revenues are more exposed to transition risks, such as carbon taxing. WACI is widely used in portfolio construction and would be a useful additional metric for climate reporting. **We would suggest that WACI is included as an additional carbon metric alongside absolute emissions and Carbon Footprint and will continue to report all three in our own climate metrics report for the SAM Plus Funds.**

The consultation does not stipulate any requirement for benchmark comparisons in the reporting of climate metrics. The addition of benchmark comparisons would be worthwhile to account for the poor data quality at an absolute level. For example, although the TCFD has defined a common methodology for the calculation of both absolute and intensity-based carbon metrics, the use of varied underlying data sources for carbon emissions can still lead to substantial inconsistencies. There are multiple providers of company carbon emissions data such as Trucost, Sustainalytics, MSCI, Bloomberg and more. In comparing data sources, we find that different vendors come up with quite different results for the same company, often due to differences in estimation methods where company data is not reported.

Large gaps remain in company reported data; around 40% of the constituents of the FTSE All-World Index "do not currently disclose" their Scope 1 and Scope 2 emissions "requiring the use of estimated data instead"¹⁷. There are even more missing data points for Scope 3 emissions, which account for 85% of total emissions¹⁸. Further, estimated carbon emissions data is inaccurate; a FTSE Russell study found that "almost half of estimated values diverge from reported data by 100%", substantially impacting the accuracy of carbon intensity in a global equity portfolio¹⁹.

¹⁷ [Decarbonization in equity benchmarks: Smoke still rising](#)

¹⁸ [Paris Aligned Benchmarks. Are They On Target For 1.5 Degrees? \(osmosisim.com\)](#)

¹⁹ [Mind the Gaps, Clarifying Corporate Carbon](#)

When aggregated this leads to substantial differences in portfolio level emissions calculations, even when the same methodology is used in the calculation, such as WACI. Therefore, **carbon metrics calculated by different data vendors will be incomparable across different LGPS funds, meaning the proposed aggregation across the whole scheme will also be inaccurate. Comparisons of portfolios to a relevant benchmark using the same data source will at least give a more accurate reference point, particularly when setting targets.**

Only 38% of companies in the S&P500 report Scope 3 emissions, in comparison to 56% of companies reporting Scope 1 emissions and 55% of companies reporting Scope 2 emissions²⁰. However, when a broader spectrum of companies is included, in line with the investment universe of a Universal Investor, this proportion is vastly reduced. Only 80 out of 10,000, or 0.8%, of listed companies in the MSCI ACWI Investable Market index are reporting adequately on Scope 3 emissions²¹. This illustrates the difficulties investors face when using emissions data for decision making purposes, particularly for smaller companies and emerging markets, and highlights the need for oversight and granularity in the use of reported emissions data. The poor data quality associated with Scope 3 means that it is not suitable for systematic use in decision making or optimisation, but if a portfolio is constructed to optimise exposures to Scope 1 and Scope 2 data without any consideration of Scope 3 this can lead to unintended consequences.

A consideration of the sources of portfolio emissions in relation to company size, sector and geography is important. For example, in delivering products that generate green revenues, companies will generate Scope 1 and 2 emissions. A climate solutions company, such as a solar panel producer, may subsequently be underweighted in optimisation based on its carbon intensity data relative to a combustion engine car maker. For this reason, **we believe a breakdown of Scope 1 and 2 emissions associated with companies generating green revenues vs other companies is a useful climate risk metric (please see Figure 2). We do not think it is sensible to systematically reduce positions in climate solutions companies due to their Scope 1 and 2 production emissions.**

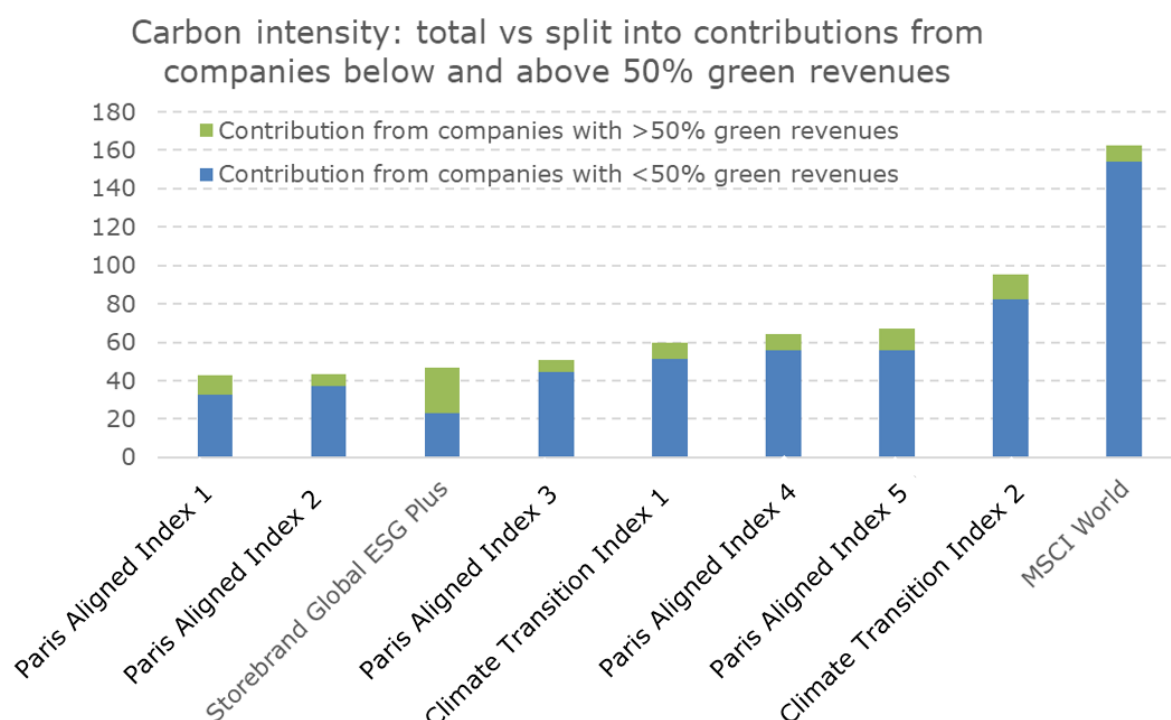
If data is only available with the appropriate level of coverage and accuracy at a Scope 1 and Scope 2 level, investors might consider the proportion of those emissions that are related to climate solutions activity and discount that from any emissions reductions targets. This would be a way of avoiding unintended reductions in climate solutions activity due to its production phase emissions, in absence of accurate full lifecycle data.

We present an example of this below:

²⁰ [Number of companies in the S&P 500 reporting energy- and emissions-related metrics](#)

²¹ [Emissions reporting: taking stock of indirect emissions in Scope 3. IPE, June 2022.](#)

Figure 2 – Total Scope 1 and 2 Carbon Intensity Separated Out for Climate Solutions Companies



Source: Storebrand analysis based on holdings from tracker ETFs / funds from Morningstar as proxy for indices. For illustration only. As at 30/06/2022.

Asset allocation decisions made to systematically reduce top line reported TCFD metrics year on year could lead to other portfolio risks such as concentration in large, developed market companies and a reduction to emerging markets or failure to incorporate climate solutions exposures.

Data Quality Metric

We agree that a data quality metric is a worthwhile addition to the report and that the LGPS, and other investors, can "*play a part in increasing data availability and quality through increasing transparency on data quality and consistent metrics*", as noted in the consultation document.

For the data quality metric to be impactful, and to establish the comparability or potential for aggregation, the data vendor would also need to be disclosed. It is not sufficient that metrics are calculated using the same methodology for them to be comparable. As detailed above, the underlying data source also impacts comparability.

In the case of any complex or subjective metric, such as 'Paris Alignment' or an ITR, a disclosure of the methodology is crucial. ITR scores and transition alignment metrics are increasingly popular but hugely methodologically dependent and often 'black boxes'. A study by the Louis Bachelier Institute concluded that ITR metrics "*hide layers of analysis, assumptions, and uncertainties*" and demonstrate little comparability or correlation in results. They cautioned that few ITRs could be considered suitable for assessing "*compatibility with the temperature objective of the Paris Agreement*"²².

²² [Institut Louis Bachelier, The Alignment Cookbook](#)

For this reason, we think the data quality metric should also apply to the Paris Alignment metric. A requirement to disclose the *"percentage of the value of their assets for which there is a public net zero commitment by 2050 or sooner"* is preferable to a highly subjective and methodologically dependent ITR. However, any company can publicly claim a net zero commitment and many of these commitments have proven to be meaningless. Carbon Tracker research has demonstrated that oil and gas company net zero goals lack credibility²³. Research by Net Zero Tracker shows that, although a third of the world's largest 100 companies have set net zero targets, 65% do not meet minimum standards of robustness²⁴. A particular challenge is the extent to which these targets rely on offsets and the small proportion²⁵ that cover Scope 3 emissions.

Therefore, we propose that the data quality standard for the Paris Alignment metric would require that only externally verified science based targets are counted.

Paris Alignment

We agree with the proposal to use a binary metric²⁶ but, as detailed above, we would propose that only externally verified science based targets²⁷ are counted in this metric so that it is not misleading and misrepresentative of portfolio risk.

As detailed above, we would urge that investors only use ITRs with extreme caution and with a full understanding of the methodology and data. ITRs from different providers cannot be considered comparable and likely do not give an accurate picture of transition risk. Our own research shows that publicly available ITRs present vastly different figures for the same fund, due to methodological differences and data errors. For this reason, we do not think it would be appropriate to legislate for funds to report on an ITR.

Additional Metrics

We believe there are two key elements of climate risk exposure missing from the reporting proposals in the consultation document:

- **Green revenues or climate solutions exposure**
 - o As detailed above we think a failure to account for increased climate solutions investments is a transition risk.
 - o We would propose that a green revenues metric, which measures the total green revenues but also considers the diversification of climate solutions companies and the exposure to 'pure play' green revenues, is added to the climate risk report.
- **Nature related risk**
 - o Data standards and availability are even more challenging when it comes to measuring nature-related risks but there are many initiatives that can help investors begin to assess their portfolio exposures. As an industry we have been focused on measuring carbon risk exposures and setting emissions reduction targets - but achieving the Paris agreement goals is very much reliant on a sustainable use of nature and putting an end to commodity driven deforestation.
 - o We believe that any credible net zero goal at fund level would also include a target to zero deforestation portfolios by 2025.

²³ <https://carbontracker.org/reports/absolute-impact-2022/>

²⁴ <https://zerotracker.net/analysis/net-zero-stocktake-2022>

²⁵ Only 38%. Source Net Zero Stocktake 2022.

²⁶ The proportion of portfolio companies with a 'net zero' /Paris aligned target.

²⁷ <https://sciencebasedtargets.org/>

- We would suggest that the statutory guidance offers advice on how investors can consider deforestation risk, set deforestation policies and collaborate with industry participants. There are initiatives to help investors with this challenge, such as the Deforestation Free Finance Initiative²⁸, which is championed by some LGPS funds²⁹ and offers guidance on how to achieve deforestation-free pensions.

Target Setting

Regulatory Proposal: Schemes will be expected to set a target in relation to one metric, chosen by the Scheme. The target will not be binding. Progress against the target must be assessed once a year, and the target revised if appropriate. The chosen metric may be one of the four mandatory metrics listed above, or any other climate related metric recommended by the TCFD.

We agree that there should be a level of flexibility around target setting, as illustrated in the proposal. However, switching target metrics for assessment each year would not be a helpful outcome.

We would suggest that any emissions reduction targets should be at a top level and incorporate all assets, as well as relate to Scope 3 emissions. **Systematic emissions reduction targets that apply only to one section of the portfolio, such as passive equities, can lead to unintended outcomes, especially when based on incomplete or inaccurate emissions data³⁰.** They can lead to reducing investments in smaller companies that may not report, as well as reduced exposures to emerging markets and climate solutions companies. Any emissions targets, particularly those based only on Scope 1 and Scope 2 emissions, should allow for consideration of climate solutions companies, smaller companies and emerging markets exposures. **Carbon emissions reduction is a useful tool for managing risk exposures but not sufficiently robust as a standalone proof statement for 'Paris Alignment'.**

A benchmark relative target may be useful at an individual fund/asset class level to account for data discrepancies and ongoing improvements to data availability – such as the incorporation of Scope 3 over time. For example, a reasonably flexible global equity portfolio target may be to exhibit a lower carbon emissions exposure (based on TCFD metrics) of x% relative to the World Index.

Due to the issues presented earlier in relation to ITRs we do not think that an ITR is a useful metric for target setting. However, for funds that would like to have an impact, **a useful target related to Paris Alignment may be to increase the proportion of portfolio companies with verified science based targets over time and take part in an engagement programme that encourages companies to do so.**

Climate Risk Reporting

Regulatory Proposal: Schemes will be expected to publish an annual Climate Risk Report. This may be a standalone report, or a section in the Scheme's annual report. We propose that scheme members must be informed that the Climate Risk Report is available in an appropriate way.

²⁸ <https://guidance.globalcanopy.org/about/>

²⁹ <https://guidance.globalcanopy.org/dff-guidance/>

³⁰ [Storebrand Asset Management: Climate Change Benchmarks: The Passive Pretenders](#)

SAM Response: Yes, we agree that publishing an annual Climate Risk Report at the individual Fund level, which allows for a narrative to complement the data, is a sensible approach. The consultation document states that the report should be appropriate for both specialist and non-specialist audiences. In this case we do not believe that 'Paris Alignment' statements based on ITRs are appropriate as they are enticingly simple metrics that hide extremely complex methodologies and can be misleading.

Regulatory Proposal: We propose that the Scheme Advisory Board (SAB) should prepare an annual Scheme Climate Report including a link to each individual Scheme's Climate Risk Report (or a note that none has been published) and aggregate figures for the four mandatory metrics. We also propose that a list of the targets which have been adopted by Schemes. We are open to views as to whether any other information should be included in the Scheme Climate Report.

SAM Response: Aggregating figures for the four mandatory metrics across the whole LGPS will be spurious unless a single source is used – and this is unlikely given the 89 individual funds will have a variety of investment and data providers. In the infancy of this reporting legislation, it may be more appropriate to begin with fund level reporting for a couple of years, allowing for improvements in data and consistency, before attempting a scheme level report.

Advice and Guidance

Regulatory Proposal: We propose to require that each Scheme take proper advice when making decisions relating to climate-related risks and opportunities and when receiving metrics and scenario analysis.

SAM Response: We agree that proper, expert, independent advice is necessary when making decisions relating to climate-related risks and opportunities and when receiving metrics and scenario analysis. We would add that any such advisors should engage with portfolio managers to understand their approach to measuring and managing climate related risks and opportunities.

Summary:

- As recently reported by the FSB, current climate scenario analysis is understating risks. This is a particular problem when relying on institutional scenarios. The statutory guidance to the climate reporting regulations should include advice about the appropriate use of climate scenarios in recognition of the risks associated with using fallacious Paris Aligned scenarios. Guidance should also be provided on the meaning/definition of 'Paris Alignment' and 'net zero'.
- Schemes could play a part in improving investors understanding of climate risk by collectively eschewing institutional scenarios that the scientific community does not find to be credible and by focusing on scientifically credible, independent advice and evidence when it comes to scenario analysis and Paris Alignment.
- Weighted Average Carbon Intensity (WACI) is widely used in portfolio construction. We would suggest that WACI is included as an additional carbon metric, alongside absolute emissions and Carbon Footprint, to enable cross-sector comparability and an understanding of revenues intensity as a measure of transition risk.
- Carbon metrics calculated by different data vendors will be incomparable across different funds, meaning the proposed aggregation across the whole scheme will also be inaccurate. We suggest that benchmark data, using the same data source, should be reported alongside portfolio emissions metrics at fund level. This would be a useful reference point when setting targets.
- A focus on green revenues exposure is missing from current climate reporting proposals and metrics. We would welcome the inclusion of a green revenues related metric which incorporates an analysis of green revenues diversification and exposure to 'pure play'³¹ climate solutions companies.
- Funds should be discouraged from making portfolio construction decisions solely to reduce top line TCFD metrics year on year as this can lead to unintended outcomes.
- Implied Temperature Rise (ITR) metrics are not currently fit for purpose, particularly for portfolio construction purposes.
- The binary method is a good option for the Paris Alignment metric, however only verified Science Based Targets should be counted. There should be no reliance on unverified net zero corporate targets.

Contact:

Lauren Juliff

Head of UK Institutional and Climate Specialist

lauren.juliff@storebrand.no

³¹ Defined as companies whose performance will be driven by delivering climate solutions, for example those with at least 50% revenues derived from climate solutions activity.

Important Information

This is a marketing communication, and this document is intended for professional investors only. Except otherwise stated, the source of all information is Storebrand Asset Management AS as at 30 September 2022.

Historical returns are no guarantee for future returns. Future returns will depend, inter alia, on market developments, the fund manager's skills, the fund's risk profile and subscription and management fees. The return may become negative as a result of negative price developments. Statements reflect the portfolio managers' viewpoint at a given time, and this viewpoint may be changed without notice.

Storebrand Asset Management AS is a management company authorised by the Norwegian supervisory authority, Finanstilsynet, for the management of UCITS under the Norwegian Act on Securities Funds. Storebrand Asset Management AS is part of the Storebrand Group.

Storebrand Asset Management AS has appointed SKAGEN AS to act as sub-distributor and local market representative in some European markets, including the UK. SKAGEN AS is part of the Storebrand Group and 100% owned by Storebrand Asset management AS. Storebrand Asset Management AS has appointed SKAGEN AS UK Branch to act as Facility Agent in the UK. SKAGEN's London Office is located at 15 Stratton Street, London, W1J 8LQ. The SKAGEN AS UK Branch is authorised by Finanstilsynet and subject to limited regulation by the Financial Conduct authority. Details about the extent of the authorisation and regulation by the Financial Conduct Authority are available on request.

The SKAGEN AS UK Branch is currently part of the FCA Temporary Permission Regime (TPR) and continues operating within the scope of its previous passport permission until the end of 2023.

No offer to purchase shares can be made or accepted prior to receipt by the offeree of the fund's prospectus and KIID and the completion of all appropriate documentation. You can download more information including subscription/redemption forms, full prospectus, Key Investor Information Documents (KIID), General Commercial Terms, Annual Reports and Monthly Reports in English language from Storebrand Asset Management AS' UK webpages www.storebrandfunds.co.uk or contact the SKAGEN AS UK Branch (details available at www.skagenfunds.co.uk).

Investors' rights to complain is made available to investors pursuant to our complaints handling policy and procedure. The summary of investor rights in English is available here: www.storebrandfunds.co.uk

Storebrand Asset Management AS may terminate arrangements for marketing under the Cross-border Distribution Directive denotification process.

For more information about Storebrand's approach to sustainability, please refer to the information and disclosures on the webpages dedicated to sustainability: <https://www.storebrandfunds.co.uk/sustainability>

The following products are currently registered with the UK FCA:

- *The UCITS Storebrand SICAV Lux with two sub-funds (Storebrand Global ESG Plus Lux and Storebrand Global Solutions Lux)*
- *[AMX UCITS CCF - Storebrand - Emerging Markets ESG Plus](#)*
- *[AMX UCITS CCF – Storebrand – Global ESG Plus](#)*