

TCFD Product Disclosure 2023

Janus Henderson Cautious Managed Fund - GCAOPE

Approach to Climate Change and ESG

Janus Henderson is committed to responsibility – both in our own Corporate Responsibility policies and practices and in Responsible Investing. We believe that ESG considerations, including climate change factors, can have a material impact on the financial outcomes of our investments; these financially material considerations are vital to long-term risk-adjusted returns.

Our firmwide ESG Investment Principles are based on four key beliefs:

- Investment portfolios are built to maximize long-term risk-adjusted returns for our clients.
- Evaluation of financially material sustainability, climate, and ESG factors is a fundamental component of our investment processes.
- Corporate engagement is vital to understanding and promoting business practices that position the companies we in invest in for the future.
- Investment teams should have the freedom to interpret and implement sustainability factors in the way best suited to their asset class and strategy objective, as they do for any fundamental investment factor.

At Janus Henderson, we strive to equip our investment teams – analysts and portfolio managers – to manage financially material climate and ESG risks and opportunities within our portfolios. This includes providing training and a combination of third-party data and proprietary insights to enable our investment teams to assess risk at a security and portfolios level and evaluate the impact on the financial outcomes of each portfolio. This process is a journey on which we have made significant strides in recent years, yet we have identified ways in which we can continue to make progress. We have tangible initiatives underway to enhance the data, analytics, and skills of our investment teams.

We believe that active research and engagement, the foundation of Janus Henderson's investment processes, is the optimal way to identify and manage financially material climate and ESG risks and opportunities. The use of ESG and climate data – such as carbon emissions and Climate Value at Risk– is still in its infancy. Much of the data and third-party analytics are estimated and backward-looking, while availability across asset classes and companies is often incomplete, therefore any conclusion drawn can be misleading and require interpretation and judgment. Our investment teams, who understand their portfolio holdings extremely well, and in partnership with the ESG subject matter experts on our central Responsibility Team, are best positioned to provide the necessary distinctive actionable insight.



Climate Change and ESG data, Metrics and Analytics

Janus Henderson has, and will continue, to improve the range of data, metrics, and analytics available to our investment teams.

ESG Data

Investment teams have access to a range of third-party data from providers such as MSCI, Sustainalytics, RepRisk and others. This data includes ESG ratings, risks and controversies, business-involvement, SDG-alignment and other climate and ESG related data sets such as EU Taxonomy and Principle Adverse Indicators.

Carbon and Climate Data

Our investment teams have access to a wide range of third-party climate data that is available, as appropriate, at both a company and portfolio level. We are in the early phases of comprehensive education, training and embedding of climate metrics and scenario analysis in the investment process. This data includes:

- Carbon metrics
- Climate scenario analysis, using a range of scenarios and assessed in detailed with respect to physical and transition risks
- Implied Temperature Rise
- Stranded asset risk, green revenues and low carbon transition opportunities

Proprietary ESG and Climate Dashboard

We are in the process of finalizing a firm-wide proprietary **ESG and Climate Dashboard** that will be available in 2023. Our Dashboard shows portfolio-level analytics for the factors we believe to be most material for all sectors and companies. It also identifies the leader and laggard companies that contribute to the overall portfolio metrics. The Dashboard can help us uncover underappreciated risks and opportunities for the companies in which we invest - including by alerting us to changes and drawing attention to leaders and laggards across regions, sectors, and companies. Key metrics included in this dashboard are:

	Topic	Field name	
		Carbon Emissions	
		Scope 1 & 2	
		Scope 3 – upstream	
		Scope 3 – downstream	
		Carbon Footprint	
		Scope 1 & 2	
		Scope 3 – upstream	
	Environmental	Scope 3 – downstream	
	Environmental	Weighted Average Carbon Intensity (WACI)	
		Scope 1 & 2	
<u> </u>		Scope 3 – upstream	
뜡		Scope 3 – downstream	
Fa		Energy Consumption Intensity per Revenue	
ate		Weighted Average High Risk Carbon Emissions	
Ö		Weighted Average High Risk Toxic Emissions	
Corporate Factor		Weighted Average High Risk Water Stress	
ပ		Board Gender Diversity	
		< 1 Female Director	
	Social & Governance	< 30% Female Directors (% Weight)	
	Social & Governance	Not Independent Chair (% Weight)	
		No Independent Board Majority (% Weight)	
		Overboarded Non-Exec Directors (% Weight)	
		UN Global Compact	
	Global Norms	Pass	
	Giobai Norms	Watch List	
		Fail	
	Controversies	Controversy Score	

	Environmental	GHG Intensity GDP			
vereign ra	Social	European Union (EU) Sanctions			
		Average Income Inequality Score			
		Average Freedom of Expression Score			
	Human Rights	Average Human Rights Performance			
	Governance	Average Corruption Score			
		Non-cooperative Tax Jurisdiction			
		Average Political Stability Score			
		Average Rule of Law Score			



Identification, Analysis, Management of Financially Material Climate and ESG Risks and Opportunities

We believe that our investment teams are best positioned to research, analyse, and determine the impact of financially material climate and ESG risks and opportunities at both the company and portfolio level.

Integration of climate and ESG considerations needs to align with existing investment processes. It is our investment teams that are primarily responsible for the research, financial modelling, portfolio construction and stewardship activities. Having Investment teams lead the integration process for climate and ESG risks and opportunities ensures that there is integration at each appropriate stage of the investment process, including portfolio decisions. Our investment teams are supported by our central Responsibility Team, who are subject matter experts in ESG. This team manages ESG data, training, and partners with the investment teams on research and engagement. This partnership leads to enhanced research and decision-making – marrying the sector and industry expertise of the investment teams with the ESG skills of the Responsibility Team.

This process is a combination of bottom-up analysis, starting at the company level and is increasingly levering portfolio-level data for an incremental lens and layer of oversight. For bottom-up analysis, our investment teams have access to the company-level and portfolio-level third-party data described previously. They can leverage this data to identify potentially financially material climate and ESG risks and opportunities as they research their companies. They may consider and utilize third-party financial materiality frameworks (such as SASB (Sustainability Accounting Standards Board), mapping material factors to data from MSCI) in conjunction with their own knowledge, to focus on the issues likely to be most material.

The geographical domicile of the company or its assets can also impact materiality. The investment teams potentially conduct engagements to both obtain further insight on the climate or ESG issue and often to encourage the company to better manage these issues to best-position the company for future success. As part of the research process, investment teams assess the materiality and the impact on relevant financial metrics for the company, which could include cash flows, valuation, cost of capital, or credit ratings. This research and insight flow into the investment decision, similar to how an investment team would consider any financially material factor. Should a material unmanaged risk be identified and quantified, we evaluate the impact on a securities price and risk-adjusted return. Should we believe the risk is not fully priced in, the portfolio impact could include escalation through further engagement, reweighting of position sizes, changing target prices, or divestment for outsized unmanaged risks.

Increasingly, we are utilising portfolio-level analysis combined with the bottom-up process to identify, analyse and manage financially material climate and ESG risks. The proprietary ESG and Climate Dashboard will enable investment teams to quickly identify any material climate or ESG risks at the portfolio level, then drill down to the company level to better understand the source of those risks.



Engagement vs Exclusion or Divestment

We prefer an engagement-focused approach to a firm-level exclusion or divestment policy, both in sectors with higher environmental risk and for companies where we have identified financially material climate or ESG risks.

We believe this approach is best for maximizing risk-adjusted returns for our clients and for driving positive change at our portfolio companies. Most products and services offered by a company play necessary roles for the global economy – including sectors with higher carbon emissions such as oil and gas, mining, industrials, and utilities. Rather than ignoring companies in these sectors through automatic exclusion or divestment, engagement leads to two benefits. First, we can engage for information – the knowledge we gain through our engagements with companies can be leveraged in the investment process to better inform our research, modelling, and investment decisions. Engaging for information helps us assess the magnitude of any potential risk, how well a company is managing that risk, and the potential impact on that company's financial outcomes. Second, we can engage for outcomes. Where we believe a company is ignoring or not managing a financially material climate or ESG risk, we can engage for an outcome - to encourage that company to adopt policies or practices that will address that risk and better position it for the future. This includes asking companies to enhance their disclosure of material ESG or climate data, such as carbon emissions. Our discussions with the company's management or board of directors directly link the climate or ESG consideration to why we believe addressing it makes them a better company, for example, leading to improved cash flows, valuations, cost or capital, or credit ratings. Our investment teams often partner with our central Responsibility Team on engagements. The professionals on our Responsibility Team are both engagement and ESG subject matter experts, that can assist in identifying and researching the engagement topics and facilitating the engagements themselves.

At a firm level, since Q2 2022, we have applied firm wide baseline exclusions, for current manufacture, or minority shareholding of 20% or greater in a manufacturer of: cluster munitions, anti-personnel mines, chemical weapons, biological weapons. For more details, please visit our dedicated ESG webpage.

Governance and Oversight

We continue to strengthen the governance and oversight of climate and ESG risks.

Our Investment Teams are at the core of our governance process and bear the primary responsibility for identifying, analysing, and integrating financially material ESG and climate considerations. In addition, we have established oversight mechanisms.

Our ESG Oversight Committee, chaired by our Chief Responsibility Officer, provides oversight of a range of issues at a portfolio and security level, including monitoring of company-level positions for investments identified as having climate or ESG risks.

In 2022, our second-line Financial Risk team started providing portfolio-level oversight of climate and ESG risks, using the ESG and Climate Dashboard. Also, in 2023, our Investment Performance & Risk Committee and our Front Office Governance & Risk Committee will provide oversight for their respective areas of governance.

Lastly, starting in 2023, our Board of Directors will provide top-level oversight of Climate and ESG Risks. Our Chief Responsibility Officer will provide quarterly updates to the Governance and Nominations Committee on both operational and investment issues.



Portfolio Climate Metrics

Below are the carbon footprint metrics for this portfolio used to assess climate related risks and opportunities.

The combination of these metrics provides a multi-dimensional view of the portfolio's climate risk exposures and provide useful insights about the portfolio holdings when assessing climate risks and opportunities.

It is important to note that climate risk considerations are part of the wider investment decision making about the attractiveness of an investment and will not explicitly supersede other inputs in security selection unless explicit climate risk management is an objective of the mandate.

As of year-end, our portfolio showed a lower carbon footprint than the benchmark and a weighted average carbon intensity broadly in line with the benchmark. This was driven by the portfolio's underweight position to carbon intensive sectors, such as energy and materials. At year-end, we perceived better risk adjusted return potential in other sectors; however, this portfolio is broadly diversified across sectors and our sector positioning could change depending on our investment team's outlook.

Where we perceive climate to be a financially material risk or opportunity for a company, we will research and potentially engage to understand the impact of climate on cash flows and valuation and possibly to encourage the company to better address any risk that we think is not being adequately managed. This approach has resulted in the portfolio having a lower carbon profile and risks than the benchmark.

The Funds benchmark is 50% FTSE All Share + 50% ICE Bank of America Sterling Non Gilt Index

Allocation Base	EVIC	Unit	Portfolio	Coverage	Benchmark	Coverage
Carbon Emissions						
Total Carbon Emissions	Scope 1 & 2	Tons CO2e	52,463.8	70.3%	70,864.5	72.0%
Total Carbon Emissions	Scope 3 – upstream	Tons CO2e	115,431.8	70.3%	123,569.0	71.8%
Total Carbon Emissions	Scope 3 – downstream	Tons CO2e	344,876.4	70.3%	528,020.7	71.8%
Carbon Footprint						
Total Carbon Footprint	Scope 1 & 2	Tons CO2e/\$M invested	51.7	70.3%	69.8	72.0%
Total Carbon Footprint	Scope 3 – upstream	Tons CO2e/\$M invested	113.6	70.3%	121.7	71.8%
Total Carbon Footprint	Scope 3 – downstream	Tons CO2e/\$M invested	339.5	70.3%	519.8	71.8%
Weighted Average Carbon Int	tensity (WACI)					
WACI Corporate Constituents	Scope 1 & 2	Tons CO2e/\$M revenue	91.2	78.6%	101.7	92.4%
WACI Corporate Constituents	Scope 3 – upstream	Tons CO2e/\$M revenue	206.6	77.4%	217.5	87.9%
WACI Corporate Constituents	Scope 3 – downstream	Tons CO2e/\$M revenue	429.8	77.4%	776.7	87.9%
WACI Sovereign Constituents	GHG Intensity	Tons CO2e/\$M GDP nominal	148.2	7.1%	237.5	1.0%
Portfolio Temperature Alignment						
Implied Temperature Rise		Degrees Celsius	2.0	75.9%	2.3	83.0%



Source: MSCI

Climate Scenario Analysis

Significant progress has been made in 2022 and more will be made in 2023 on our journey to equipping our investment teams with the data and the capabilities to properly assess the accuracy and impact of the information contained in climate scenario analysis.

The data is currently available to every team and some training has been conducted. In 2023, we hope to deepen our investment teams' knowledge of the insight and the limitations of the data to robustly embed the usage of it in investment management processes. As previously noted, climate scenario analysis is still in its infancy, with issues in data and analytical accuracy that require interpretation. It is imperative that we understand how the data and analysis were developed in order to understand the limitations, contextualise it, and leverage true insights in our investment management process.

Climate scenario analysis helps us analyse at both the portfolio and company level:

- (a) transition risks and opportunities (policy risks resulting in the asset being impacted by societal and economic shifts towards a low-carbon future; and technological opportunities such as innovations in clean technology)
- (b) physical risk, which is the impact on the asset of environmental events such as floods or storms.

Based on input from our ESG subject-matter expert in the central Responsibility team, we have selected three Network for Greening the Financial System (NGFS) transition risk scenarios and two physical risk scenarios (Average and Aggressive) to provide a forward-looking and return-based valuation assessment. The scenario analysis of this portfolio as of 4Q 2022 is below.

Scenario: REMIND 1.5c Orderly Average	Climate VaR Contribution	Coverage	Benchmark	Coverage
Transition Climate VaR – Policy	-10.8%	65.3%	-12.3%	68.8%
Transition Climate VaR – Technology	3.6%	65.3%	3.5%	68.8%
Physical Climate VaR	-10.0%	62.4%	-9.6%	66.9%
Aggregated Climate VaR	17.2%	N/A	-18.4%	N/A
				Source: MSCI

Scenario: REMIND 1.5c Disorderly Aggressive	Climate VaR Contribution	Coverage	Benchmark	Coverage
Transition Climate VaR – Policy	-35.1%	65.3%	-36.0%	68.8%
Transition Climate VaR – Technology	12.1%	65.3%	12.3%	68.8%
Physical Climate VaR	-12.9%	62.4%	-12.6%	66.9%
Aggregated Climate VaR	-35.8%	N/A	-36.3%	N/A

Source: MSCI

Scenario: REMIND 3.0c Hot House Aggressive	Climate VaR Contribution	Coverage	Benchmark	Coverage	
Transition Climate VaR – Policy	-1.4%	65.3%	-1.4%	68.8%	Ī
Transition Climate VaR – Technology	0.1%	65.3%	0.2%	68.8%	



Physical Climate VaR	-12.9%	62.4%	-12.6%	66.9%
Aggregated Climate VaR	-14.2%	N/A	-13.8%	N/A

Source: MSCI

Although the team do not currently leverage this complex and evolving data in day-to-day investment decisions, these metrics provide insight on the possible climate-related financial risks that may be incurred by investors should its underlying assumptions suddenly occur.



Glossary and Abbreviations

CARBON FOOTPRINTING refers to the calculation of the total greenhouse gas emissions caused by an individual, event, organization, service, or product expressed as a carbon dioxide equivalent.

CLIMATE-RELATED OPPORTUNITY refers to the potential positive impacts related to climate change on an organization. Efforts to mitigate and adapt to climate change can produce opportunities for organizations, such as through resource efficiency and cost savings, the adoption and utilization of low-emission energy sources, the development of new products and services, and building resilience along the supply chain. Climate-related opportunities will vary depending on the region, market, and industry in which an organization operates.

CLIMATE-RELATED RISK refers to the potential negative impacts of climate change on an organization. Physical risks emanating from climate change can be event-driven (acute) such as increased severity of extreme weather events (e.g., cyclones, droughts, floods, and fires). They can also relate to longer-term shifts (chronic) in precipitation and temperature and increased variability in weather patterns (e.g., sea level rise). Climate-related risks can also be associated with the transition to a lower-carbon global economy, the most common of which relate to policy and legal actions, technology changes, market responses, and reputational considerations.

GOVERNANCE refers to "the system by which an organization is directed and controlled in the interests of shareholders and other stakeholders."

GREENHOUSE GAS (GHG) EMISSIONS SCOPE LEVELS

- Scope 1 refers to all direct GHG emissions.
- Scope 2 refers to indirect GHG emissions from consumption of purchased electricity, heat, or steam.
- Scope 3 refers to other indirect emissions not covered in Scope 2 that occur in the value chain of the reporting company, including both upstream and downstream emissions. Scope 3 emissions could include the extraction and production of purchased materials and fuels, transport-related activities in vehicles not owned or controlled by the reporting entity, electricity-related activities (e.g., transmission and distribution losses), outsourced activities, and waste disposal.

NGFS The Network for Greening the Financial System is a group of 91 central banks and supervisors and 14 observers committed to sharing best practices, contributing to the development of climate –and environment– related risk management in the financial sector and mobilising mainstream finance to support the transition toward a sustainable economy. NGFS have developed climate scenarios to provide a common starting point for analysing climate risks to the economy and financial system.

RISK MANAGEMENT refers to a set of processes that are carried out by an organization's board and management to support the achievement of the organization's objectives by addressing its risks and managing the combined potential impact of those risks.

SCENARIO ANALYSIS refers to a process for identifying and assessing a potential range of outcomes of future events under conditions of uncertainty. In the case of climate change, for example, scenarios allow an organization to explore and develop an understanding of how the physical and transition risks of climate change may impact its businesses, strategies, and financial performance over time. Each NGFS scenario used in this disclosure explores a different set of assumptions for how climate policy, emissions and temperatures evolve.

- i. **NGFS SCENARIO 1.5°C ORDERLY: Net Zero 2050** limits global warming to 1.5°C through stringent climate policies and innovation, reaching global net zero CO2 emissions around 2050. Some jurisdictions such as the US, EU and Japan reach net zero for all GHGs.
- ii. NGFS SCENARIO 1.5°C DISORDERLY: Divergent Net Zero reaches net zero around 2050 but with higher costs due to divergent policies introduced across sectors leading to a quicker phase out of oil use



iii. NGFS SCENARIO 3°C HOT HOUSE: Current Policies assumes that only currently implemented policies are preserved, leading to high physical risks.

STRATEGY refers to an organization's desired future state. An organization's strategy establishes a foundation against which it can monitor and measure its progress in reaching that desired state. Strategy formulation generally involves establishing the purpose and scope of the organization's activities and the nature of its businesses, taking into account the risks and opportunities it faces and the environment in which it operates.

TRANSITION PLAN refers to an aspect of an organization's overall business strategy that lays out a set of targets and actions supporting its transition toward a low-carbon economy, including actions such as reducing its GHG emissions.

Abbreviations

CO2	Carbon dioxide	PCAF	Partnership for Carbon Accounting Financials		
CO2e	Carbon dioxide equivalent	EVIC	Enterprise Value Including Cash		
SBTi	Science Based Targets Initiative	GHG	Greenhouse gas		
WACI	Weighted Average Carbon Intensity	PAI	Principle Adverse Impacts		
SASB	Sustainability Accounting Standards Board				
TCFD	Task Force on Climate-related Financial Disclosures				
CVaR	Conditional Value at Risk				