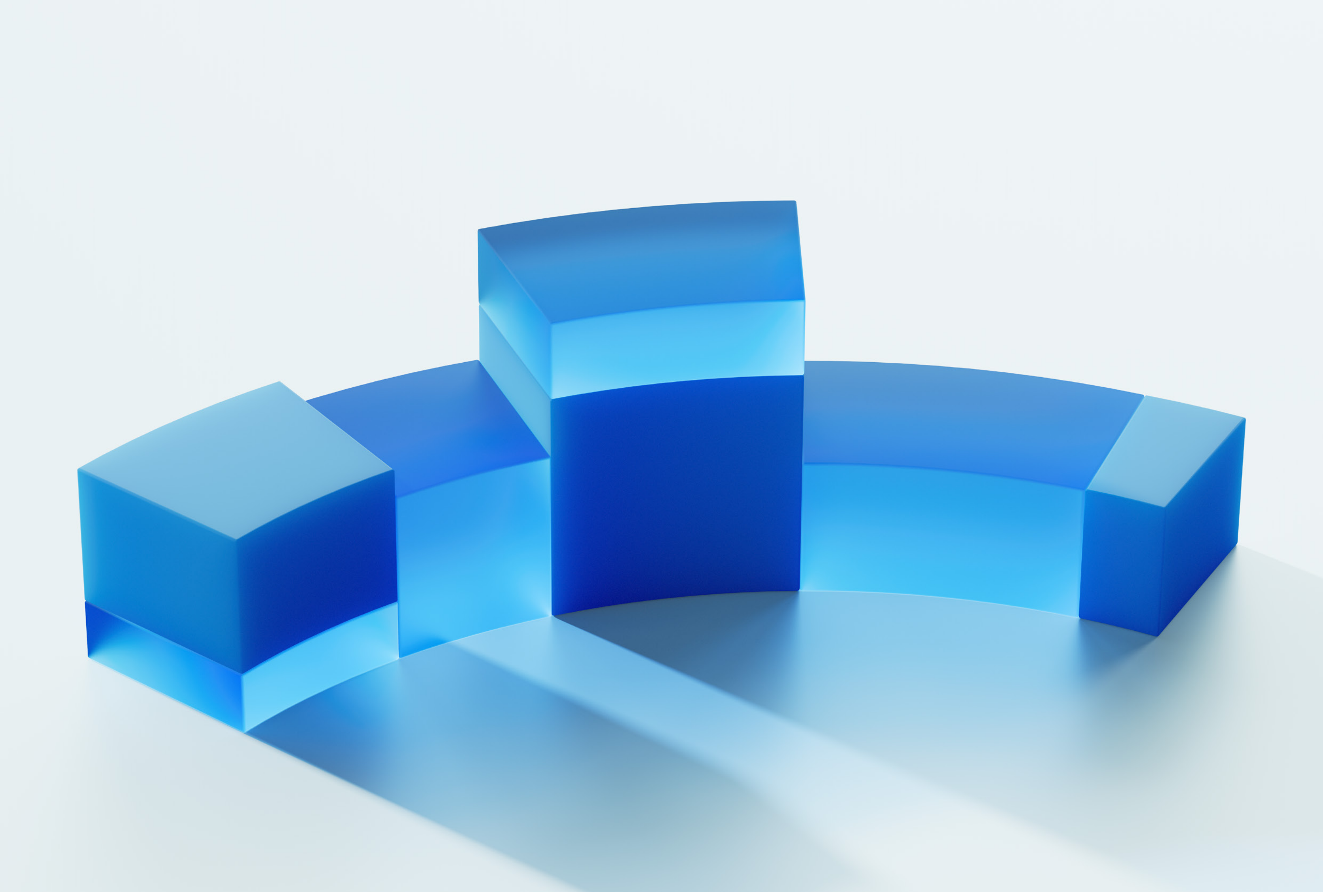


Sustainable investing at J.P. Morgan Asset Management

Our philosophy & approach

April 1, 2022

J.P.Morgan
ASSET MANAGEMENT

Contents

Introduction

As a global investment manager, our mission at J.P. Morgan Asset Management is to deliver long-term investment performance to help our clients achieve their financial objectives. As stewards of the financial assets entrusted to us by our clients, we provide investment insights that take into consideration factors impacting the value of our investments today and in the future, including sustainability.

Sustainable investing[1] is a forward-looking approach that aims to deliver long-term sustainable financial return in a fast-changing world. It encompasses a wide-ranging spectrum of approaches, the core of which starts with the incorporation of financially material environmental, social and governance (ESG) information.

ESG factors are important for investors to keep in mind when assessing a company's performance, and can be used both to mitigate risk and unlock opportunities in an investment portfolio. Our investment teams globally are committed to understanding and effectively integrating sustainability risks and considerations into our investment processes.

We are also in tune with how our clients' investment objectives continue to evolve, as many clients are increasingly seeking investment solutions that not only generate sustainable long-term returns, but also contribute to sustainable outcomes.

Our approach to sustainable investing focuses on proprietary resources, including fundamental research, ESG data and analytics and innovation, in providing sustainable investment solutions to our clients, as well as our commitment to active ownership by exercising our voting rights and engaging with companies to create long-term value for clients.

This document provides an insight into our governance of sustainability, our sustainable investing philosophy, the principles that guide our firm-wide commitment to ESG integration and our approach to developing dedicated sustainable products.

In addition, it sets out our approach to some of the most important sustainability themes, including climate change, human rights and natural capital and biodiversity.

More information on J.P. Morgan Asset Management's approach to sustainable investing can be found by visiting the sustainability section of our website am.jpmorgan.com or by speaking to your J.P. Morgan representative.

[1] J.P. Morgan Asset Management takes a global approach to sustainable investing, and the solutions offered through our sustainable investing platform meet our internally defined criteria for a sustainable investment. The evolving nature of sustainable finance regulations and the development of jurisdiction-specific legislation setting out the regulatory criteria for a "sustainable investment" or "ESG" investment mean that there is likely to be a degree of divergence as to the regulatory meaning of such terms. This is already the case in the European Union where, for example, under the Sustainable Finance Disclosure Regulation (EU) (2019/2088) certain criteria must be satisfied in order for a product to be classified as a "sustainable investment." Any references to "sustainable investing," "SI" or "ESG" in this document are intended as references to our internally defined criteria only and not to any jurisdiction-specific regulatory definition.

Our Philosophy & Approach

At J.P. Morgan Asset Management, our approach to sustainable investing spans:

- Integrating financially material ESG considerations in active investment processes.
- An investor-led, research-driven approach to investment stewardship that defines and directs company- and industry-level engagements aligned to our clients' portfolio objectives.
- Producing sustainable investing research and insights on a range of thematic ESG issues, including climate change.
- Developing proprietary ESG data tools, technology and insights to enhance investment capabilities and contribute to product innovation.
- Working with our clients to build and implement sustainable investment solutions.
- Developing proprietary, multi-dimensional research methods and analytics to support climate-aware investing, because climate factors represent the single largest source of risks and opportunities in the decades to come.

Aligning our approach with global ESG frameworks

J.P. Morgan Asset Management's global commitment to sustainable investing is reflected in our endorsement of independent, and now widely accepted, codes of conduct and principles.

This includes the **United Nations Principles for Responsible Investment (UNPRI)**[2], which we have been a signatory to since 2007 and to which our active investing activities are aligned.

Task Force on Climate-Related Financial Disclosures (TCFD). We engage with companies to actively encourage enhanced disclosure of ESG- and climate-related data. This includes transparency in their choice of metrics and targets, and alignment of their strategy to different climate transition pathways in line with TCFD recommendations and SASB standards. This allows asset managers and asset owners to have useful and comparable information when making important investment decisions.

Sustainability Accounting Standards Board (SASB). J.P. Morgan Asset Management is a member of the SASB. We endorse the SASB Materiality Framework and reference it in our investment processes, where appropriate, coupled with our own analysts' assessment of financial materiality. We are also a member of the SASB Alliance Investor Advisory Group (IAG), which comprises leading global asset owners, asset managers and investment intermediaries that recognize the need to provide consistent, comparable and reliable disclosure of financially material, decision-useful ESG information to investors.

[2] The UNPRI survey includes modules that solicit information from signatories, including J.P. Morgan Asset Management, on various topics including strategy and governance. Information is self-reported by signatories, including J.P. Morgan Asset Management, and was not audited by any party, including J.P. Morgan Asset Management, independent public accounting firms or UNPRI. Information on the UNPRI's 2020 form of strategy and governance module and assessment methodology is included in the following links:
https://dwtyzx6upklss.cloudfront.net/Uploads/q/c/a/02a._sg_cc_2020_80624.pdf.
https://www.unpri.org/reporting-and-assessment/reporting-and-assessment-archive/6567.article
Please note that publication of the UNPRI 2021 reports have been delayed due to changes in the UNPRI Reporting & Assessment process. Until release of the 2021 reports, the 2020 UNPRI report is the latest available. In 2020, J.P. Morgan Asset Management received an A+ on its response on the Strategy and Governance module of the UNPRI survey based on information provided for calendar year 2019. The module is designed to provide information concerning each signatory's overarching approach to responsible investment, including governance, responsible investment policies, objectives and targets, the resources that are allocated to responsible investment and the incorporation of ESG issues into asset allocation.

Our Philosophy & Approach continued

Our commitment to ESG integration

J.P. Morgan Asset Management believes that long-term thinking leads to sustainable business models, and that ESG factors as additional inputs inform better long-term investment decision-making.

We define ESG integration as the systematic inclusion of financially material ESG factors into investment analysis and investment decision-making. We systematically assess financially material ESG factors in our investment decisions to reduce risk and improve long-term, risk-adjusted returns in actively managed assets entrusted to our management.

To assess and periodically review the integration of financially material ESG factors in actively managed investment processes, we have developed and implemented a prioprietary set of key metrics. This includes a process-focused, 10-metric framework to validate the approach applied by our investment groups.

This is consistent with our policies in relation to the integration of sustainability risks in investment decision-making and investment advisory processes, as outlined in our Sustainability Risks Policy.

For more information on this, as well as our overall approach to ESG integration, please see our ESG Integration Paper.

Our Philosophy & Approach continued

J.P. Morgan Asset Management 10-metric framework for ESG integration

	Metrics	Sub questions
Research and Investment Management	1. Research analyst/ investment due diligence	● Is ESG integration an integral part of the research or investment due diligence process? ● Are analysts engaging on issues related to ESG with companies and leveraging ESG information for analysis?
	2. Consideration at portfolio management/ investment decision level	● Is ESG fundamental to the investment decision-making process? ● Do ESG factors lead to a reweighting of the portfolio? ● Do the portfolio managers and/or investment committee override or add insights to analysts' ESG analysis?
	3. Breadth of third-party ESG data	● Is independent, external or third-party data incorporated into ESG analysis? How is this data used? ● Is the team relying on a single data source, or are different third-party data sources leveraged and used for verification?
	4. Level of proprietary research conducted	● How much in-house research has been conducted in conjunction with available third-party data? Is there a heavy reliance on external/third-party data? ● Is there any evidence of ESG scores created by the team? ● Where relevant, does the team meet with companies to engage on issues related to ESG?
	5. Company/sector coverage	● Has the team considered sector differences when integrating ESG and thought about ESG factors' materiality? ● If so, how is the team implementing this?
Documentation	6. Documentation of integration methodology	● Is there documentation setting out how ESG is integrated? ● Is there a specific methodology or a framework being leveraged, and has this been shared within the team?
	7. Documentation of proprietary data and research methods	● Is there any documentation of proprietary data and research? ● Are there any case studies/examples that demonstrate this? ● Is ongoing corporate engagement part of the process and how is that documented, especially with respect to engagement activities on highlighted material ESG factors?
Monitoring	8. Risk management and oversight	● Is there clear assignment of roles and responsibilities in the ESG integration process to ensure risk management and oversight are in place? ● What is the risk management process of ESG integration?
	9. Systematization	● Is the process implemented using a centralized system such as Spectrum™ so it can be leveraged by the entire investment engine? ● Is the ESG integration information shared across the team, not just within a limited group of people?
	10. Ongoing monitoring and maintenance	● How does monitoring of ESG integration take place? ● Is there a forum to discuss improvements to, and enhancements of, ESG integration?

Source: J.P. Morgan Asset Management Sustainable Investing Team and ESG Data and Research Working Group.

Our Philosophy & Approach continued

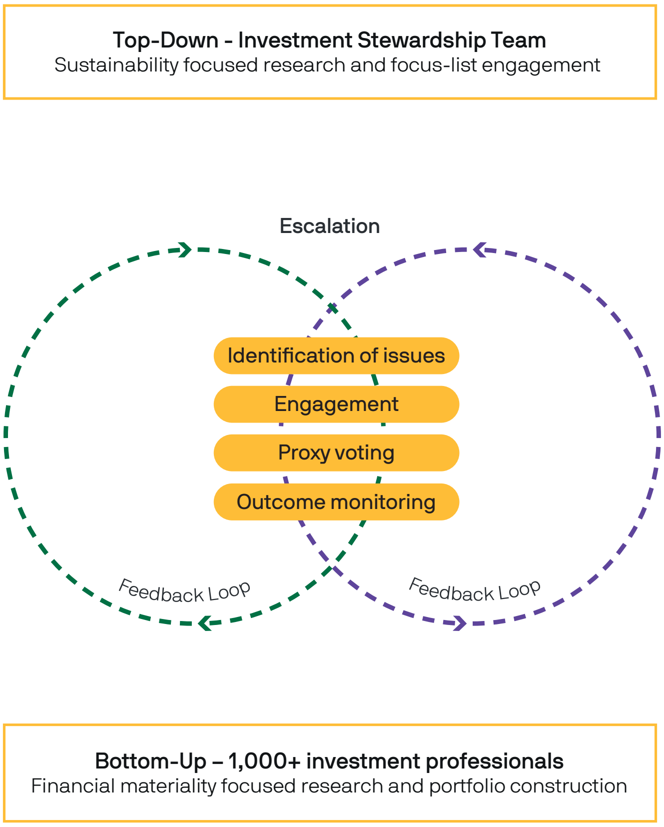
Investment-led, expert-driven investment stewardship

Our Investment Stewardship team defines and directs company- and industry-level engagements on our stewardship priorities, including providing ESG expertise for our broader investment-led engagement efforts, and works with investors to exercise our voting rights globally, aligned to clients' portfolio objectives. Engaging our investee companies in dialogue and encouraging positive change in our clients' interests are key components of how we deliver our stewardship strategy.

Our engagement model (shown below) is built on an investment-led, expert-driven approach and leverages the expertise of more than 1,000 investment professionals around the world working in close collaboration with stewardship specialists. This is based on in-depth investment research and rigorous analysis of investee companies alongside assessment of macroeconomic drivers, sectoral factors and ESG themes.

J.P. Morgan Asset Management Engagement Model

- Governance
- Strategy alignment with the long term
- Human capital management
- Stakeholder engagement
- Climate risk



Number of engagements in 2021 on:	
837	Climate change
303	Natural resources and ecosystems
473	Social stakeholder management
947	Human capital
214	Business conduct
642	Governance
322	Executive pay
1,300+	Companies engaged

Source: J.P. Morgan Asset Management, as of December 31, 2021.

Our Philosophy & Approach continued

Our five investment stewardship priorities

We have identified five main investment stewardship priorities (below), which we believe have universal applicability and will stand the test of time. We believe these are the ESG issues that pose the most significant long-term risks and opportunities to our clients.

Within each priority area, we have identified related themes that we are seeking to address over a shorter timeframe. These themes will evolve over time. This combination of long-term priorities and evolving, shorter-term themes provides us with a structured and targeted framework to guide our investors and Investment Stewardship team as we engage with companies around the world.

Proxy voting

We vote at approximately 8,500 company meetings each year, in 80 markets around the world, and we manage the voting rights of the shares entrusted to us in the same way as any other asset. To facilitate this, we have well-established proxy voting policies and guidelines covering global markets that are overseen by a network of regional proxy committees.

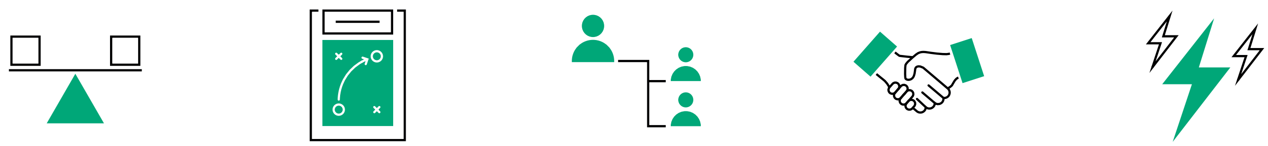
Those policies and guidelines are based on international standards and local market best practices. Our investment teams and investment stewardship specialists in the relevant regions are responsible for implementing those policies.

We apply the lens of our investment stewardship priorities in our voting decisions. Votes are used, where appropriate, to reinforce views expressed through our corporate engagement, and to vote proxies in the best interests of our clients.

For more information on our proxy voting procedures and guidelines, please see our JPMAM Global Proxy Voting and Guidelines.

For more information on our global investment stewardship approach, including engagement activities and proxy voting, please read our 2021 Global Annual Stewardship Report.

J.P. Morgan Asset Management's Five Investment Stewardship Priorities



Governance	Strategy alignment with the long term	Human capital management	Stakeholder engagement	Climate risk

Our Philosophy & Approach continued

Our sustainable product classification framework

Our broad range of sustainable solutions are designed to align with our clients' financial goals and values.

For investors that want to express their values explicitly in their portfolios, we offer a broad range of sustainable investment capabilities, shown below. We will continue to expand these options to support our clients' objectives as they evolve.

Exclusions

J.P. Morgan Asset Management does not seek to limit the investment universe, or to exclude sectors or companies through integrating ESG information into our overall investment strategy, unless specified by client guidelines, sustainable product classification guidelines or by applicable regulation.

As we continue to assess our approach, J.P. Morgan Asset Management will update existing exclusions for our dedicated sustainable strategies.

We recognize responsible investing represents a broad set of opportunities and that clients may choose to implement their views based on explicit objectives. This includes having their own list of excluded companies. With that in mind, we can provide investment solutions based on clients' tailored exclusion lists.

J.P. Morgan Asset Management Sustainable Product Classification Framework

ESG integration Systematic consideration of material ESG information as part of the investment decision-making process					
		Sustainable			
Exclusions	**ESG Promote**	**Positive Tilt**	**Best-in-Class**	**Thematic**	**Impact**
The exclusion from a fund or portfolio of certain sectors, companies or practices based on specific ESG criteria and/or minimum standards of business practice based on international norms.	A defined percentage of the portfolio is invested in positive ESG issuers/companies.	An investment style that seeks to meet its objective by maintaining a portfolio that has a measurable tilt toward companies/issuers with positive ESG characteristics vs benchmark.	Strategy that invests in a defined percentage of companies/issuers that lead in their peer groups in respect of sustainability performance.	Strategy invested in well-defined themes or assets specifically related to sustainability. Often seeking an environmental or social outcome.	Targeted investments aimed at solving social or environmental problems as well as generating financial return.
← Include values and norms-based exclusions →				May also apply values and norms-based exclusions	

Source: J.P. Morgan Asset Management, as of December 31, 2021.

As this document describes a global approach, please refer to our website and the EU SFDR Art 8 and 9 Product Disclosures for further information on our products that promote environmental and/or social characteristics or have a sustainable investment objective within the meaning of Article 8 and/or 9 of the SFDR.

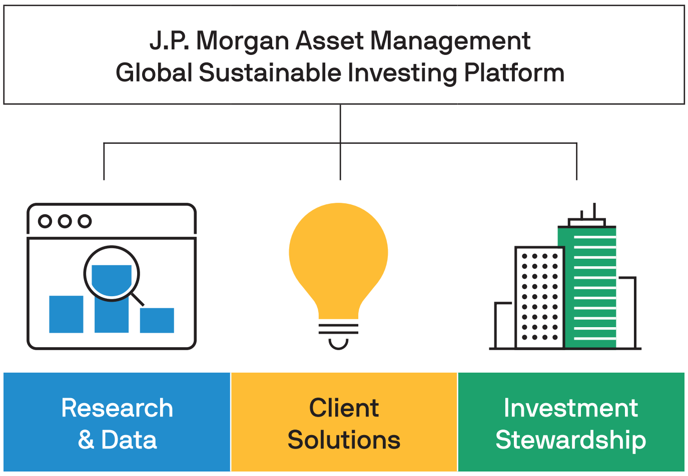
Sustainable Investing Governance & Resources

People and resources

J.P. Morgan Asset Management Global Sustainable Investing team

Jennifer Wu, Global Head of Sustainable Investing, leads our dedicated division of sustainable investing specialists. Sustainability-focused investment research, solutions development and investment stewardship fall within the team's responsibilities. As of January 31, 2022, we have 36 personnel in the Sustainable Investing division.

This dedicated team spearheads sustainable investing globally in partnership with our investment professionals. The team provides detailed global sustainable investing research and insights on thematic ESG issues, including climate change, which can be applied across all asset classes, works with clients to build and implement sustainable investing solutions and oversees our stewardship activities. Many of the Sustainable Investing team are senior staff with over a decade of experience and a broad range of skills including ESG investing and research, industry sector expertise, climate science and policy, corporate governance and data science.



- **Research & Data**: This pillar is focused on developing proprietary ESG and climate modeling and research by partnering with data scientists, research analysts and portfolio managers to enhance our investment capabilities and product innovation.
- **Client Solutions:** This pillar provides ESG expertise to design and build sustainable investment products and customized client solutions, engages with clients to help them meet their ESG objectives and partners with a broad range of functions and teams to advance our sustainable leadership through education and commitment to ESG standards.
- **Investment Stewardship:** This pillar defines and directs company- and industry-level engagement on our five global stewardship priorities (see page 9), including providing ESG expertise for our broader investment-led engagement efforts, and exercises our voting rights globally, aligned to clients' portfolio objectives.

Sustainable Investing Governance & Resources continued

Sustainable investing governance

In 2021, J.P. Morgan Asset Management established the **Sustainable Investing Oversight Committee (SIOC)** to enhance the governance of our sustainable investing activities, including our stewardship oversight.

SIOC provides ongoing strategic oversight, effective decision-making and review and assurance across the key components of sustainable investing. This includes engagement, proxy voting, sustainable investments criteria, oversight of ESG integration, oversight and review of implementation plans for the firm's commitment to the Net Zero Asset Managers Initiative and regulatory developments.

Accountability for ESG starts at the top of our business:

- Strategic oversight of sustainable investing activities is provided to SIOC by the Chief Investment Officers (CIOs) and the Global Head of Sustainable Investing through their participation in day-to-day management meetings across their asset classes and with senior management.
- When required from a controls and risk oversight perspective, formal escalation from SIOC is to the **Global Asset Management Business Control Committee (AM BCC)**. The committee provides oversight of the operational risks and control environment across J.P. Morgan Asset Management. This ensures proper identification, management and monitoring of existing and emerging operational risks, control issues and trends.

The diagram below provides an overview of J.P. Morgan Asset Management's sustainable investing governance structure.

J.P. Morgan Asset Management's Sustainable Investing Governance Structure

Global AM Business Control Committee (AM BCC)

- Formal escalation from SIOC must be to AM BCC where/when required from a controls and risk oversight perspective and as determined by the SIOC/Chair

AM Reputational Risk Committee

- Escalation of any potential reputational risk issues across all lines of business globally

Sustainable Investing Oversight Committee

- Oversees, advises and supports effective SI activity across four core areas led by SI specialists in partnership with AM
- Monitors policies, procedures and regulatory environment for SI and investment stewardship
- Review, assurance and escalation of SI activity across the four core areas
- Reviews and approves regulatory submissions as applicable
- Membership: AM CIOs, Control functions, Global Head of Sustainable Investing (chair), Heads of Investment Stewardship. Other attendees: SI team, Distribution

Corporate engagement	Proxy voting	Sustainable investments criteria	ESG integration	Net Zero Asset Managers Initiative

Regional committees and topic-specific working groups

Source: J.P. Morgan Asset Management, as at December 31, 2021.

Sustainable Investing Governance & Resources continued

Sustainable investing working groups

J.P. Morgan Asset Management has an internal network of peer advisory working groups to further support global leadership in sustainability.

These working groups connect subject-matter experts across our platforms, allowing them to exchange sustainable investing skills and knowledge. They include senior investment professionals, fundamental and quantitative investment research analysts, Sustainable Investing team members, investment risk specialists and client-facing team members.

- **ESG Data & Research Working Group**: This group develops our firm-wide ESG materiality framework, including reviewing our ESG integration investment process and making recommendations to our Sustainable Investing Oversight Committee (SIOC). This group also advises on the development of ESG-related research methodologies and on our proprietary data-driven ESG scoring system, which has been made available internally to investment professionals across the firm to enhance ESG insights in our investment processes.
- **Sustainable Investing Client Strategy Working Groups**: These cross-regional groups contribute to client outreach and education initiatives related to sustainable investing, including advancing thought leadership programs.
- **Climate Research**: Reflecting our significant ongoing focus on deepening our climate research, investment and analytical capabilities, we established a Climate Research sub-working group of our ESG Data & Research Working Group. It focuses on reviewing and making recommendations for climate-related data and scenarios to be included in the development and advancement of our proprietary climate analytics, as well as models for portfolio management and reporting.

Sustainable Investing Research & Data Capabilities

With the rise of ESG disclosures, big data and advanced technologies, which enable us to better understand how sustainability-related issues impact financial outcomes, we are doing even more to help clients navigate ESG considerations and build stronger portfolios.

As part of J.P. Morgan Asset Management's approach to integrating ESG factors into our investment process, we combine fundamental research with external and proprietary ESG data analytics. Across our platforms, we have a strong focus on developing in-house fundamental and quantitative research capabilities.

We have developed and continue to enhance a robust range of company-level ESG data tools for our investment teams. While data from external ESG ratings providers is an important input, we do not rely solely on them and have developed our own proprietary analysis.

Fundamental ESG research

The insights and expertise of our global research analysts are at the heart of our understanding of the businesses in which we invest. Our ESG views of specific companies are the product of our proprietary research as well as one-on-one engagements with companies. The breadth and depth of our internally developed research capabilities enable us to assess the ESG credentials of businesses in which we invest with global consistency.

More detailed information on our approach to ESG integration across our global investment teams is available in our ESG Integration paper.

Quantitative ESG research

J.P. Morgan Asset Management has developed an internal use proprietary data-driven ESG score[3] as an additional input in our company analysis. This score is based on identifying key ESG factors across around 80 sub-industries. It also leverages third-party ESG data to complement and challenge our fundamental research. The score provides J.P. Morgan Asset Management's portfolio managers and research analysts with additional useful underlying ESG information, which they might not otherwise have access to, to facilitate ESG integration and investment stewardship.

We have invested significantly in our data infrastructure to draw on the best-available data for each issue we assess, including over 12 external data providers as part of our assessments. The materiality incorporated in the score reflects the insights of hundreds of sector analysts with many years of experience identifying financially material ESG risks.

Reflecting the rapid improvement in the quantity and quality of ESG-related data available to investors, we are also leveraging our data science capabilities, such as machine-learning algorithms and natural language processing, to generate meaningful insights to enrich our understanding of ESG factors.

Our proprietary data-driven ESG research and data-driven score will continue to complement our qualitative analyst research, which provides valuable insights into hard-to-quantify issues and important forward-looking perspectives.

[3] Identification and evaluation of financially material ESG factors involves specific analysis and judgement. To the extent that J.P. Morgan Asset Management relies on third-party providers, the criteria and rating systems used by third-party providers can differ significantly. There is not a standard ESG scoring system and the methodology and conclusions reached by third-party providers may differ significantly from those that would be reached by other third-party providers or J.P. Morgan Asset Management. In addition, evaluations by third-party providers may be based on data sets and assumptions that are insufficient, of poor quality or contain biased information. With respect to J.P. Morgan Asset Management's proprietary systems, while J.P. Morgan Asset Management looks to data inputs that it believes to be reliable, J.P. Morgan Asset Management cannot guarantee the accuracy or completeness of its proprietary system or third-party data. Under certain of J.P. Morgan Asset Management's investment processes, data inputs may include information self-reported by companies and third-party providers that may be based on criteria that differs significantly from the criteria used by J.P. Morgan Asset Management. In addition, the criteria used by third-party providers can differ significantly, and data can vary across providers and within the same industry for the same provider.

Advancing Sustainable Investing Solutions for Our Clients

An investment framework for facilitating the transition to a sustainable and inclusive economy

In 2021, to guide our growing suite of outcome-driven investment products for clients seeking dedicated sustainable solutions, J.P. Morgan Asset Management's Sustainable Investing team created the Sustainable and Inclusive Economy (SIE) Framework to enable these products to facilitate the intentional deployment of outcome-driven capital at scale.

The framework identifies seven environmental and social challenges, which we consider most critical for achieving the sustainability outcomes that drive the transition to a more sustainable future:

1) Preserving biodiversity.
2) Managing climate risk.
3) Constructing resilient transportation/infrastructure.
4) Ensuring responsible production and consumption.
5) Building inclusive digital infrastructure.
6) Enhancing health and well-being.
7) Fostering social advancement.

The framework also identifies a range of sustainable business activities that help solve each environmental and social challenge. These sustainable business activities, or investable themes, form the building blocks for each pillar of our SIE Framework. In turn, they are aligned with specific SDGs and must, as a consequence, be assessed using targeted sustainability metrics.

The SIE framework has over 300 sustainability indicators, sourced from internal and external sources, to link sustainability indicators to the sustainability outcomes these investment solutions seek.

The Sustainable and Inclusive Economy Framework

As active investors, we undertake a bottom-up analysis of the companies we invest in. This approach ensures investments in our outcome-driven product suite sufficiently contribute to the sustainability outcomes we seek.

For this, we use J.P. Morgan Asset Management's Sustainable Investment Inclusion Criteria, a multi-dimensional lens through which we scrutinize companies' products, services and operational efficiency to derive a holistic understanding of their degree of sustainability.

J.P. Morgan Asset Management's SIE Framework and the Sustainable Investment Inclusion Criteria together offer quantitative and qualitative assessments to identify the corporate leaders that are offering solutions for key global environmental and social challenges.

These frameworks form the foundation for how we conduct portfolio construction and undertake security selection on investments within the outcome-driven suite of investment solutions as part of our dedicated sustainable strategies.

Please see our SIE Framework paper for more information.

Advancing Sustainable Investing Solutions for Our Clients continued

Global challenges	Sustainable business activities that help to address these challenges		Intended outcomes	UN SDG alignment
Preserving biodiversity	Material sourcing focusing on ecological risk, water and waste management Land, marine & biodiversity management Protection and restoration Pollution and air quality Reforestation/deforestation Sustainable agriculture Environmentally sustainable agriculture	Environmentally sustainable animal husbandry Climate-resistant agriculture Sustainable food	Sustainable ecosystems	12 RESPONSIBLE CONSUMPTION AND PRODUCTION 14 LIFE BELOW WATER 13 CLIMATE ACTION 15 LIFE ON LAND
Managing climate risk	Information support systems Conversion equipment Climate research and development Low-carbon technology Negative emission technologies Storage Climate change adaptation Energy transition management Renewable energy use			11 SUSTAINABLE CITIES AND COMMUNITIES 13 CLIMATE ACTION
Retrofitting and constructing resilient transportation/ infrastructure	Sustainable transportation (electric vehicles, sustainable trains/airplanes, etc.) Autonomous vehicle companies Infrastructure for new transportations Low-carbon economy infrastructure Energy efficiency Mass transit initiatives Railway transition	Waterway transportation Passenger car alternatives Electric and hybrid vehicles Infrastructure for clean transportation		7 AFFORDABLE AND CLEAN ENERGY 11 SUSTAINABLE CITIES AND COMMUNITIES 9 INDUSTRY, INNOVATION AND INFRASTRUCTURE 13 CLIMATE ACTION
Ensuring responsible production and consumption	Production of goods that ensure transition to a circular economy End-of-life management in product design Recycling and reuse Sustainable supply chains Sustainable material sourcing Preservation of natural resources	Cradle-to-cradle design Second life retailing		12 RESPONSIBLE CONSUMPTION AND PRODUCTION

Advancing Sustainable Investing Solutions for Our Clients continued

Global challenges	Sustainable business activities that help to address these challenges		Intended outcomes	UN SDG alignment
Building inclusive and digital infrastructure	Cyber security research and development Data protection program research and development Physical and cloud-based data management enhancement Data privacy enhancement	Network resilience and data backup assurance Enhancing access to digital infrastructure	Equal opportunities	9 INDUSTRY, INNOVATION AND INFRASTRUCTURE 16 PEACE, JUSTICE AND STRONG INSTITUTIONS
Enhancing health and well-being	Toxic material removal Clean water provision and water sanitation services Infrastructure for clean water and water loss prevention Nutritious meal provision Protein-rich diet food development Nutrient supplement research and development	Food delivery systems for food security assurance Preventative medicine services Hygiene enhancing solutions		2 ZERO HUNGER 3 GOOD HEALTH AND WELL-BEING
Fostering social advancement	Promoting equal employment opportunities Promoting equal educational opportunities Promoting equal leadership opportunities Promoting equal financing opportunities: small and medium enterprise financing Microfinance program development	Educational financing services for affordable education Housing affordability programs Protection of workers' rights		1 NO POVERTY 4 QUALITY EDUCATION 5 GENDER EQUALITY 8 DECENT WORK AND ECONOMIC GROWTH 10 REDUCED INEQUALITIES

Source: For illustrative purposes only. The sustainable business activities detailed here are intended as references only and may not align with any jurisdiction-specific regulatory definition. This framework may change over time.

Sustainable Themes in Focus

By developing insights on strategic long-term trends and understanding their impact on investment, we can play a critical role in creating value for our clients. In this section, we provide more context on how our sustainable investment approaches have developed around key themes that are important to our firm, clients and stakeholders. We also provide examples of how we conduct our investment management and stewardship responsibilities.

Human capital management and human rights

We acknowledge the Guiding Principles on Business and Human Rights (also known as the Guiding Principles) as the recognized framework for corporations to respect human rights in their own operations and through their business relationships. We actively engage with stakeholders, peer financial institutions and others in developing guidance on how to appropriately apply the Guiding Principles.

Why we care about human capital management and human rights

Effective human capital management (HCM) is critical to an engaged and productive workforce.

A growing number of investors believe that how a company manages its employees is material to long-term performance and risk mitigation. It is also a key aspect of integrated business reporting, which unifies financial and non-financial risk disclosures.

HCM is an important driver of long-term value creation. Poor management can create legal liabilities and undermine a company's relationship with its stakeholders. Investors can best appreciate a company's approach to HCM if it is explained in the context of the firm's business strategy.

The COVID-19 pandemic has deepened our conviction that human capital is one of a company's most valuable assets. Those with sustainable business practices, particularly those focused on supporting their employees' needs, demonstrated greater resilience throughout the pandemic. With technology rapidly adapting to accommodate shifting hybrid work patterns, companies have had to invest in solutions to keep their businesses running at a normal pace.

Failure to manage human capital risks and opportunities can affect critical relationships with a company's workforce and potentially impact shareholder value.

As a long-term investor, we will continue to advocate for robust human capital practices and improved disclosures, including around **diversity in the workplace.**

Human rights as a key aspect of human capital management

According to the United Nations, human rights are inherent to all human beings and cover a wide range of salient issues. The International Labor Organization (ILO) Declaration of Fundamental Principles and Rights at Work covers the freedom of association and the effective recognition of the right to collective bargaining, the elimination of discrimination in respect of employment and occupation.

When we engage with companies on human capital management, we also engage on human rights. This covers companies' practices relating to health and safety, training and employee compensation and incentives and well-being. We engage on this topic beyond companies' direct operations to their supply chain management.

An active ownership approach to human capital management and human rights

In line with our human rights policy and Modern Slavery Group Statement, which are accessible on JPMorgan Chase & Co.'s dedicated human rights website, we respect the protection and preservation of human rights guided by the principles established in the United Nations Universal Declaration of Human Rights.

For listed equities and fixed income, our due diligence and engagement on human capital management and human rights is supported by J.P. Morgan Asset Management's proprietary data-driven ESG score and our proprietary fundamental research.

Both data-driven insights and qualitative research cover aspects such as companies' labor relations management, impact on health, supply chain management and digital rights. These insights help us identify potential negative outcomes for people and prioritize our engagement efforts on these topics.

Sustainable Themes in Focus continued

We conduct reactive engagements after related controversies take place and also proactive engagements with companies and sectors that are flagged as potentially vulnerable to these issues by both our quantitative and qualitative research.

Our global coverage enables our engagement efforts with both upstream and downstream companies, from suppliers of raw materials to branded companies.

We also monitor companies identified by third-party vendors as contravening the UN Global Compact Principles in certain portfolios. This assists us to identify human rights abuses, including labor rights, child labor, environment and anti-corruption issues, to focus our engagement and to trigger more extensive engagement with portfolio companies.

Our engagement approach with these companies is dynamic depending on their preparedness and management around these issues. Focus areas often include:

- Establishing board and/or senior executive-level oversight of human capital management, and setting a diversity and inclusion strategy.
- Establishing processes to assess HCM/human rights-related legal risks and potential breaches of international norms.
- Disclosing time-series quantified human capital data based on recognized frameworks.
- Conducting a regular audit and obtaining external assurance for companies' labor/social practices.

Collaborating to advance the social agenda

We are active in industry initiatives that advocate human capital management and human rights. For example, on diversity, equity and inclusion, we are a member of 30% Club Investor Group in the UK, Hong Kong and Japan. We support the long-term voluntary target of 30% female representation at the board level.

We also co-signed an investor letter on conflict minerals and responsible sourcing through the Principles for Responsible Investment (PRI). Together with 159 other investors, we are calling on technology companies to develop and invest in solutions to improve traceability, increase transparency and report on minerals from mine to product, encourage and participate in industry-wide collaboration to improve industry practices and impose and enforce harsher sanctions for non-compliance.

We may collaborate in other relevant industry initiatives where we feel their objectives align with our stewardship priorities and where industry engagement may help increase our leverage to engage with investee companies.

Voting on human capital management and human rights

An engaged and diverse employee base is integral to a company's ability to innovate, to respond to a diverse customer base and to engage with the diverse communities in which it operates, thus delivering shareholder returns. J.P. Morgan Asset Management will generally support shareholder resolutions that seek corporate disclosure of data on workforce demographics, including diversity, where the current level of disclosure is deemed inadequate.

We expect engaged boards to provide oversight of companies' human capital management and human resources policies, including codes of conduct, use of full-time versus part-time employees, workforce costs, employee engagement and turnover, talent development, retention and training, compliance record and health and safety.

We will vote case by case on shareholder resolutions seeking specific disclosure of human capital management. Further, we generally vote against shareholder proposals seeking human capital management information that is considered confidential or sensitive information by the board.

Sustainable Themes in Focus continued

Climate change

Why we care about climate change

Climate risk is an investment risk. With global temperatures on track to increase by more than three degrees by the end of the century, shifts in public climate policy could begin to accelerate within our 10- to 15-year investment horizon. Therefore, as part of our investment decision-making process, we assess the risks and opportunities emerging from the transition to a low-carbon economy, as well as the physical risks.

Policymakers are the key driver of change in the transition. They provide both carrots-based incentives to encourage investment, research and development and sticks-based measures, such as carbon pricing schemes.

Companies may be impacted by the transition via changes to their:

- Asset profile and product offering, due to declining demand for less climate-friendly products.
- Cost structure, due to exposure to carbon prices or high fixed-operating costs.
- Business model, as they are forced to shift production to low-carbon alternatives.
- Cost of capital, as climate-related risks are increasingly priced in by investors.

We have made significant investments in our climate-related investment capabilities and enhanced our efforts to help clients consider the material implications of climate change within their portfolios.

Our research and analysis suggest the transition to a net-zero world will have an enormous, but uneven, impact, in terms of opportunity and risks, both across and within industry sectors. Therefore, as investors for our client accounts, J.P. Morgan Asset Management has an important role in identifying and investing in companies that will benefit from the opportunities emerging from this rapid shift to a low-carbon world and identifying the risks of investing in companies still unprepared to make that transition.

J.P. Morgan Asset Management's commitment to Net Zero

In November 2021, J.P. Morgan Asset Management became a signatory to the Net Zero Asset Managers initiative (NZAMI). As a signatory, we have committed to support investing that is aligned with the goal of net-zero greenhouse gas emissions by 2050 or sooner. This commitment includes:

- Engaging with clients to accelerate the global low-carbon transition to net zero within their portfolios.
- Setting interim targets within the next 12 months for assets that we determine could be appropriately managed in line with net-zero pathways.
- Continuing to accelerate our corporate engagement and stewardship, and policy advocacy consistent with net-zero ambitions.

While thoughtful governmental policy, investments in low-carbon technologies and collaboration between the public and private sectors are all prerequisites for transitioning to a low-carbon world, we are pleased to play our part in identifying solutions by working with our clients to develop products and solutions consistent with a net-zero ambition.

Establishing the baseline

Investors, asset managers and asset owners are increasingly required by regulators and standard setters to measure, report and manage their greenhouse gas emissions against carbon metrics-related international standards. The availability and consistent use of climate-related data is being streamlined and standardized as investors, governments and stakeholders increasingly seek comparable information.

J.P. Morgan Asset Management is building research specifically focused on how to identify companies that are more climate resilient and better prepared for the transition to a greener and low-carbon economy. Emissions data is backward-looking rather than forward-looking, and incorporating future climate change risk analysis is essential for long-term investors. Therefore, research into appropriate carbon metrics is becoming essential.

Sustainable Themes in Focus continued

We conducted an evaluation of current standards in this rapidly evolving landscape, including reviewing the current state of greenhouse gas emissions accounting, and clarified the main types of exposure metrics and how each should be used.

Understanding these carbon metrics and their application is an important first step for investors to assess the carbon intensity of their portfolios. It helps investors create a baseline carbon footprint against which to measure improvements and/or decarbonization goals over time.

For more information, see our paper Understanding carbon exposure metrics.

An active ownership approach to climate risk

Climate risk is one of our five global investment stewardship priorities (see page 9). We leverage our shareholder rights proactively through direct engagement with companies on climate change risks and opportunities. Our approach to engagement on climate risk is to focus on sectors and companies we believe pose the greatest material risk to our clients' investments.

For example, climate risk is a material factor for the energy sector. We recognize that fossil fuels will remain a substantial component of the energy mix in almost all scenarios looking to 2050. However, energy companies that do not recognize and adapt to the transition to a low-carbon economy could destroy significant value.

Through our engagement on climate change, we ask companies with whom we engage to set targets against which management can be held accountable, to form robust strategies and to disclose consistently and transparently on progress in line with the recommendations of the Task Force on Climate-Related Financial Disclosures (TCFD).

We applaud companies for setting ambitious, long-term, net-zero targets. However, intention alone is not enough. We seek more disclosure on the scope of greenhouse gas emissions included in such targets, and encourage companies to set intermediate-term targets and strategies to which management should report periodically.

For more information, please see our approach to climate change votes.

Our engagement with companies varies by region and size of company. Engagement with companies that have already set agendas to dramatically reduce emissions typically focuses on gaining greater granularity on the strategy and financial planning underlying these ambitions.

In regions where companies are more conservative, engagement tends to focus on the rigor of companies' targets and encouraging companies to consider their resilience under a range of different future scenarios.

The key aspects of our engagement focus with companies include:

- Establishing a climate transition strategy, which is embedded into company strategy, ensuring it is overseen at the highest levels of the organization.
- Encouraging companies to take actions on climate change aligned with business model environmental materiality.
- Encouraging companies to set a strategy (including targets and pathways) that is grounded in the science underpinning the Paris Agreement.
- Reporting transparently on the implementation of companies' low-carbon transition strategies.

Taking an active community role – collaborating to achieve climate goals

J.P. Morgan Asset Management is actively involved in investor networks focused on climate change. We believe that collaborating with investors and stakeholders that align with our goals can help reinforce and, where needed, amplify our engagement efforts. As part of our investment stewardship, we actively conduct independent engagement but recognize the importance and value of working with industry and community partners.

We continually review organizations that will enable us to make progress on reaching our climate goals. For example, currently J.P. Morgan Asset Management is a member of the Asia Investor Group on Climate Change (AIGCC) and Institutional Investor Group on Climate Change (IIGCC).

Sustainable Themes in Focus continued

Natural capital and biodiversity

Why we care about conservation of natural capital and biodiversity

Natural capital can be defined as assets in nature including soil, air, water and living things. These assets combine to form the world's natural ecosystems, which are critical to supporting physical and economic health. The overexploitation of natural capital is threatening biodiversity, people and businesses.

Biodiversity loss and climate change are interlinked. Climate change is contributing to bush fires, floods, droughts and other natural disasters, which impact the habitats of various species, while the destruction of ecosystems limits nature's climate resilience.

Deforestation and related changes to land use have reduced the carbon our land can absorb. Forests are home to more than half of all terrestrial species and support the livelihoods of millions of people, as well as play a critical role in sequestering carbon.

The burning of fossil fuels and the discharge of other chemical pollutants has also impacted the carbon storage capacity of the ocean. Weakened capability of carbon sinks, such as the world's oceans and forests, compromises the ability to mitigate global warming.

The "Post-2020 Global Biodiversity Framework" proposed by the UN Convention on Biological Diversity states an ambition "to stabilize biodiversity loss by 2030 and allow the recovery of natural ecosystems in the following 20 years, resulting in net improvements by 2050."

An active ownership approach to natural capital and biodiversity

We are advancing our understanding of what nature and biodiversity risks our investee companies have and how they manage them.

Companies insufficiently accounting for these risks could face financial, reputational and regulatory challenges as well as operational risks, such as discontinuation of operations due to suspension of licenses or depletion of resources upon which they rely.

However, there are also business opportunities for companies helping to produce solutions to mitigate natural capital and biodiversity risks.

To further our understanding of the topic, we engage with our investee companies to understand how they are exploring natural capital-related risks and opportunities. Focus areas for engagement are:

- Identifying the natural resources a company depends on and to assess the materiality of these resources to its businesses.
- Identifying a company's direct impact on the natural ecosystem and the measures it can take to mitigate the impact.
- Understanding a company's supply chain's indirect dependencies and impacts on natural capital.
- Defining relevant targets on natural capital that are specific, measurable, achievable and time-bound.
- Reporting on progress to demonstrate outcomes.

Collaborating to facilitate the sharing of insight

Collaboration with like-minded peers and stakeholders is critical for influencing companies on their footprint in the ecosystem, given that natural capital and biodiversity loss are market-wide and systemic risks. Therefore, we work with our peers, clients and other stakeholders to engage with regulators, non-profit organizations and government bodies.

Our parent company, JPMorgan Chase & Co., is a forum member of the Taskforce on Nature-related Financial Disclosures (TNFD). This is a new international framework to guide reporting and management of natural capital-related risks and to align with global targets of "no net loss by 2030 and net gain by 2050," as stated in the zero-draft Global Biodiversity Framework issued by the Convention of Biodiversity.[4]

We continue to monitor the evolving international reporting framework on this topic and to explore new data sets and tools to assess our investee companies' exposure to the risks and opportunities.

Voting on natural capital and biodiversity

While shareholder proposals have been brought related to disclosure or management of water risks, deforestation and other specific natural capital-related issues, the topic remains relatively nascent. We continue to develop our understanding of the topic and to refine our position.

[4] TNFD (2021). Nature in Scope.

Sustainability in Our Business

J.P. Morgan Asset Management is committed to sustainability across our investment processes as well as throughout our own business and operations. Sustainability as a key element of our corporate strategy is reflected in our culture and our approach to diversity, equity and inclusion.

Our commitment to Diversity, Equity and Inclusion (DEI)

J.P. Morgan Asset Management reflects the longstanding culture of Diversity, Equity and Inclusion (DEI) of our parent company JPMorgan Chase & Co. We strive to build a culture of respect and inclusion where our employees, clients and partners feel welcomed and valued.

We are committed to remaining a first-class, sustainable business, and a top destination for talent and clients. To deliver that commitment, we work closely with active internal committees, such as our AM Advisory Council, to establish a clear action plan to achieve our objectives and ensure transparency in communicating our progress. This includes:

- **Increasing accountability**: Incorporating diversity and inclusion in the year-end review process for all employees and measuring managers' progress in building resilient, diverse and inclusive teams.
- **Increasing our focus on hiring and retaining diverse talent**: This includes having more diverse candidate panels, implementing focused hiring programs to broaden recruitment and expanding sponsorships and mentoring.

Today at J.P. Morgan Asset Management, 25% of our fund managers globally are women who are collectively managing or co-managing 39% of our total global assets. Citywire 2021 Alpha Female Report ranked us #1 globally for having the longest average female fund manager tenure with double the industry average for female fund managers.

We are also engaged with our communities, notably through J.P. Morgan Asset Management's Project Black and Project Spark.

Project Black is a USD 200 million initiative to help close the racial wealth gap by investing in middle-market, minority-owned businesses to develop a new class of Black and Latinx entrepreneurs. Project Spark, chaired by the head of our Alternatives Solutions Group, is investing firm capital in, and providing guidance to, emerging alternative assets managers, including minority and women-led venture capital and private equity funds.

Operational sustainability

As part of our parent company JPMorgan Chase & Co, J.P. Morgan Asset Management is committed to minimizing the environmental impact of our physical operations as an important part of our overall sustainability strategy. This includes having achieved carbon-neutral operations in 2020. These efforts support our commitment to operating responsibly, enhance the resiliency of our firm and reduce costs.

For more information on these efforts at our parent-company level, as well as the JPMorgan Chase & Co. commitment to overall operational sustainability, please read our JPMC Corporate Sustainability webpages.

For more information, please speak to your J.P. Morgan Asset Management representative.

LV–JPM53533 | 04/22 | 09j0221702092913