Bristol Myers Squibb™

2023 Climate Change Report

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Strengthening our business resilience

By better understanding how our business is impacted by climate change, we can strengthen our business resilience and continue to provide patients with the life-saving medicines they need.

Background

Strengthening business resilience and reducing our environmental impact

Climate change poses operational, regulatory and commercial risks to our company and the broader pharmaceutical industry. There are a variety of impacts that climate change can have on the industry, including disruption to global supply chains that are necessary to deliver medicine, access to water, increased climate-related effects on human health and more.

Bristol Myers Squibb (BMS) has been in the life sciences business for over 135 years and has been a company focused on the wellbeing of our patients and the communities we live in and serve. BMS is committed to increasing our understanding of climate change because we believe strategically incorporating climate risks into our decision-making makes us competitive and resilient. To help incorporate certain material climate-related risks and opportunities into strategic decision-making, BMS conducted a climate scenario analysis. This scenario analysis enhances our short- and long-term ability to strengthen our operations and ensure they are resilient to intensifying natural disasters and changing weather patterns so we can provide patients with the medicines they need.

Although BMS alone cannot determine the outcome of global climate action, we are making strides to reduce our impact on the planet by setting bold and ambitious environmental goals and adding innovative enhancements to our operations. We are also using our influence as a market leader to partner with peers and suppliers on overcoming the challenges of decarbonizing the pharmaceutical industry while ensuring a high-quality and uninterrupted supply of medicines globally.

Importance of the Task Force on Climate-related Financial Disclosures

Today, climate change and the transition to a low-carbon economy expose all organizations to emerging risks and opportunities. Therefore, assessing these risks and opportunities has become crucial for us and our investors. The Task Force on Climate-related Financial Disclosures (TCFD) was thus created to increase understanding of financial market implications associated with global climate change.

This report presents BMS initial assessment and details the actions the company is taking to limit the impact of climate change. The report contains four key sections in alignment with the TCFD's recommendations: Governance, Strategy, Risk Management, and Metrics and Targets. Through the disclosures within these sections, we aim to improve the reporting of our approach to managing climate-related risks and opportunities.

With changing stakeholder expectations and evolving regulatory requirements, we recognize the importance of regular climate risk assessments. The findings presented in this inaugural TCFD report will change and grow as our own understanding of climate-related risks and opportunities improves over time.

Bristol Myers Squibb has **operations worldwide,** exposing us to potential acute and chronic physical climate-related hazards and changing climate-related government regulations, geopolitical issues, investment strategies and consumer decisions. We will continue to strengthen our **business resilience** to **mitigate potential risks** posed by climate change.

Executive summary

Resiliency refers to how a company's strategy supports and maintains a company's capacity to survive, adapt and grow in the face of turbulent change under different climate-related scenarios.

BMS identified two physical risks which are associated with three acute hazards (severe thunderstorm, wildfire and extreme wind speed) and three chronic hazards (drought, extreme heat and coastal flooding). In addition, BMS also indentified four transition risks, as well as two opportunities relevant to our assets and operations. We used the latest climate models from the United Nations (UN) Intergovernmental Panel on Climate Change (IPCC) for our climate risk assessment. The IPCC identifies several scenarios to describe the future state of the world based on demographic and socioeconomic activities and predicts greenhouse gas emissions associated with such developments. For our analysis, we chose a Low Carbon Economy (LCE) and a High Emissions (HE) scenario to analyze our risks and opportunities in a world where there is legitimate global climate action against one where there is very little or no global climate action, respectively.

Our analysis highlights that BMS' exposure to physical climate-related risks is greater under a High Emissions scenario across time horizons, while our exposure to transition risks is greater in a Low Carbon Economy, especially in the short and medium term. The exposure to physical climate-related risks will also vary by region. In addition, we identified opportunities to continue investing in renewable energy and energy-efficiency measures to increase our savings, reduce global emissions and reach our Net Zero emissions targets. These climate-related risks and opportunities are summarized in Table 1.

We have an established process for integrating climate risks within our enterprise risk management (ERM) framework that prioritizes climate-related actions based on our business objectives. The Enterprise Risk Committee (ERC) is leading our ERM governance by establishing cross-functional responsibilities related to risk management. We have also identified several metrics and targets described in our ESG report to manage our progress toward climate risk management, mitigation and resiliency.

As part of this TCFD report, the climate risk climate risk assessment helps us understand the future impact of climate change on our business and operations. This will strengthen our policies, programs and practices by helping us prepare for risks posed by climate change.

Table 1: Climate-related risks and opportunities overview

Risk or opportunity	Risk/opportunity description	Business impact*
Physical risk: **Acute**	Increased severity and frequency of extreme weather events such as hurricanes, wildfires, thunderstorms and other severe weather events	Operations
Physical Risk: **Chronic**	Chronic physical risks and shifting climate patterns such as rising mean temperatures, changes in precipitation patterns, variability in weather patterns, and sea level rise	Operations
Transition Risk: **Market**	Increased supply chain and operations costs and disruptions due to extreme weather events and chronic physical risks	Distribution
Transition Risk: **Market**	Water scarcity: Increased cost and decreased availability of raw materials used in manufacturing and packaging	Procurement
Transition Risk: **Market**	Wood pulp: Increased cost and decreased availability of raw materials used in manufacturing and packaging	Procurement
Transition Risk: **Policy and Legal**	Carbon pricing exposure increases due to a change in policy requirements	Operations
Opportunity: **Energy Source**	Use of lower-emission sources of energy and participation in renewable energy programs	Procurement
Opportunity: **Resource Efficiency**	Adoption of energy-efficiency measures to reduce the carbon intensity of facilities	Operations

**In addition to business impact, additional expenditure (CapEx and/or OpEx) may be required to address the identified climate risks and opportunities.*

Governance

BMS Climate governance structure

Our climate risk strategy is tied directly to our enterprise-wide strategy and is overseen by our Board of Directors through the Audit Committee and Committee on Directors and Corporate Governance (CDCG). As such, our governance model ensures that the Board of Directors, led by our Board Chair, has direct insight into our climate-related issues. The Audit Committee of the Board regularly reviews our reporting practices, and the CDCG is accountable for oversight of our environmental, social and governance (ESG) opportunities, risks, and relevant disclosure including matters related to our climate risk reporting, strategy, goals and targets.

Risk Management and Our Enterprise Risk Management Program help us identify and manage risks and opportunities, to protect and create value for our stakeholders. BMS' ERM governance and reporting practice is led by our cross-functional Enterprise Risk Committee (ERC) whose remit includes legal and regulatory compliance and upholding our principles of integrity. The ERC, along with the relevant subcommittee, also provides ongoing updates to our leadership team and Board regarding our company's enterprise risk profile and risk mitigation strategies.

In 2022, we established our ESG Council (Council), a cross-functional management committee that reports to our CEO, our Leadership Team (the BMSLT) and the CDCG to assist in developing and executing our company's overall ESG strategy. The Council members bring expertise from their respective areas and help raise awareness and achieve alignment on both managing risks and activating opportunities related to ESG. The Council serves as BMS' primary governance body for all ESG matters and is led by the Vice President of Purpose and ESG in our Corporate Affairs practice. In addition, in 2022, we bolstered our ESG oversight by publishing our ESG Governance Operating Model. This model outlines our approach to ESG and defines roles and responsibilities related to sustainability matters at both the Board and management levels. It also communicates details about our ESG Council's structure and charter, further aligning our sustainability strategy with our business strategy, and promoting accountability.

The Council meets regularly and operates under a formalized process and protocols, including a dedicated ESG Council Charter. The Council oversees the work of BMS' ESG Working Teams, which report to the ESG Council and are responsible for advancing our respective ESG initiatives. The Council reviews and supports progress against our ESG goals, which serve as key performance indicators of our ESG performance. Finally, the Council is responsible for providing regular updates to the CDCG and full Board to help ensure directors are apprised of material matters related to ESG and provides recommendations on ESG-related decision points to the CDCG and the full Board from time to time.

The Global Head and VP of Environmental, Occupational Health, Safety and Sustainability (EOHSS) is the head of the Climate Change and Emissions ESG Working Team, accountable for climate risk-related strategy development and operational execution. Additionally, the VP of EOHSS is responsible for assessing the climate-related impact on the business.

Management's role in assessing and managing material climate-related risks and opportunities

Climate-related risks and opportunities relevant to BMS are reviewed by the BMSLT and considered in BMS' internal strategy and decision-making processes. This enables us to identify, assess, prioritize and address climate-related risks. Refer to the Risk Management section for details. BMS has also incorporated climate-related metrics and targets into its core business processes, including the achievement of annual greenhouse gas (GHG) emission targets into the BMS Company Annual Shared Objectives. GHG emissions reduction targets are reflected in the performance appraisal process and annual bonus plans for the executive leadership and all other BMS employees.

Strategy

Our approach to climate risk management

We began our climate risk management process by developing a universe of climate-related risks and opportunities to consider for scenario analysis. Using our climate risks and opportunities universe as a baseline, we engaged with BMS business leaders across multiple business functions, including finance, human resources, operations and manufacturing, to understand their perspectives and prioritize climate-related risks and opportunities for scenario analysis.

We conducted a quantitative and qualitative scenario analysis to understand the impact of the top material climate-related risks and opportunities for the business. The results of the scenario analysis will be directly integrated into our enterprise risk management framework. The analysis will also help integrate climate change into our short-, medium- and long-term strategic and financial decision-making.

An asset-level scenario analysis was conducted across global BMS-owned and third-party facilities to evaluate the impact, hazard exposure and likelihood of the physical and transitional climate hazards. The analysis was conducted across short-, medium- and long-term time horizons: 2025, 2035 and 2050. These time horizons were chosen to align with our Net Zero and short-term Science Based Targets initiative (SBTi) goals.

In our analysis, we selected two scenarios aligned with IPCC Representative Concentration Pathways (RCPs) and Shared Socioeconomic Pathways (SSPs) to determine the range of potential impacts and how various socioeconomic drivers will influence future risks and opportunities for BMS. The models we focused on were Low Carbon Economy and High Emissions scenarios which correspond to a below 2° Celsius and a 4.5° Celsius global warming pathway, respectively. Refer to Table 2 for a look into the assumptions used for the scenario analysis.

Table 2: Climate-related Scenario Analysis Assumptions

	Low Carbon Economy scenario	High Emissions scenario
Expected warming	Below 2o Celsius	Approximately 4.5o Celsius
Scenario type	Paris-aligned scenario based on AR6 IPCC SSP1-RCP2.6	Inaction scenario based on AR6 IPCC SSP5-RCP8.5
Justification	This scenario was selected to show the potential impacts on BMS's business based on legitimate global action around climate change and decarbonization.	This scenario was selected to show the potential impacts on BMS's business based on low global action on climate change and decarbonization.
Primary risks	Transition risks are more pronounced: • Increase in global carbon pricing mechanisms • Market shifts quickly to renewables and away from fossil fuels • Reputation based on higher climate action expectations by customers and consumers	Physical risks are more pronounced: • More severe increase in acute risks like extreme weather (e.g., hurricanes, wildfires, floods) increasing in frequency and severity • More severe increase in chronic risks like temperature rise, drought and sea level rise
Shared Socioeconomic Pathways	SSP 1: Low carbon development • Inclusive development and strong, swift collective global action on climate change • Major efficiency gains and improvements in environmental conditions • Quick transition to global carbon pricing and a switch to renewable energy	SSP 5: Fossil-fueled development • Strongly globalized, increasingly connected and materialism-focused economy • Exploitation of abundant fossil fuels for resource- and energy-intensive lifestyles • Decline of low-carbon energy
Time horizons	**Present day, 2025, 2035, 2050**	**Present day, 2025, 2035, 2050**

Physical Risks

BMS analyzed 80 owned and third-party facilities to assess the impact of physical risks on our facilities. These facilities were selected based on their criticality in supporting key BMS product lines. The quantitative risk analysis includes both chronic and acute risks, which informed 12 climate-related hazards across the short-, medium- and long-term time horizons, which we define as 2025, 2035 and 2050, respectively.

Physical risks are generally more pronounced under a High Emissions scenario across all facilities, as seen in Figure 2. This is true for all physical risks except for extreme cold, which decreases risk exposure in the long run as extreme heat rises. Hail and extreme heat experience the largest increase on the risk exposure scale.

Our exposure to climate-related physical risks is projected to increase over time. However, the impact of each of these physical risks will vary by region. For example, BMS sites in the United States will face higher exposure to extreme precipitation than sites in Europe under a High Emissions scenario, as seen in Figure 3.

Sites in the United States are also likely to be affected by increased exposure to drought, extreme heat and wildfires. On the other hand, European facilities are almost all likely to experience a decrease in cold days, with facilities also mildly exposed to an increase in wind speed.

Physical risk modelling

80
BMS-owned and third-party facilities

12
Climate-related hazards modelled to evaluate acute and chronic physical risks

Low Carbon Economy (SSP1-RCP2.6) and **High Emissions** (SSP5-RCP8.5)

Climate-related physical risks differ significantly between scenarios

Risk exposure scores for 2050

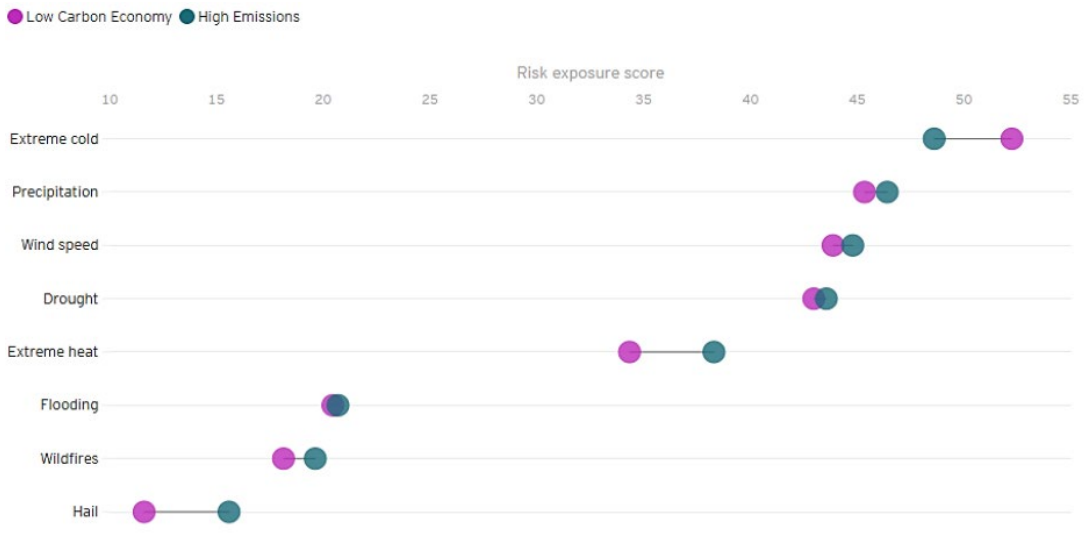


Figure 2: Physical climate-related risk exposure scores for all BMS and third-party owned facilities across two scenarios in 2050

Climate-related physical risks vary across regions

Risk exposure scores for 2050 in a High Emissions scenario.

Climate-related physical risks vary across regions
Risk exposure scores for 2050 in a High Emissions scenario.

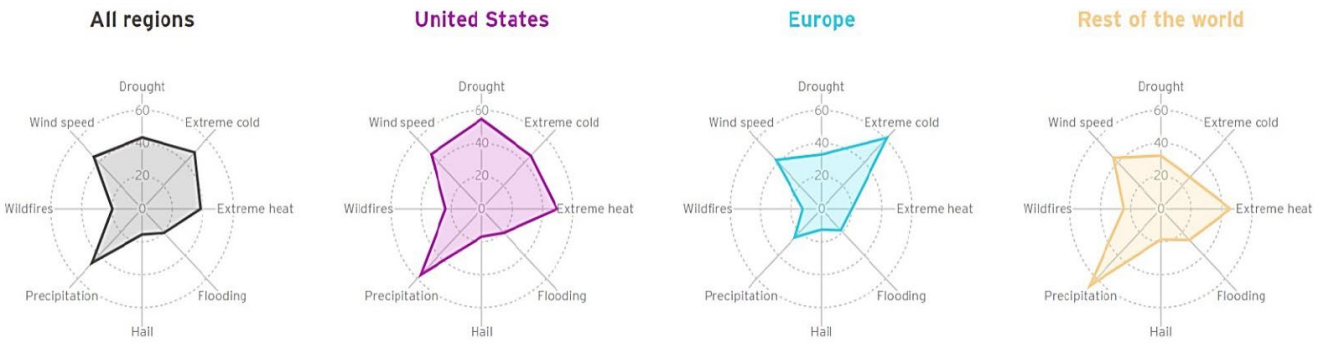


Figure 3: Climate-related physical risk exposure scores in a High Emissions scenario in 2050. Scores range from 0 (no risk) to 100 (high risk).

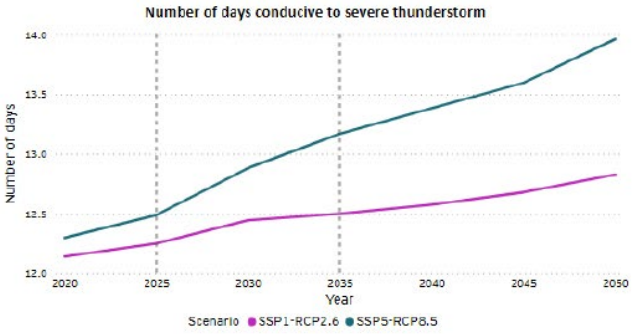
Acute Risks

Rising temperatures will increase the frequency and severity of extreme weather events across the world. Weather events such as extreme storms and wildfires have the potential to disrupt business operations and revenue without proper planning and adaptation measures in place.

In our analysis, we considered direct impacts, such as physical damage to our assets, as well as indirect impacts, such as those caused by potential revenue loss due to decreased employee productivity and supply chain disruptions. Extreme weather events are projected to increase globally under both scenarios; however, the impact will be higher under the High Emissions scenario.

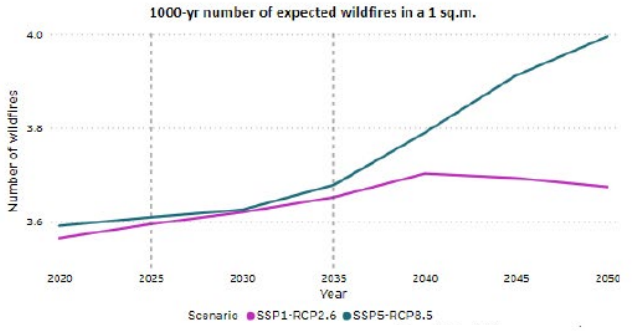
Table 3: Risk exposure and impact on BMS for acute physical climate-related risks

			Risk exposure		
Risk type	**Hazard**	**Definition**	**Low Carbon Economy**	**High Emissions**	**Impact on BMS**
Acute	Severe thunderstorm 	Number of days conducive to severe thunderstorms. Severe thunderstorms produce at least 58 mph (~93 km/h) winds and/or hail at least 1" in diameter.	The average number of severe thunderstorm days across the world is projected to increase by ~3% in 2035 to 5% in 2050.	Global thunderstorms are projected to increase by approximately 7% by 2035 and 12% by 2050.	Increasing storm intensity may impact employee commutes, cause power and water shortages, and damage key infrastructure, leading to global raw material shortages because of increasing storm risk, especially in the United States Gulf Coast. Our sites in the Caribbean and Southeast United States, East Asia and South America are projected to face the highest impacts.
	Wildfire 	Number of 1,000-year wildfires occurring in a year. Such wildfires are extremely rare and have a 0.1% (or 1 in 1,000) chance of occurring in a year based on historical data.	In 2035, wildfire risk projections are near present-day levels, whereas projections illustrate about a 4% increase by 2050.	Wildfire risk is expected to remain close to present-day levels by 2035 but then increase by 9% from 2035 to 2050.	Facilities in the Southwestern US face the highest risk of wildfires which may disrupt transportation and communication systems, leading to supply chain shortages. Employees' respiratory and cardiovascular health are expected to be at higher risk from toxic air pollution caused by an increase in wildfires.
	Extreme wind speed 	100-year maximum 1-minute sustained wind speed. Maximum sustained windspeed is associated with a tropical storm and is a common indicator of storm intensity.	Wind speed is projected to remain at about present-day levels in the short to medium term and decrease slightly in the long term	Wind speed is projected to remain at about present-day levels by 2035 but is projected to increase by 1 km/h (~1%) in 2050.	Highest-impact areas are expected in the Caribbean and Asia-Pacific, leading to storm surges, structural damage, and frequent closures of airports and shipping ports, resulting in shortages of raw materials. Sudden increases in wind speed may shorten evacuation times, raising the risk of human and capital loss.



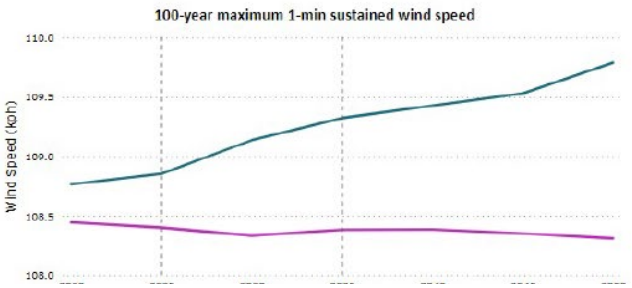
(a) Global average number of days conducive to severe thunderstorm

(b) Annual average storm risk for BMS facilities under High Emissions scenario



(c) Global average number of expected wildfires

(d) Annual average wildfire risk for BMS facilities under High Emissions scenario



(e) Global average changes in 1-min sustained wind speed

(f) Annual average high wind speed risk for BMS facilities under High Emissions scenario. High wind speed leads to extreme storms and cyclones

Figure 4: Increased severity and frequency of extreme weather events modeling results for BMS facilities under Low Carbon Economy Emissions and High Emissions scenarios

Chronic risk

Warming temperatures will create a global shift in weather patterns, causing extreme drought, increased precipitation and extreme heat days across the world. This will exacerbate existing weather-related issues in some regions and create new ones in others.

The changes in chronic climate events are more pronounced in a High Emissions scenario. In this scenario, long-term changes in annual and seasonal temperatures, precipitation patterns and sea level rise could impact business operations and affect the quality of life, health and safety of our employees and customers in regions already experiencing heat or water stress.

Scenario analysis highlights

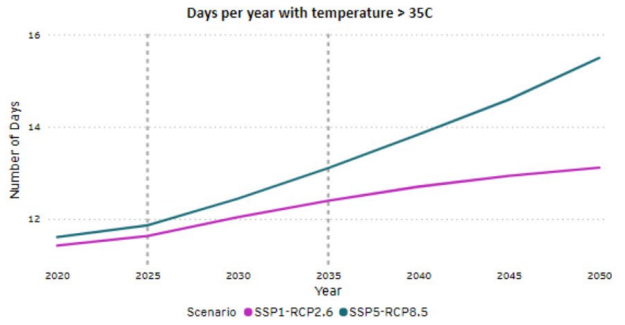
7%	Increase in the number of severe thunderstorm days by 2035
9%	Increase in wildfire risk between 2025 and 2035
1 kph	Increase in 1-min sustained wind speed in 2035 intensifying storms particularly in the Caribbean and Asia-Pacific
32%	Increase in 100-year coastal flooding depth in US East Coast by 2035
150+	Days per year of extreme heat (>35°C) in Southwestern US by 2035

Table 4: Risk exposure and impact on BMS for chronic physical risks (2025–2050)

			Risk exposure		
Risk type	**Hazard**	**Definition**	**Low Carbon Economy**	**High Emissions**	**Impact on BMS**
Chronic	**Drought** 	Extreme drought was characterized by Standard Precipitation and Evapotranspiration Index (SPEI) values of below -2. Extreme drought days are expected to be followed by weeks or months of low/ moderate drought..	By 2035 and 2050, the average number of extreme drought days is projected to increase 9% to 22%, respectively, across the world.	Drought risk is projected to be higher globally due to rising temperatures. BMS sites are projected to experience a 7% increase in the medium term and 23% in the long run.	Increases in extreme drought days may expose BMS to multifaceted impacts. Water shortages are projected to increase, causing raw material shortages; energy prices will likely go up because of higher cooling demand; and increased power cuts may degrade medicines or chemicals that require cold storage. BMS facilities in Europe will face the highest number of drought occurrences.
	Extreme heat 	temperatures greater than 35°	The number of extreme heat days is projected to increase 8% in the medium term and 13% in the long term globally.	Number of extreme heat days is expected to increase 12% from present-day levels to 2035 and will rise a total of 25% until 2050.	Higher temperatures can increase cooling demands, essential for appropriate product storage, resulting in an increase in energy expenditure and GHG emissions. High temperatures may also decrease employee productivity because of heat stress and exposure to vector-borne diseases. Facilities in the Southwestern United States are projected to be the most at risk and may experience temperatures greater than 35° for almost half the year in 2050.
	Coastal flooding 	100-year flooding depth. Such floods are rare and have a 1% (or 1 in 100) chance of occurring in a year based on historical data.	In 2035, global 100-year flooding depth is projected to increase by 11%. In 2050, global 100-year flooding depth is projected to increase by 13%.	By 2035, some regions are expected to experience ~14% increase in 100-year coastal flooding depth. In 2050, sea level rise will continue to increase coastal flooding by about 26%.	Higher flooding depth may disrupt manufacturing processes and impact the accessibility of office and research centers due to the inundation of these facilities. Flooding can also cause deterioration of transportation systems, preventing employees from coming into work and reducing overall productivity. Facilities with the highest exposure are located across China, Europe and the Eastern United States.

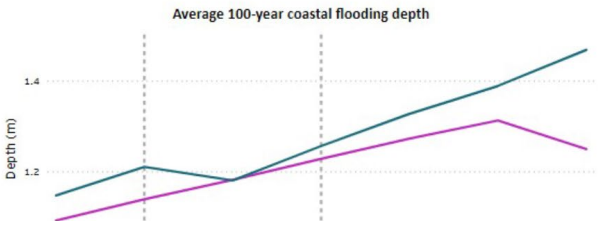
(a) Global average number of months/year with extreme drought risk (SPEI < -2)

(b) Annual average drought risk for BMS facilities under High Emissions scenario



(c) Global average number of days/year with temperatures greater than 35oC

(d) Annual average extreme heat risk for BMS facilities under High Emissions scenario



(e) Global average changes in 100-year coastal flooding depth

(f) Annual average coastal flooding risk for BMS facilities under High Emissions scenario

Figure 5: Chronic physical risks and shifting climate patterns modeling results for BMS facilities under Low Carbon Economy Emissions and High Emissions scenarios

Transition Risks

Transition risks are ever-changing based on government regulations, geopolitical issues, investment strategies and consumer decisions. Through a scenario analysis, it is our goal to better understand how these current and projected risks can affect our business across the short-, medium- and long-term time horizons which we define as 2025, 2030 and 2050, respectively. This transition risk scenario analysis is qualitative with quantitative indicators such as market changes, pricing models and global expected supply chain impacts. We aim to include a financial impact assessment in the next iteration of our TCFD-aligned climate risk assessment.

Increased supply chain disruption and operational costs

Acute and chronic physical climate hazards may impact global supply chains, creating increased disruption in global shipping lanes and posing risks to the safe maintenance of temperature control logistics. Supply chain disruption may lead to increased operational costs, business interruption and added complexities for cold chain shipments of life-saving biologic medicines.

Without proper mitigation measures in place, increased frequency of severe and extreme weather events may result in shipping delays and disruptions, which are expected to be more prevalent under a High Emissions scenario. Increasing temperatures in both scenarios will challenge the safe delivery of temperature-controlled medicines with a higher risk of failure of temperature control logistics under a High Emissions scenario.

Climate change is already disrupting the global supply chain. Due to an increase in physical risks such as wildfires and thunderstorms, the global supply chain will become more fragile. We are continuously working to develop additional adaptation and mitigation actions to allow us to maintain a resilient supply chain and deliver medications to our patients around the world.

Increased cost and decreased availability of water

Increased demand and decreased water supply in water-stressed regions can lead to increased costs or challenges in procuring the raw material. Regions experiencing water stress may see that risk exacerbated by population growth or geopolitical issues. Increased water scarcity may result in manufacturing delays and could be responsible for a decrease in revenue if mitigation measures are not in place.

The risk of water stress is significantly more pronounced under a High Emissions scenario due to increasing temperatures and increased drought risk. Increased risk of water stress under a High Emissions scenario will likely increase manufacturing costs for our medicines.

Increased cost and decreased availability of wood pulp for packaging

The supply of wood pulp, an essential packaging material, is projected to be at risk due to a growing demand from the manufacturing sector paired with a decrease in timber supply. The increase in demand from the manufacturing sector is driven by a growing online retail market and a global shift away from plastic use. Timber supply is projected to decline due to stringent deforestation policies under a Low Carbon Economy scenario and growing physical threats such as wildfires, pathogen outbreaks and other extreme weather events, particularly under a High Emissions scenario.

The demand and price for wood pulp are expected to increase in both scenarios due to the growing packaging industry. The industry is projected to grow at approximately 4% under both scenarios because of consumer substrate choice changes (plastic to paper), new market expansion and changing ownership dynamics. In the long term, wood pulp prices are projected to be higher under a Low Carbon Economy scenario; however, the market might be more volatile under a High Emissions scenario due to increased physical risks.

Stringent regulations under a Low Carbon Economy scenario and increased frequency of climatic events under a High Emissions scenario are likely to increase packaging costs for BMS in the short and long term.

Carbon pricing mechanisms

Regions and countries with aggressive carbon reduction commitments are likely to implement carbon taxes or emissions trading systems (ETS) to reduce carbon emissions. Currently, 70 carbon pricing mechanisms are in operation, covering about 23% of the total share of global GHG emissions. As this trend continues, regulations on carbon emissions could increase operational costs through taxes on our global direct and indirect emissions.

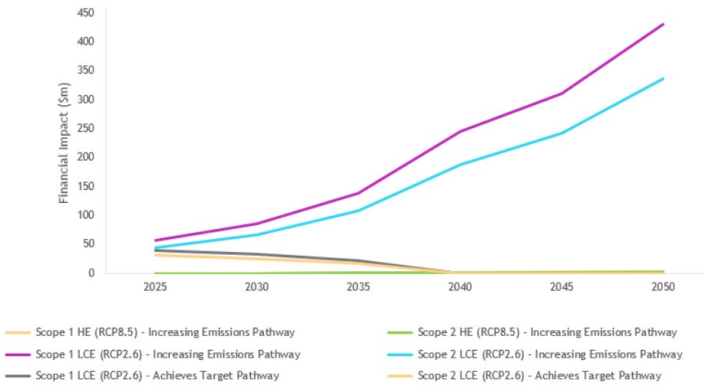
Scenario analysis highlights

- Increase in supply chain cost across the mediumand long-term time horizons
- Western and Southwestern Europe are facing highest risk of drought likely increasing water scarcity
- Intensity of acute and chronic physical risks may create water shortages and drive up global wood pulp prices and packaging costs
- Significant increase in carbon prices in Europe and the US due to increased legislation around carbon emissions

Table 5: Impact on BMS for transition climate-related risks

		Impact on BMS	
Risk type	**Key assumptions**	**Low Carbon Economy**	**High Emissions**
Supply chain disruption	• Increase in ocean transport away from air transport in the supply chain in alignment with our carbon emissions reduction strategy. • Supply chain dependent on temperature-controlled transportation for the current product portfolio and clinical trial management.	BAcute weather events and chronic physical risks are less severe overall but still impact the BMS supply chain. Increased frequency of severe and extreme weather events may result in delays and disruption due to coastal flooding and port damages. The frequency of extreme weather events and the intensity of flooding may continue to impact global shipping lanes and temperature control logistics.	Extreme temperature rise and increased frequency and intensity of storms can lead to an expected increase in supply chain costs across the medium- and long-term time horizons. Increased frequency and intensity of storms can lead to port disruptions and, thus, our global supply chain. We also expect to see an increase in costs for temperature control logistics as temperatures rise at greater rates.
	• Drought, precipitation and water demand are the major drivers of water scarcity. • Water prices increase as demand increases. • Current analysis does not include speculative geopolitical changes.	Water stress is a concern, but the expected impact is six times less severe than under a High Emissions scenario.	Water stress is expected to increase due to a greater temperature rise, increased drought risk and fossil fuel-based economic growth. BMS and third-party manufacturing locations in Western and Southwestern Europe will experience the highest risk of drought, increasing water scarcity and the price of water, which is expected to increase manufacturing costs for our medicines.
	• Price of wood pulp is assumed to be directly correlated with the price of roundwood. • This model does not account for climate effects such as pest outbreaks and changes in soil composition on forest productivity.	Due to stringent deforestation, harvest and water management policies, timber supply and harvest rates are expected to decline, despite the increase in wood pulp demand. These regulatory impacts on the timber industry, coupled with increasing demand, are expected to lead to increased packaging costs for our medications.	Wood pulp demand is likely to increase as correlated with continued growth in the manufacturing sector and increased forest productivity. Despite this, climatic events like wildfires and pest outbreaks may negatively affect supply, creating a volatile wood pulp market and impacting packaging costs for BMS. Physical climate risks may also exacerbate water shortages for the pulp industry, driving up global wood pulp prices and packaging costs.
	• Publicly available data was used to model estimated carbon pricing. • Numbers reported are undiscounted annual values under two scenarios (Low Carbon Economy and High Emissions) and two BMS emissions pathways: 1) Increasing Emissions pathway and 2) Achieves Target pathway.	Due to global climate action, increased legislation around carbon emissions may result in significant external carbon prices with the highest prices in Western Europe and the US by 2050 per estimates by the Network for Greening the Financial System (NGFS). Higher operational costs will be most prominent in the US, with a projected annual impact of $667m in 2050. In the same year, projected carbon prices for Western Europe would reach $1,300 per ton, reflecting a broader trend of significant increases in carbon prices.	Regional carbon prices do not vary greatly due to a lack of global climate action. Carbon prices may be implemented in some jurisdictions, and most do not surpass $8 per ton by 2050 per estimates by NGFS. Thus, the impact on BMS' operational costs will be minimal in this scenario.

The Increasing Emissions pathway assumes that BMS' Scope 1 and 2 emissions will grow at a rate of 3.53% through 2050. The Achieves Target pathway assumes a Net Zero goal for both Scope 1 and 2 emissions in the year 2040. Two carbon prices are utilized and tied to both the Low Carbon Economy and High Emissions scenarios, with higher carbon prices expected under a Low Carbon Economy scenario. Carbon prices under a Low Carbon Economy scenario will cost BMS up to $767 million annually by 2050.



Our actions

Reliable and sustainable supply chain

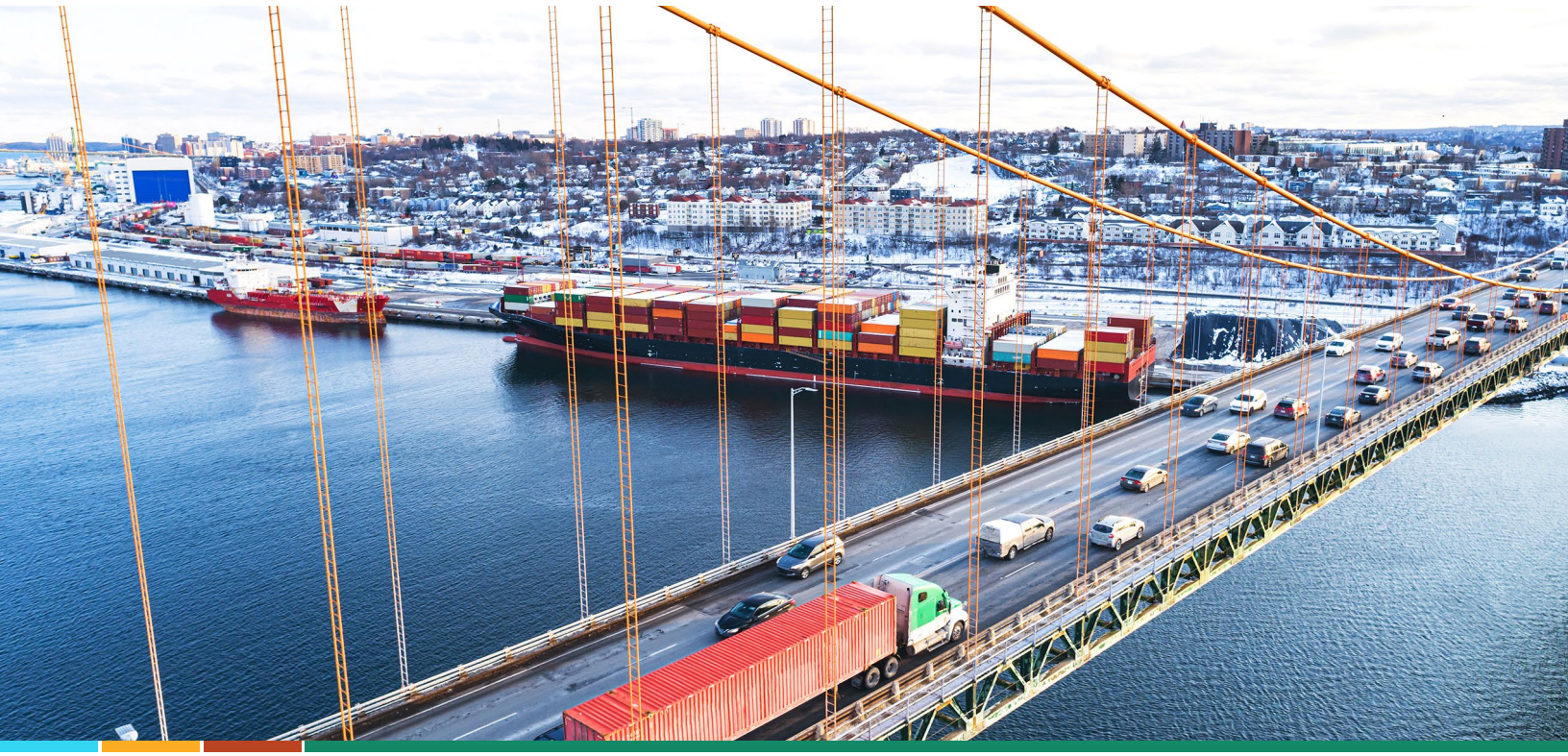
Bolstering our supply chain's reliability and sustainability is a priority. Supplier diversity and sustainability are central considerations for our supply chain management, and we actively review environmental responsibility and scoring during the vendor sourcing process, internally or with vendor selection. For our temperature-sensitive products, we have implemented the use of reusable battery-operated refrigerated pallet-sized containers and passive refrigeration when we have smaller, parcel-sized shipments. We are also exploring alternatives for shipment of frozen critical medicines. We aim to expand the use of reusable parcel containers in the coming months beyond Puerto Rico, Canada and Mexico where they are currently utilized.

BMS also participates in the Green Suppliers Network and RX-360, a consortium of major pharmaceutical companies and suppliers that seeks to enhance patient safety by developing a global quality system that helps members ensure product quality and authenticity throughout the pharmaceutical supply chain. We encourage our suppliers to align their environmental management systems with industry-wide frameworks and expect them to comply our Standards of Business Conduct and Ethics for Third Parties (3PStandards).

To better understand our current risks in the supply chain, we work with our business continuity management program to conduct tabletop exercises to identify gaps in and improve our overall supply chain resilience. We plan to use insights from this climate risk scenario analysis help inform these exercises moving forward.

Manufacture 2030 Activate Initiative

To accelerate environmental impact reduction across our Active Pharmaceutical Ingredients (API) suppliers, BMS founded the Manufacture 2030 Activate Initiative along with our peers. This initiative recognizes that API production accounts for a significant proportion of the industry's carbon footprint and that our suppliers are at the beginning stages of their sustainability journey. We seek to address this challenge by collaborating with our suppliers to align with science-based decarbonization targets, drive sustainable procurement and identify opportunities for operational and resource efficiency. As a participating pharmaceutical company, we also have access to the decarbonization pathway projections of our API suppliers. This increased visibility will aid our own climate risk assessments, allow us to support our suppliers in meeting their climate targets and strengthen the resiliency of our value chain.



Our actions (cont.)

Wastewater risk assessment

In 2019, we initiated a multiyear global water source and wastewater risk assessment for all R&D and manufacturing sites over 50,000 square feet. The risks and opportunities identified by this assessment were incorporated into BMS' Business Continuity Management (BCM) programs and capital remediation planning to have contingency plans in the event of risk realization. Where remediation options were not feasible, contingency plans have been developed for the risk scenario. We plan to incorporate insights from the climate scenario analysis into the BCM planning process.

Water conservation effort

We are focused on optimizing operational efficiency and implementing capital upgrades to improve water conservation across our sites. In 2021, we implemented six water-use optimization projects at five critical facilities. We have enacted use-modeling and utilized water balance maps to identify opportunities to re-use, repurpose and recycle water at our facilities. At our office sites, we retrofit our kitchen equipment to reduce water consumption and increase efficiency. For example, at our office in Munich, Germany, we installed a new industrial belt washer that reduces the amount of regeneration water by 185 liters per hour. This resulted in approximately 37,000 liters of water savings for the office per year. In addition, our employees led and participated in a number of activities around the world focused on sustainable water management, including cleaning watershed areas and building awareness around water conservation.

Pathways to decarbonization

In 2020, we set bold environmental goals to guide us. By 2040, we have a goal of utilizing 100% zero-emission vehicles in our commercial fleet and achieving net-neutral emissions. We are actively developing our Science Based Targets (SBT) that will provide us with a data-driven set of goals that will advance our journey to Net Zero by 2040 for Scope 1 and 2 emissions. In addition to tracking our Scope 1 and 2 emissions, we have expanded our current tracking of Scope 3 emissions beyond employee travel, which enables us to optimize both internal and external value chains and identify previously unseen areas of climate risk. We have submitted our commitment letter for Science Based Targets aligned to the Paris Agreement of 1.5oC with commitments for both Near Term and Long Term targets with the goal of Net Zero GHG Scopes 1, 2 and 3 by 2050. Furthermore, we have invested in procuring 100% of purchased electricity from renewable sources by 2030 and aim to achieve this goal primarily by using virtual power purchase agreements (VPPAs) as well as considerations for other procurement mechanisms, such as renewable energy credits (RECs), green tariffs and power purchase agreements (PPAs).

Opportunities

Renewable energy

We identified a key opportunity of lowering emissions from energy by participating in renewable energy programs such as virtual power purchase agreements. Investment in on-site renewable energy can also build business resilience by reducing dependence on utility providers and providing reliable power during an extreme weather event.

To reach our target of 100% procured electricity from renewable sources, we will have to utilize a portfolio of renewable energy options. As our targets apply under both scenarios, it will become more affordable for us to procure energy from renewable sources in the Low Carbon Economy compared to the High Emissions scenario as renewable sources will become more readily available due to increasing pressure to green the electric grid.

Energy efficiency

The adoption of policies for procurement and facility management which prioritize energy efficiency measures can lead to operational cost savings, reduction in GHG emissions, improved health and productivity benefits for our employees, and improved resilience.

Energy efficiency is a crucial piece of our environmental goals under both scenarios. To successfully achieve net-zero emissions, we must focus on improving our infrastructure, which will result in savings and a reduction in GHG emissions. However, under the Low Carbon Economy scenario, we will be able to utilize grants and funding to implement energy efficiency projects, leading to a reduction in the need for capital expenditure.

Table 6: Impact on BMS for climate-related opportunities

		Impact on BMS	
Opportunity	**Key assumptions**	**Low Carbon Economy**	**High Emissions**
Renewable energy	BMS global energy consumption projected to grow to 675,000–750,000 MWh in 2030. BMS executes on current renewable energy plans totaling 405,000 MWh. Publicly available data was used to project REC pricing	As the world moves to more renewable energy programs under an LCE, it can lead to a larger supply of cheaper, greener electricity schemes such as virtual power purchase agreements (VPPAs). Prices will also likely decrease for state-based RECs, making it more feasible for us to achieve our 100% procurement of renewable energy by 2030 target.	The supply and demand of renewable energy would be expected to slow under a High Emissions scenario, leading to higher prices and lower availability for VPPAs and RECs than in the Low Carbon Economy Emissions scenario.
Energy efficiency	Globally, BMS consumed a total of 1,446,422 MWh across operations in 2022. Achieves Net Zero scope 1 and 2 emissions by 2040.	A large opportunity from increased energy efficiency incentives from governments around the world can be realized. The IEA projects global clean energy investments to increase from USD $1.2 trillion in 2019 to around USD $4.3 trillion in 2030, and around 40% of this will be directed toward end-use technologies like energy efficiency projects.	Water stress is expected to increase due to a greater temperature rise, increased drought risk and fossil fuel-based economic growth. BMS and third-party manufacturing locations in Western and Southwestern Europe will experience the highest risk of drought, increasing water scarcity and the price of water, which is expected to increase manufacturing costs for our medicines.

Our actions

100% procured electricity from renewable sources by 2030

We have a bold, ambitious target to use 100% purchased electricity from renewable sources in our operations by 2030. We expect to achieve our target by building on our current renewable energy portfolio using VPPAs as our main strategy. In 2021, we authorized our first large-scale renewable energy supply contract for 60 megawatts (MW) at the Cattlemen Solar Part in Milam County, Texas and our second in 2023 for 145 MW at the Blevins Solar Project in Falls County, Texas. These are critical steps in our journey towards achieving our goal of 100% purchased electricity from renewable sources.

We are also focused on our owned vehicles and the transformation to 100% electric vehicles by 2040. As a result, we currently manage an on-site EV charging network consisting of 155 EV charging points and more than 500 subscribers across 10 US sites.

In addition to purchased renewable energy, our solar photovoltaic (PV) footprint includes PV arrays installed at three New Jersey locations, as well as in China and the UK. The PV arrays carry a maximum output of nearly 3.4 MW, which is equivalent to the energy needed to power more than 300 homes.

Energize Program

We are committed to increasing renewable energy adoption throughout our value chain to strengthen it and make it more resilient to climate-related risks and opportunities. In alignment with this goal, BMS is participating in the Energize project that aims at engaging pharmaceutical suppliers in climate action. The program provides hundreds of suppliers with the opportunity to aggregate in appropriately sized and diversified groups that will go-to-market together to procure energy from renewable energy projects. Through this renewable energy aggregation approach, we aim to create more buying opportunities for our suppliers while leveraging collective buying power to reduce costs and drive action.

Our actions

Energy efficiency efforts

We currently pursue energy efficiency measures in our buildings and operations including pump storage optimization, boiler replacement, transformer improvement and more energy efficiency initiatives that reduce our energy use. The return on these investments on these investments is attractive — for example, a $1.5m investment in building improvements is projected to yield savings of approximately $520,000/year. Additionally, more than $3 million in funding was approved by business to support site-based projects enterprise-wide to increase energy efficiency and decrease GHG emissions.

- Aichi, Japan

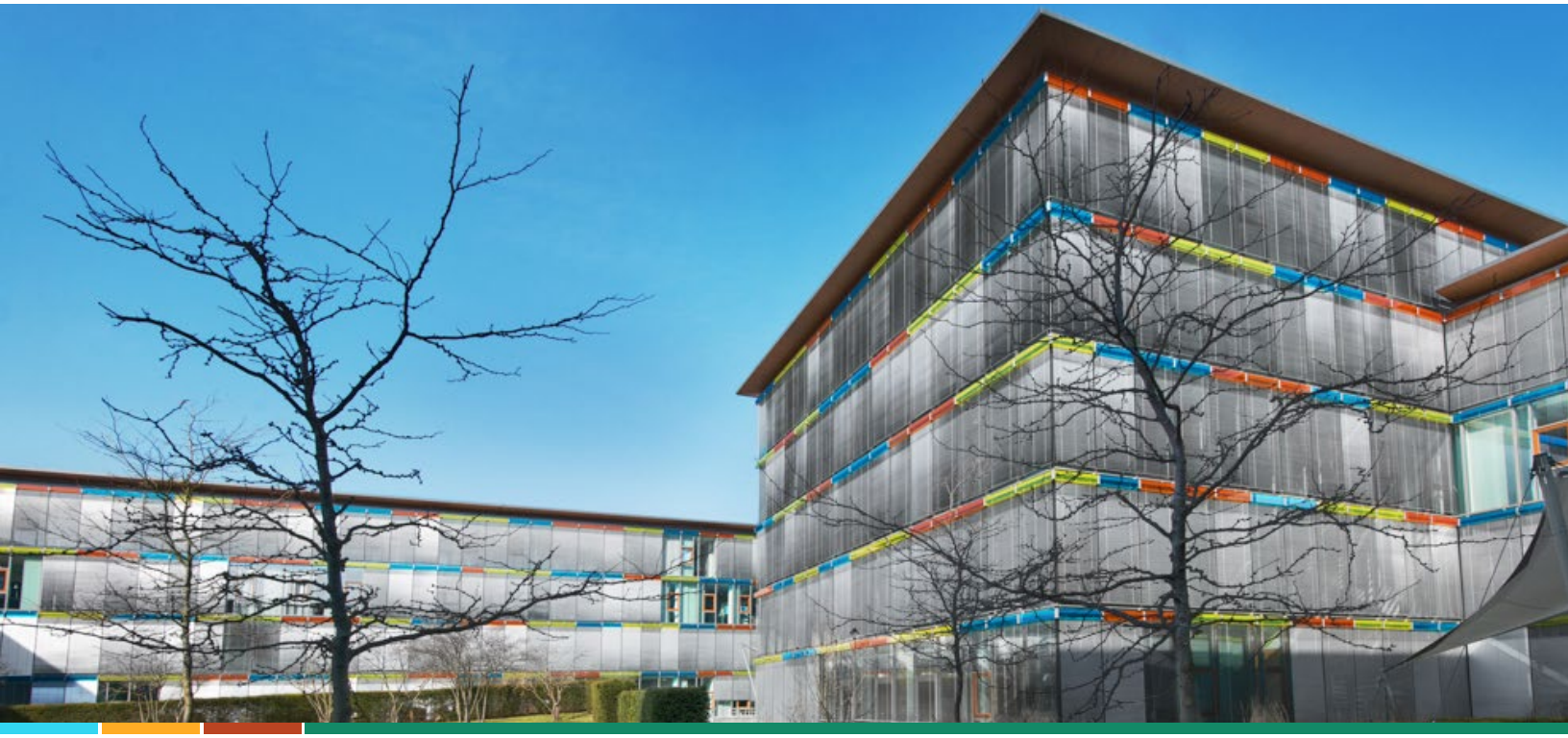
We are taking several measures to achieve our 2040 Net Zero target of Scope 1 and 2 emissions. A great example of this is the switch to electric boilers and heat pump systems at our manufacturing facility in Aichi, Japan. These measures helped the facility reduce its GHG emissions by 7.6% in 2022 as compared to 2021. In addition to direct GHG emission reduction, we also improved the health and safety of our employees by reducing the risk of fire, kerosene leakage and other health impacts associated with inhaling exhaust gas produced by kerosene boilers.

- Moreton, United Kingdom

Our research and development site in Moreton, UK achieved net carbon-negative building status in 2022. The building received an A+ Energy Performance Certificate (EPC) rating, making it the fourth highest-rated building to date in the entire England and Wales region. This was achieved through increased insulation, variable refrigerant flow (VRF) air conditioning and 365 photovoltaic panels that generate annual energy of 110 MWh or more. These measures allow us to unite energy efficiency with micro plasma ion technology that ensures the safety and quality of our products. We continue to implement such innovative measures in our facilities around the world.

- Munich, Germany

Our office in Munich, Germany achieved German Sustainable Building Council Silver certification. This is the first certification system in the world to include lifecycle assessment of buildings that also considers environmental impact in its evaluation. We implemented multiple measures including installation of demand-oriented lighting with efficient LEDs and presence sensors, replacement of room automation control, interior shading, and cables to meet current standards, and building core activation moisture and heat recovery systems. This led to approximately 6%–8% reduction in electricity use per year. The final energy consumption of the building is 42% lower than other non-residential buildings of comparative value. To achieve this goal, we collaborated with building owners and multiple third-party experts. This exemplifies our continued commitment toward collaboration to drive innovation and action.



Risk Management

Our approach to climate risk management

Our business continuity program is a foundation for understanding how risks affect our mission. We approach ERM in a systematic and disciplined way with a set of policies and processes that enable ongoing identification, assessment and prioritization of major enterprise risks, including climate-related risks associated with our strategic and business objectives.

Climate change is identified as a key risk within our ERM matrix and is reviewed regularly through the ERM process. At the enterprise level, our cross-functional Enterprise Risk Committee (ERC) leads our ERM governance and reporting and assists in establishing cross-functional responsibilities related to risk management. Facility-level risks are documented as part of the Business Continuity Plans, developed at the facility level, integrated into end-to-end network views at the functional level, and reported at the enterprise level. In addition, BMS regularly assesses current and emerging climate-related legislation within our ERM process, such as the Securities and Exchange Commission's (SEC) proposed rules to enhance and standardize climate-related disclosures for investors and the European Union (EU) Corporate Sustainability Reporting Disclosure.

Climate-related risks and opportunities are prioritized by their relative material impact on BMS, the time frame in which they may present themselves and our overall control to influence the situation. Climate risks are monitored through a dashboard that tracks key risk indicators, mitigation plans and other emerging issues.

BMS considers the material impacts of climate change on financial planning and reporting of revenue, direct costs, acquisitions, divestments, assets and liabilities. This is considered under all operations including, but not limited to, products and services, R&D investments, and supply chain management.

Our risk management framework and processes enable us to identify, assess, prioritize and address material risks regularly, which leads to value creation for all stakeholders including our patients, employees and global communities. The results and key takeaways from this climate risk scenario analysis will directly inform the ERC to ensure that emerging climate risks and trends are accurately reviewed and represented in the ERM program.

We have an established business continuity management program that routinely conducts tabletop exercises with the leadership team to identify gaps and improve operations. This climate scenario analysis will further enhance our third-party risk management program by identifying regions with high exposure to physical and transition climate risks.

Looking Ahead

Effective climate risk management will remain at the forefront of our business strategy and be a foundation for long-term sustainable growth. Our approach to climate risk scenario analysis and disclosures will continue to evolve. We intend to take steps toward a comprehensive impact assessment of climate-related risks and opportunities and further evaluate the adaptation and mitigation measures in place to strengthen our business resiliency. As we continue to build upon and strengthen our analysis, management and reporting, we will prioritize engagement with stakeholders across the business to help us maintain and develop resilient operations to support the safe and reliable delivery of medicines to our patients.

Metrics and Targets

Our metrics and targets are used to better understand our progress in reducing our environmental footprint and managing identified material climate-related risks and opportunities. We will continue to build on developing metrics and performance targets in future iterations of the climate risk assessment to further our TCFD-aligned reporting. Refer to our Metrics section on page 59 of our ESG report for more information on the status of our climate-related metrics.

Bristol Myers Squibb™

2023 Climate Change Report

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