

Marvell CDP Climate Change Questionnaire 2023

C0. Introduction

C0.1

(C0.1) Give a general description and introduction to your organization.

Marvell Technology Inc. is a global fabless semiconductor solutions provider focused on building essential technology for data infrastructure with an unrivalled portfolio of compute, networking, security and storage products. Trusted by the world's leading technology companies for over 25 years, our cloud-optimized silicon technology is changing the way tomorrow's enterprise, cloud, automotive and carrier architectures transform – for the better. Marvell has the industry's most comprehensive data infrastructure portfolio covering critical enabling components across storage, compute, electro-optics, networking and security. Marvell uniquely offers these leading products to be customized and optimized for customers' unique requirements as ASICs in collaboration with customers who have in-house silicon design teams.

Sustainability and ESG (Environmental, Social and Governance) are core to how Marvell operates as a responsible corporation. Marvell's approach to ESG is based upon the areas of greatest impact and opportunity for our company - integrating environmental and social considerations into our product design and responsibly managing the environmental and social impacts of our supply chain, while focusing on strategic ESG initiatives that are material to our financial performance and long-term value creation. These priorities are supported by a strong system of ESG governance and complemented by goals on each of our material ESG topics.

As a semiconductor industry leader with a global footprint and thousands of employees and other stakeholders around the world, Marvell has a responsibility to help address climate-related impacts. In FY 2023, we took proactive steps to enhance our climate strategy by beginning the process to set a Science Based Target (SBT) and putting ourselves on a path to net zero carbon emissions. As of July 2023, we plan to submit our SBT for validation by the Science Based Target Initiative imminently. Our SBT will be aligned with a 1.5°C climate scenario, supporting the goals of the Paris Agreement.

As a fabless semiconductor company, Marvell partners with third-party manufacturers around the world. While greenhouse gas (GHG) emissions from our own operations are much lower than those of our supply chain partners, Marvell is committed to doing our part by limiting Scope 1 and Scope 2 emissions from our owned and leased facilities. Direct GHG emissions from Marvell's operations arise mostly from electricity usage and heating and cooling in our

facilities. The majority of our GHG emissions is associated with our Scope 3 emissions resulting from our upstream suppliers' manufacturing operations as well as the downstream use of Marvell's products by our customers. The analyses behind our work to set a SBT have reinforced that one of our greatest opportunities for impact is in our supply chain, and we continue to gather data that will help us better understand the exposure of our business to climate-related impacts.

This CDP Report contains forward-looking statements regarding Marvell's ESG policies, procedures and future actions related thereto within the meaning of the federal securities laws that involve risks and uncertainties. Words such as "anticipates," "expects," "intends," "plans," "projects," "believes," "seeks," "estimates," "can," "may," "will," "would" and similar expressions identify such forward-looking statements. These statements are not guarantees of results and should not be considered as an indication of future activity or future performance. Actual events or results may differ materially from those described in this CDP Report due to a number of risks and uncertainties, including, but not limited to: the ability of Marvell to implement its plans with respect to ESG matters in the time frame anticipated or at all; Marvell's reliance on independent foundries and subcontractors for the manufacture, assembly and testing of its products; the impacts and costs associated with changes in ESG and similar regulations; Marvell's ability to monitor and accurately report on ESG matters; general macroeconomic conditions, or expectations of such conditions, such as rising interest rates, macroeconomic slowdowns, recessions, inflation and stagflation; changes in demand for semiconductors and the related changes in demand and supply for our products; our ability to define, design, develop and market products for the Cloud and 5G markets, as well as for Artificial Intelligence (AI) solutions; our dependence on a small number of customers; and other risks detailed in Marvell's SEC filings from time to time. Marvell undertakes no obligation to revise or publicly update any forward-looking statements.

C0.2

(C0.2) State the start and end date of the year for which you are reporting data and indicate whether you will be providing emissions data for past reporting years.

Reporting year

Start date

February 1, 2022

End date

January 31, 2023

Indicate if you are providing emissions data for past reporting years

Yes

Select the number of past reporting years you will be providing Scope 1 emissions data for

1 year

Select the number of past reporting years you will be providing Scope 2 emissions data for

1 year

Select the number of past reporting years you will be providing Scope 3 emissions data for

1 year

C0.3

(C0.3) Select the countries/areas in which you operate.

Argentina
Canada
China
Denmark
Finland
Germany
India
Israel
Italy
Japan
Netherlands
Poland
Republic of Korea
Romania
Singapore
Spain
Sweden
Taiwan, China
United Kingdom of Great Britain and Northern Ireland
United States of America
Viet Nam

C0.4

(C0.4) Select the currency used for all financial information disclosed throughout your response.

USD

C0.5

(C0.5) Select the option that describes the reporting boundary for which climate-related impacts on your business are being reported. Note that this option should align with your chosen approach for consolidating your GHG inventory.

Operational control

C0.8

(C0.8) Does your organization have an ISIN code or another unique identifier (e.g., Ticker, CUSIP, etc.)?

Indicate whether you are able to provide a unique identifier for your organization	Provide your unique identifier
Yes, a Ticker symbol	MRVL
Yes, a CUSIP number	573874104

C1. Governance

C1.1

(C1.1) Is there board-level oversight of climate-related issues within your organization?

Yes

C1.1a

(C1.1a) Identify the position(s) (do not include any names) of the individual(s) on the board with responsibility for climate-related issues.

Position of individual or committee	Responsibilities for climate-related issues
Board-level committee	The Nominating and Governance Committee of the Board of Directors of Marvell has oversight over our ESG strategy, and in this capacity reviews and provides guidance on corporate social responsibility and sustainability matters, including the climate program, monitoring and evaluating the Corporate Guidelines and other corporate policies to ensure that all governance standards are being met. Climate change is a material issue for Marvell, and the Chief Operations Officer (COO) has an overall responsibility for climate strategy and climate-related issues. The COO works closely with the Executive Vice President and Chief Legal Officer, who ultimately raises the issue with the Board as part of ESG updates, both in the Nominating & Governance Committee's quarterly updates and in the annual full Board update. The company-wide climate strategy is set by management and reviewed by the Board. This includes an agreement in making decisions around the company's climate strategy, including the decision to set a company-wide science-based carbon reduction target aligned with the 1.5°C climate scenario by the end of FY23.

C1.1b

(C1.1b) Provide further details on the board's oversight of climate-related issues.

Frequency with which climate-related issues are a scheduled agenda item	Governance mechanisms into which climate-related issues are integrated	Please explain
Scheduled – all meetings	Reviewing and guiding annual budgets Overseeing major capital expenditures Overseeing acquisitions, mergers, and divestitures Reviewing and guiding strategy Overseeing and guiding the development of a transition plan Monitoring the implementation of a transition plan Overseeing the setting of corporate targets Monitoring progress towards corporate targets Overseeing value chain engagement Reviewing and guiding the risk management process	<p>The Nominating and Governance Committee of the Board of Directors of Marvell has oversight over our ESG strategy, which also includes our climate program. The Nominating and Governance Committee is also responsible for overseeing disclosures regarding corporate social responsibility and sustainability matters, monitoring and evaluating the Corporate Guidelines and other corporate policies to ensure that all governance standards are being met. As climate change is a material issue for Marvell, the Chief Operations Officer (COO) is the executive champion of the Environment Working Group and has an overall responsibility for climate strategy and climate-related issues. The COO works closely with the Executive Vice President and Chief Legal Officer, who ultimately raises the issue with the Board as part of ESG updates, both in the Nominating & Governance Committee's quarterly updates and in the annual full Board update. The company-wide climate strategy is set by management and reviewed by the Board. An example of a climate-related decision reviewed by the Board includes setting a company-wide science-based carbon reduction target aligned with a 1.5°C climate scenario by the end of FY23.</p> <p>The Nominating and Governance Committee may be assisted by the Audit Committee, whose duties include, among others, oversight of the quality and integrity of reporting practices of the company, including the review of financial information as it relates to climate. Although the Audit Committee's functions are separate from that of the Nominating and Governance Committee and are to ensure the quality of financial statements and accounting, auditing, and reporting practices of the company, the Audit Committee may assist in providing information to help with the decision-making process.</p>

C1.1d

(C1.1d) Does your organization have at least one board member with competence on climate-related issues?

	Board member(s) have competence on climate-related issues	Criteria used to assess competence of board member(s) on climate-related issues
Row 1	Yes	<p>Marvell’s Board of Directors is composed of experienced business leaders with extensive background and expertise in the technology space, including renewable energy development. The Board’s engagement on Marvell’s ESG strategy is critical to ensure that our company has accountability measures built in to manage impacts and risks, identify emerging opportunities and continue to progress against our goals. Marvell’s CEO, who has been recently appointed as Chair of the Board, provides an executive oversight over our ESG strategy, including our corporate climate strategy, and is receiving regular updates on Marvell’s progress towards our ESG goals, including those related to climate mitigation, adaptation, and resilience. He also has experience serving as a board member at Element Energy, a company that aims to speed the adoption of clean energy and clean transportation by improving the energy efficiency throughout of batteries. We also have a director on our Board who currently serves as Chief People and Legal Officer and Corporate Secretary at Rockwell Automation, Inc., where this director oversees, among other topics, the company’s ESG and Environmental, Health and Safety efforts. Another director on our Board is a former Chief Financial Officer of SolarCity Corporation (now part of Tesla Energy Operations), a company that provided solar energy services to homeowners, businesses, government, and non-profit organizations.</p> <p>For additional information of our Board of directors, see Marvell’s website: https://www.marvell.com/company/leadership/board-of-directors.html.</p>

C1.2

(C1.2) Provide the highest management-level position(s) or committee(s) with responsibility for climate-related issues.

Position or committee

Chief Operating Officer (COO)

Climate-related responsibilities of this position

Managing annual budgets for climate mitigation activities

Managing major capital and/or operational expenditures related to low-carbon products or services (including R&D)
Developing a climate transition plan
Implementing a climate transition plan
Setting climate-related corporate targets
Monitoring progress against climate-related corporate targets
Managing value chain engagement on climate-related issues
Assessing climate-related risks and opportunities
Managing climate-related risks and opportunities

Coverage of responsibilities

Reporting line

CEO reporting line

Frequency of reporting to the board on climate-related issues via this reporting line

Quarterly

Please explain

At a management level, Marvell has cross-functional Environment, Social, and Governance Working Groups in place that include Legal, Finance, Global Real Estate and Workplace, Supply Chain, Quality, and Central Engineering teams, among others. The Environmental working group meets monthly to evaluate Marvell's progress towards climate goals and commitments, and support on-the-ground sustainability initiatives. The Chief Operations Officer (COO) is the executive champion of the Environment Working group and has overall responsibilities for climate strategy and climate-related issues at Marvell, and in this capacity can elevate climate-related matters to Marvell's senior leadership. Updates and feedback on the overall climate strategy and program implementation from the Environment working group are then shared with the COO and other executives during bi-monthly ESG Committee meetings.

The COO works closely with the EVP and Chief Legal Officer, who ultimately raises any climate-related issues with the Board as part of ESG updates, both in the Nominating & Governance Committee's quarterly updates and in the annual full Board update. The COO is responsible for assessing and leading the management of climate-related risks and opportunities; evaluating the impact of climate-related issues on the company's ability to do business and Marvell's reputation; elevating stakeholder concerns; and guiding the implementation of climate-related policies, programs and disclosures. The COO also oversees the implementation of relevant programs, systems and processes to monitor ESG matters, as deemed necessary and appropriate (e.g., implementing energy and water efficiency measures across Marvell's sites, procurement of renewable energy for direct operations, overseeing supplier engagement around sustainability etc.). The COO provides cross-functional and multi-disciplinary oversight of the company's climate-related strategies, goals and approaches to managing potential impacts. The

COO is also a member of the ESG Committee. The committee meets bi-monthly, or more frequently, as needed.

C1.3

(C1.3) Do you provide incentives for the management of climate-related issues, including the attainment of targets?

	Provide incentives for the management of climate-related issues	Comment
Row 1	No, not currently but we plan to introduce them in the next two years	

C2. Risks and opportunities

C2.1

(C2.1) Does your organization have a process for identifying, assessing, and responding to climate-related risks and opportunities?

Yes

C2.1a

(C2.1a) How does your organization define short-, medium- and long-term time horizons?

	From (years)	To (years)	Comment
Short-term	0	1	Considering the pace of technological change, short-term in the Hi-Tech sector is usually under one year.
Medium-term	1	3	Medium-term is usually between one and three years, and it reflects our goal setting time horizon. For example, our ESG goals have primarily been medium-term goals.
Long-term	3	5	Long-term is usually above three years.

C2.1b

(C2.1b) How does your organization define substantive financial or strategic impact on your business?

Marvell assesses climate -related risks as part of Marvell’s Enterprise Risk Management (ERM) process by identifying a potential impact of various risks. The scale of impact severity is defined as “low risk/opportunity, but not substantive” with the total impact of \$0-\$50 million, “medium risk/opportunity, but not substantive” with the total impact of \$50 - \$150 million, and “high risk/opportunity, substantive” with the total impact of greater than \$150 million. As such, Marvell defines a substantive financial impact from any climate-related risk or opportunity that would impact the company by a dollar amount above \$150 million. Marvell’s Executive Leadership Team (ELT) identifies risks in the following key business categories and determines the risk

impact (ranging from “manageable” to “major”, to “critical”) and likelihood of occurrence (ranging from “remote” to “possible”, to “likely”): Financial, Operational, Strategic, Sales, Engineering, Information, Organizational, Legal and Regulatory. The risks are classified into a risk matrix and the ELT considers the risk tolerance relative to industry peers as well as areas of focus. In developing and executing mitigation plans for each of these significant risks and areas of focus, the team will also evaluate publicly disclosed risks (such as those in Marvell’s Annual Report on the Form 10-K) and conduct discussions with relevant stakeholders. Marvell regularly updates the risk assessment and discusses it with the Board of Directors annually.

C2.2

(C2.2) Describe your process(es) for identifying, assessing and responding to climate-related risks and opportunities.

Value chain stage(s) covered

Direct operations
Upstream
Downstream

Risk management process

Integrated into multi-disciplinary company-wide risk management process

Frequency of assessment

More than once a year

Time horizon(s) covered

Short-term
Medium-term
Long-term

Description of process

Risk identification and assessment: At a corporate level, Marvell’s Executive Leadership Team (ELT) engages executive leaders from across mission-critical business to identify short-, medium-, and long-term risks in each of the key business categories: Financial, Operational, Strategic, Sales, Engineering, Information, Organizational, Legal and Regulatory. Timeline: more than once a year. Risks are then assessed in terms of their impact (ranging from “manageable” to “major”, to “critical”) based on financial consequences from the risk occurring, and likelihood of occurrence (ranging from “remote” to “possible”, to “likely”) at any point of our value chain (e.g., direct operations, upstream and downstream). The risks are classified into a risk matrix based on their impact and likelihood of occurrence, and the ELT then considers the risk tolerance relative to industry peers as well as areas of focus. Geographical areas considered in this process include all regions globally, where Marvell is actively operations (direct operations, upstream and downstream). Marvell periodically updates the corporate-level risk assessment, and the assessment results are discussed with C-suite level executives as well as the full Board of Directors annually.

As an example of a process used to identify climate-related risks, in FY 2023 (Jan 30, 2022 - Jan 28, 2023), Marvell worked to complement the ELT-led corporate-level risk assessment with TCFD-aligned quantitative climate risk and opportunity assessment to enhance our organizational adaptive capacity to potential climate change impacts and inform our business strategy. Our initial climate risk screening process included engagement of stakeholders across our mission-critical business functions in a series of climate workshops. The workshops allowed us to identify potential climate-related physical and transition risks and opportunities as well as evaluate our organizational vulnerability across our business planning timeframes - short (up to 1 year), medium (1-3 years) and long term (3-5 years) time horizons – as well as longer term climate time horizons of 10+ and 30+ years, as our business and people transition to a low-carbon economy. To obtain a deeper view into our top physical risks, we conducted a TCFD-aligned quantitative climate scenario analysis using the Shared Socioeconomic Pathways (SSP) scenarios across the 2030 and 2050 timeframes which leverage IPCC's AR6 climate models. To assess and evaluate the transition risks and opportunities for our business, we analyzed our risk exposure across all six Network for Greening the Financial System (NGFS) scenarios. We leveraged these scenarios as they incorporate key transition risk drivers such as policy reaction, policy intensity, regional policy variation, and rate of technology change and communicate the magnitude of different variations of those risk drivers through a clear carbon price metric. This analysis provided an indication of how resilient our strategy is to different future carbon policy developments which are aligned to a 1.5-2° C world. We also qualitatively evaluated how potential changes to climate policies as well as technological, market and reputational changes could create future risks and opportunities for us.

Responding to risks: In an effort to mitigate any identified potential risks, the ELT uses ERM risk prioritization criteria for risk impact and likelihood of occurrence and conducts discussions with relevant stakeholders to identify risk management actions. The ERM process informs cross-functional projects that are then developed in order to mitigate and respond to potential risks.

The results of our initial TCFD-aligned climate scenario analysis informed our mission-critical business functions, including Global Real Estate, Procurement, Legal, and Finance, enabled us to test the resilience of our management processes in the face of climate change, and begin the development of strategies to integrate the findings into our enterprise risk management program and low-carbon transition planning. For example, in FY23, we developed our first company-wide science-based target that is aligned with a 1.5C climate scenario and supports the goals of the Paris Agreement. As of July 2023, we plan to submit our SBT for validation by the Science Based Target Initiative imminently. Our SBT will be aligned with a 1.5°C climate scenario, supporting the goals of the Paris Agreement. This target will enable our efforts to mitigate climate-related risks by identifying and implementing carbon reduction opportunities, such as investing into renewable energy procurement across our direct operations, as well as engaging our direct suppliers around their carbon reduction efforts. We identify and

prioritize carbon reduction projects and initiatives on annual basis, as part of our annual CAPEX and OPEX planning process.

As a high priority climate-related opportunity, we also identified our capacity to develop more power-efficient semiconductor solutions due to the potential strategic and financial implications it could have on our customers. Investment in this opportunity could potentially help our customers reduce their energy consumption and associated energy costs during the use phase of our products.

C2.2a

(C2.2a) Which risk types are considered in your organization's climate-related risk assessments?

	Relevance & inclusion	Please explain
Current regulation	Relevant, always included	Current regulations are considered relevant and always included in our annual corporate-level risk assessment led by Marvell's Executive Leadership Team (ELT), because any changes in current country- or region-level climate regulations may impose risk to our ability to do business, if they are not monitored. Our ELT identifies key risks in each of the following categories and determines the absolute risk impact (ranging from "manageable" to "major", to "critical") and likelihood of occurrence (ranging from "remote" to "possible", to "likely"): Financial, Operational, Strategic, Sales, Engineering, Information, Organizational, Legal and Regulatory. Risks associated with current regulations, when applicable, fall under the Legal and Regulatory category. The risks are classified into a risk matrix and the ELT considers the risk tolerance relative to industry peers as well as areas of focus. Risk mitigation plans are developed and executed for each of these significant risks and areas of focus. Marvell periodically updates the corporate-level risk assessment and discusses it with the Board of Directors annually. Changes in current regulations, such as restrictions on GHG emissions, carbon pricing mechanisms, cap and trade programs, and mandatory climate-related disclosures may increase our indirect operating costs and impose a potential risk to Marvell, if we do not monitor and respond to these regulations appropriately and in a timely manner. Since our business is not energy intensive, our direct operations (mostly offices and several R&D hubs) fall below threshold requirements for current climate-related regulations.
Emerging regulation	Relevant, always included	Emerging regulations are considered relevant and always included in our annual corporate-level risk assessment led by Marvell's Executive Leadership Team (ELT), because more stringent requirements in current climate regulations and the development of new climate policies at a country- or regional level may impose risk to our ability to do business, if they are not monitored. Our ELT identifies key risks in each

		<p>of the following categories and determines the absolute risk impact (ranging from “manageable” to “major”, to “critical”) and likelihood of occurrence (ranging from “remote” to “possible”, to “likely”): Financial, Operational, Strategic, Sales, Engineering, Information, Organizational, Legal and Regulatory. Risks associated with emerging regulations, when applicable, fall under the Legal and Regulatory category. The risks are classified into a risk matrix and the ELT considers the risk tolerance relative to industry peers as well as areas of focus. Risk mitigation plans are developed and executed for each of these significant risks and areas of focus. Marvell periodically updates the corporate-level risk assessment and discusses it with the Board of Directors annually. Emerging regulations around any restrictions on GHG emissions, carbon pricing mechanisms, cap and trade programs, and mandatory climate-related disclosures may increase our indirect operating costs and impose a potential risk to Marvell, if we do not monitor and respond to these regulations appropriately and in a timely manner. Since our business is not energy intensive, our direct operations (mostly offices and several R&D hubs) fall below threshold requirements for current climate regulations, and no impacts from emerging regulations have been identified as potentially material to our business.</p>
Technology	Relevant, always included	<p>Technology related risks are considered relevant and always included in our annual corporate-level risk assessment led by Marvell’s Executive Leadership Team (ELT), because any changes in current or potential technology related requirements may impose risk to our ability to do business, if they are not monitored. Our ELT identifies key risks in each of the following categories and determines the absolute risk impact (ranging from “manageable” to “major”, to “critical”) and likelihood of occurrence (ranging from “remote” to “possible”, to “likely”): Financial, Operational, Strategic, Sales, Engineering, Information, Organizational, Legal and Regulatory. Risks associated with changes in technology, when applicable, fall under the Operational category. The risks are classified into a risk matrix and the ELT considers the risk tolerance relative to industry peers as well as areas of focus. Risk mitigation plans are developed and executed for each of these significant risks and areas of focus. Marvell periodically updates the corporate-level risk assessment and discusses it with the Board of Directors annually. Potential technology risks to Marvell’s business may be driven by carbon reduction requirements due to an increased demand from our customers for low-carbon and energy-efficient products. If we do not meet our customers’ requirements, we may be exposed to a reputational risk and have a lower ability to win new business. To mitigate this risk, our ESG, sales and business development teams regularly engage with customers to identify and evaluate customers’ climate-related requirements and ensure we have</p>

		<p>strategies in place to respond promptly and meet these needs. For example, in FY 2022 (reporting period), we set a goal to reduce power consumption of our products during the use phase with each product generation for set capabilities. This goal is tracked annually, and we continuously evaluate our progress towards this goal.</p>
Legal	Relevant, always included	<p>Legal risks are considered relevant and always included in our annual corporate-level risk assessment led by Marvell's Executive Leadership Team (ELT), because any potential non-compliance with regional, national and international climate policies and laws in locations where we operate, may impose risk to our ability to do business. If we are not able to respond to emerging regulations around any restrictions on GHG emissions, carbon pricing mechanisms, cap and trade programs, and mandatory climate-related disclosures, we may become exposed to increased liability. To mitigate this risk, our ESG team evaluates implications from any emerging climate-related regulations and ensures that we have strategies in place to respond promptly to evolving requirements. To date, we have not received any climate-related litigation claims and are not aware of any potential climate-related compliance issues. Our ELT identifies key risks in each of the following categories and determines the absolute risk impact (ranging from "manageable" to "major", to "critical") and likelihood of occurrence (ranging from "remote" to "possible", to "likely"): Financial, Operational, Strategic, Sales, Engineering, Information, Organizational, Legal and Regulatory. Legal risks, when applicable, fall under the Legal and Regulatory category. The risks are classified into a risk matrix and the ELT considers the risk tolerance relative to industry peers as well as areas of focus. Risk mitigation plans are developed and executed for each of these significant risks and areas of focus. Marvell periodically updates the corporate-level risk assessment and discusses it with the Board of Directors annually.</p>
Market	Relevant, always included	<p>Market risks are considered relevant and always included in our annual corporate-level risk assessment led by Marvell's Executive Leadership Team (ELT), because changes in market trends, including new customer preferences and evolving requirements for low-carbon and energy-efficient products, may impose risk to our ability to do business, if they are not monitored. Our ELT identifies key risks in each of the following categories and determines the absolute risk impact (ranging from "manageable" to "major", to "critical") and likelihood of occurrence (ranging from "remote" to "possible", to "likely"): Financial, Operational, Strategic, Sales, Engineering, Information, Organizational, Legal and Regulatory. Risks associated with changes in market trends, when applicable, fall under the Strategic category. The risks are classified into a risk matrix and the ELT considers the risk tolerance relative to industry peers as well as areas of focus. Risk mitigation plans are developed and executed for each of these significant risks and areas of</p>

		<p>focus. Marvell periodically updates the corporate-level risk assessment and discusses it with the board of directors annually. If we do not appropriately respond to market shifts and our customers' evolving requirements for low-carbon and energy-efficient products, we may be exposed to a reputational risk and have a lower ability to maintain our market share and win new business. To mitigate this risk, our ESG, sales and business development teams regularly engage with customers to identify and evaluate customers' climate-related requirements and ensure we have strategies in place to respond promptly and meet these needs. For example, in FY 2022 (reporting period), we set a goal to reduce power consumption of our products during the use phase with each product generation for set capabilities. This goal is tracked annually, and we continuously evaluate our progress towards this goal.</p>
Reputation	Relevant, always included	<p>Reputational risks are relevant and always included in our annual corporate-level risk assessment led by Marvell's Executive Leadership Team (ELT), because if we do not respond appropriately to stakeholders' concerns and requests around Marvell's low-carbon transition strategy, we may be exposed to a reputational risk, inhibiting our ability to access capital, maintain our market share and grow our business. Our ELT identifies key risks in each of the following categories and determines the absolute risk impact (ranging from "manageable" to "major", to "critical") and likelihood of occurrence (ranging from "remote" to "possible", to "likely"): Financial, Operational, Strategic, Sales, Engineering, Information, Organizational, Legal and Regulatory. Reputational risks, when applicable, fall under the Strategic category. The risks are classified into a risk matrix and the ELT considers the risk tolerance relative to industry peers as well as areas of focus. Risk mitigation plans are developed and executed for each of these significant risks and areas of focus. Marvell periodically updates the corporate-level risk assessment and discusses it with the board of directors annually. Potential reputational risks to Marvell may be associated with investor-driven enhanced requirements for climate-related disclosures and customer-driven requirements for low-carbon and energy-efficient products. To mitigate this risk, our ESG team regularly engages in conversations with investors and customers to ensure that Marvell responds to climate-related requests appropriately and in a timely manner. Marvell is also continually enhancing transparency and we are now in the process of developing our first annual ESG Report to communicate our progress to date as it relates to environmental, social and governance matters, including our climate-related strategy, commitments and performance.</p>
Acute physical	Relevant, always included	<p>Acute physical climate risks are relevant and always included in our annual corporate-level risk assessment led by Marvell's Executive Leadership Team (ELT). We monitor potential exposure of our</p>

		<p>suppliers to extreme weather events to ensure we maintain our ability to provide timely delivery of our products and services to our customers. We use a third-party tool to map, assess and monitor our supply chain operations and receive timely alerts about any incidents that take place in the vicinity of our supplier sites and that could impact any operations, logistics, and infrastructure in an incident area. Based on this information, we determine the geographic scope of an incident, communicate potential impacts to our suppliers and align planning with Operations. If we do not monitor these risks, we may experience disruption in our supply chain, logistics providers, and other business partners. As a result, we may fail to perform critical business functions and experience delays in the shipment of our products, incurring additional costs, eroding relationships with our customers, and ultimately experiencing impacts on our revenue. Our ELT identifies key risks in each of the following categories and determines the risk impact (ranging from “manageable” to “major”, to “critical”) and likelihood of occurrence (ranging from “remote” to “possible”, to “likely”): Financial, Operational, Strategic, Sales, Engineering, Information, Organizational, Legal and Regulatory. The risks are classified into a risk matrix and the ELT considers the risk tolerance relative to industry peers as well as areas of focus. Acute physical risks, when applicable, fall under the Operational category. Mitigation plans are developed and executed for each of these risks and areas of focus. Marvell periodically updates the corporate-level risk assessment and discusses it with the Board of Directors annually. Acute physical risks are managed through Marvell’s internal Business Continuity Process (BCP). The execution of the BCP is overseen by the COO. If a climate-related disaster were to occur, the COO would escalate the incident to the CEO, as necessary. The incident would be reported to Security and the Crises Management Team, which will evaluate if the reported information meets criteria for a company-wide disaster. In such case, the COO will develop a resolution based on the assessment and evaluation presented by the Crises Management team.</p>
Chronic physical	Relevant, always included	<p>Chronic physical climate-related risks are relevant and always included in our annual corporate-level risk assessment led by Marvell’s Executive Leadership Team (ELT), because if we fail to respond to adverse impacts of chronic risks, such as prolonged droughts and sea level rise, we may experience business disruptions. Since Marvell is a global company with an extensive supply chain network, we monitor potential exposure of our suppliers to chronic physical climate-related risks to maintain our ability to provide timely delivery of our products and service to our customers. We use a third-party tool to map, assess and monitor our supply chain operations and receive timely alerts about any incidents that take place in the vicinity of our supplier sites and that could impact their operations, logistics, and infrastructure in an incident</p>

		<p>area. Based on this information, we determine the geographic scope of an incident, communicate potential impacts to our suppliers and align planning with Operations. Potential impacts from chronic physical risks on our suppliers could include power outages, water stress, and physical damage to their facilities. Our ELT identifies key risks in each of the following categories and determines the risk impact (ranging from “manageable” to “major”, to “critical”) and likelihood of occurrence (ranging from “remote” to “possible”, to “likely”): Financial, Operational, Strategic, Sales, Engineering, Information, Organizational, Legal and Regulatory. The risks are classified into a risk matrix and the ELT considers the risk tolerance relative to industry peers as well as areas of focus. Chronic physical risks, when applicable, fall under the Operational category. Mitigation plans are developed and executed for each of these risks and areas of focus. Marvell periodically updates the corporate-level risk assessment and discusses it with the Board of Directors annually. Chronic physical risks are managed through Marvell’s internal Business Continuity Process (BCP). The execution of the BCP is overseen by the COO. If a climate-related disaster were to occur, the COO would escalate the incident to the CEO, as necessary. The incident would be reported to Security and the Crises Management Team, which will evaluate if the reported information meets criteria for a company-wide disaster. In such case, the COO will develop a resolution based on the assessment and evaluation presented by the Crises Management team.</p>
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C2.3

(C2.3) Have you identified any inherent climate-related risks with the potential to have a substantive financial or strategic impact on your business?

No

C2.3b

(C2.3b) Why do you not consider your organization to be exposed to climate-related risks with the potential to have a substantive financial or strategic impact on your business?

	Primary reason	Please explain
Row 1	Evaluation in process	<p>In FY23 (reporting year), we did not identify any climate-related risks that could be substantive for Marvell’s ability to do business. We believe that Marvell is not exposed to climate-related risks, as our climate risk assessment did not take into account quantification of financial impacts of climate risks. Since our evaluation is still in progress, we are unable to make precise financial estimates for these risks. We plan to conduct a more detailed asset-level quantitative assessment to quantify potential financial impacts of risks and opportunities.</p>

		<p>In FY 2023 (reporting period), Marvell worked to complement our annual corporate-level ERM process with TCFD-aligned quantitative climate risk and opportunity assessment. This assessment aimed to identify and evaluate potential physical and transition climate risks and opportunities and identify ways to enhance our organizational adaptive capacity and inform our business strategy. To examine potential physical risks, we conducted climate scenario analysis using the Shared Socioeconomic Pathways (SSP) scenarios across the 2030 and 2050 timeframes which leverage IPCC's AR6 (Sixth Assessment Report) climate models. To examine potential transition risks and opportunities, we applied all six Network for Greening the Financial System (NGFS) scenarios. This analysis provided an indication of how resilient our business strategy is to different future carbon policy developments which are aligned to a 1.5-2° C world. We also qualitatively evaluated how potential changes to climate policies as well as technological, market and reputational changes could create future risks and opportunities for us. Due to the long-time horizons (2030 and 2050) of our climate scenario analysis, the potential risks considered in our assessment are not financial forecasts, but broad conceptualizations of possible business and financial impact pathways. Additionally, our physical risk assessment did not consider any efforts around potential enhancement of our own or our suppliers' adaptive capacity and ability to respond to future impacts of climate change. Since our evaluation is still in progress, we are unable to make precise financial estimates for these risks, and hence we are not disclosing any risks in FY23 (reporting period). In our future work, we plan to conduct asset-level quantitative assessment and quantify not only potential climate-related but also financial impacts of risks and opportunities.</p>
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C2.4

(C2.4) Have you identified any climate-related opportunities with the potential to have a substantive financial or strategic impact on your business?

Yes

C2.4a

(C2.4a) Provide details of opportunities identified with the potential to have a substantive financial or strategic impact on your business.

Identifier

Opp1

Where in the value chain does the opportunity occur?

Downstream

Opportunity type

Products and services

Primary climate-related opportunity driver

Development of new products or services through R&D and innovation

Primary potential financial impact

Increased revenues resulting from increased demand for products and services

Company-specific description

Since Marvell is a fabless semiconductor company focused on product design, our biggest climate-related opportunity is associated with our potential to develop new semiconductor products that require less power during the use phase, ultimately increasing energy efficiency of devices and data infrastructure systems that incorporate our products, and reducing our downstream greenhouse gas emissions. Our company plays an important role in improving the overall efficiency of clouds, enterprise networks, and automobiles by developing products that continuously increase performance per Watt. For example, for our data-processing units, we design our silicon by using more power-efficient processors, memory and storage devices, and optimize the architecture of the circuitry. We also design in smaller, advanced technologies, which requires less power. With the launch of the OCTEON 10 DPU processor family, we have enabled a threefold increase in compute performance and a 50% reduction in power over previous generations. Another example is our storage products, in which we reduce power by using higher-density disks, new and custom architectures, power management features and enabling special flash memory chips that are more power-efficient. For example, when we launched our Bravera™ SC5 SSD Controller, several of its attributes, such as virtualization, improved power-performance efficiency by 40% compared to previous generations of Marvell SSD controllers.

Since Scope 3 GHG emissions from electricity consumption in the use phase of our products make up the largest part of our company-wide carbon footprint, in FY23, we developed our first company-wide science-based target (SBT). In addition to focusing on Scope 1 and 2 GHG emissions, our SBT also focuses on Scope 3 emissions, and we aim to reduce energy intensity and emissions of our products in the use phase. As of July 2023, we plan to submit our SBT for validation by SBTi imminently. This goal will be tracked annually, and we will be continuously evaluating and reporting our progress towards this goal. As the costs of electricity continue to increase globally, we will be capitalizing on our opportunity to partner with our existing and new customers and enable more energy efficient products, helping them to reduce their energy consumption in the use phase, and the associated GHGs and operating costs.

Time horizon

Medium-term

Likelihood

Virtually certain

Magnitude of impact

Medium-high

Are you able to provide a potential financial impact figure?

Yes, a single figure estimate

Potential financial impact figure (currency)

5,919,600,000

Potential financial impact figure – minimum (currency)

Potential financial impact figure – maximum (currency)

Explanation of financial impact figure

Developing products with lower power is a competitive differentiator for us, and we integrate power efficiency considerations in the design of all products in our portfolio. Therefore, the potential financial impact figure of \$5.919 billion reported is calculated based on Marvell's FY 2023 total revenue. Our FY 2023 revenue represents our total revenue from five key end markets that we serve: data center, carrier infrastructure, enterprise networking, consumer, and automotive/industrial. We serve these five end markets with a broad portfolio of semiconductor solutions based on our compute, networking, security, electro-optics, and storage technologies, which are essential and differentiating for these markets. We calculated our total potential financial impact as follows: \$2.41 bln (data centers) + \$1.37 bln (enterprise networking) + \$1.09 bln (carrier infrastructure) + \$701 mln (consumer) + 356 mln (automotive). We categorize revenue from our five end markets by using a number of data points, including: (1) the type of customer purchasing the product, (2) the function of our product being sold, and (3) our knowledge of the end customer product or application into which our product will be incorporated.

Cost to realize opportunity

2,627,900,000

Strategy to realize opportunity and explanation of cost calculation

We are increasingly identifying and capitalizing on opportunities to develop more energy efficient products to continue serving our customers and meet their demand for more energy efficient semiconductor solutions. Our research and development efforts are directed largely to the development of high-performance products with lowest power. We devote a significant portion of our resources on an annual basis to expanding our product portfolio based on a broad intellectual property portfolio with designs that are intended to enable high-performance, reliable communications over a variety of physical transmission media.

Case Study: In FY 2023 (reporting period), Marvell established an internal cross-functional Responsible Product Design and product Power Working Groups that meet monthly and have a special focus on identifying, pursuing and enabling product solutions with higher energy efficiency. Its first priority was to mobilize the implementation of R&D solutions targeting product power across the company. To reduce power consumption of our products during the use phase, we collaborate on low

power design methods and computer aided design (CAD) tools, we encourage development of power saving circuits, and we raise awareness of novel chip packaging approaches to manage thermal heat. Since emissions from electricity consumption in the use phase of our products make up the largest part of our company-wide carbon footprint, in FY23, we developed our science-based target (SBT). Our SBT also focuses on Scope 3 emissions, and we aim to reduce energy intensity and emissions of our products in the use phase. As of July 2023, we plan to submit our SBT for validation by SBTi imminently.

Cost calculation: Design of more energy efficient products is part of Marvell's annual R&D operating expenses as well as selling, general and administrative costs, which is cumulatively equal to \$2.63 bln. Our FY 2023 R&D costs were around \$1.78 bln and included: (1) costs from our acquisitions (including the addition of new employees), (2) depreciation and amortization costs, and (3) engineering design costs. Our selling, general and administrative costs were \$843.6 mln. Therefore, our total costs associated with this climate-related opportunity were \$2.63 bln and were calculated as follows: 1.78 bln (R&D costs) + 843.6 mln (selling, general, and admin costs). For more information about our R&D expenses, please refer to Marvell's FY 2023 Annual Report on Form 10-K.

Comment

C3. Business Strategy

C3.1

(C3.1) Does your organization's strategy include a climate transition plan that aligns with a 1.5°C world?

Row 1

Climate transition plan

Yes, we have a climate transition plan which aligns with a 1.5°C world

Publicly available climate transition plan

No

Mechanism by which feedback is collected from shareholders on your climate transition plan

We have a different feedback mechanism in place

Description of feedback mechanism

We proactively engage with our investors and stakeholders throughout the year on a broad range of topics, including those related to ESG and climate strategy. We regularly engage with our investors directly through one-on-one meetings, as well as through our Investor Days (every 18 months) and regular roadshows. During our engagements, we

collect investors’ feedback, which we then share with our senior executives and the Board. Since our Board represents the interests of our shareholders and makes corporate decisions on their behalf, we consider our engagement with the Board an additional feedback mechanism. The Board provides their feedback during quarterly meetings, during which our EVP and Chief Legal Officer provides updates on our ESG programs and initiatives, including our progress on climate goals and commitments, low-carbon transition planning and carbon reduction achievement roadmap development and implementation.

Frequency of feedback collection

More frequently than annually

Attach any relevant documents which detail your climate transition plan (optional)

C3.2

(C3.2) Does your organization use climate-related scenario analysis to inform its strategy?

	Use of climate-related scenario analysis to inform strategy
Row 1	Yes, qualitative and quantitative

C3.2a

(C3.2a) Provide details of your organization’s use of climate-related scenario analysis.

Climate-related scenario	Scenario analysis coverage	Temperature alignment of scenario	Parameters, assumptions, analytical choices
Transition scenarios Customized publicly available transition scenario	Company-wide	1.5°C	<p>To assess and evaluate the transition risks and opportunities for our business, we applied a customized version of the Network for Greening the Financial System (NGFS) “Divergent Net Zero” and “Net Zero 2050” scenarios to analyze a scenario aligned with a 1.5°C policy ambition.</p> <p>Parameters: We used the NGFS scenarios as the basis for our analysis, as they incorporate key transition risk parameters, such as policy developments which are aligned to a 1.5°C world (i.e., immediate and smooth policy reaction), the fast rate of technology change, and communicate the magnitude of different variations of those risk drivers through a clear carbon price metric. The NGFS scenarios have been developed by central financial</p>

			<p>institutions from eight major economies and build on IPCC assessments, socioeconomic assumptions, and three different climate integrated assessment models. Through a shadow emissions price, the scenarios provide a proxy for government policy intensity, and changes in technology and consumer preferences.</p> <p>Assumptions: Using Marvell's assumptions around emissions growth for Scopes 1, 2, and 3 GHG emissions, and assuming that costs of emissions would be passed to Marvell throughout our value chain, Marvell examined our 2030 and 2050 possible carbon pricing exposure. This analysis provided an indication of how resilient our strategy is to different future carbon policy developments. We found that the scenarios, where policy decarbonization action is delayed, are of highest risk to our business. Our efforts to set a science-based target aligned with a 1.5°C scenario could significantly mitigate our future transition risk exposure.</p> <p>Analytical choices: We considered two timeframes – 2030 and 2050, and we applied three different integrated assessment models - GCAM 5.3, MESSAGEix-GLOBIOM, and REMIND-MAgPIE 4.2. NGFS pricing is driven by the Global Change Analysis Model (“GCAM”), an integrated assessment tool that represents the behavior and complex interactions between energy systems, water, agriculture and land use, economy, and climate.</p>
<p>Transition scenarios Customized publicly available transition scenario</p>	<p>Company-wide</p>	<p>1.6°C – 2°C</p>	<p>To assess and evaluate the transition risks and opportunities for our business, we applied the Network for Greening the Financial System (NGFS) “Below 2°C” and “Delayed Transition to Net Zero” scenarios to analyze a scenario aligned with a 1.6°C – 2°C policy ambition.</p> <p>Parameters: We used the NGFS scenarios as the basis for our analysis, as they incorporate key transition risk parameters, such as policy developments which are aligned to a 1.6-2°C world (i.e., immediate and smooth policy reaction under “Below 2°C”, and delayed policy reaction under</p>

			<p>“Delayed transition”), as well as the rate of technology change (moderate to fast change), and communicate the magnitude of different variations of those risk drivers through a clear carbon price metric. The NGFS scenarios have been developed by central financial institutions from eight major economies and build on IPCC assessments, socioeconomic assumptions, and three different climate integrated assessment models. Through a shadow emissions price, the scenarios provide a proxy for government policy intensity, and changes in technology and consumer preferences.</p> <p>Assumptions: Using Marvell’s assumptions around emissions growth for Scopes 1, 2, and 3 GHG emissions, and assuming that costs of emissions would be passed to Marvell throughout our value chain, Marvell examined our 2030 and 2050 possible carbon pricing exposure. This analysis provided an indication of how resilient our strategy is to different future carbon policy developments. We found that the scenarios, where policy decarbonization action is delayed, are of highest risk to our business. Our efforts to set a science-based target aligned with a 1.5°C scenario could significantly mitigate our future transition risk exposure.</p> <p>Analytical choices: We considered two timeframes – 2030 and 2050, and we applied three different integrated assessment models - GCAM 5.3, MESSAGEix-GLOBIOM, and REMIND-MAGPIE 4.2. NGFS pricing is driven by the Global Change Analysis Model (“GCAM”), an integrated assessment tool that represents the behavior and complex interactions between energy systems, water, agriculture and land use, economy, and climate.</p>
<p>Transition scenarios Customized publicly available transition scenario</p>	<p>Company-wide</p>	<p>2.1°C - 3°C</p>	<p>To assess and evaluate the transition risks and opportunities for our business, we applied the Network for Greening the Financial System (NGFS) “Nationally Determined Contributions” (NDCs) scenario to analyze a scenario aligned with a 2.1°C - 3°C policy ambition.</p> <p>Parameters: We used the NGFS scenarios as the</p>

			<p>basis for our analysis, as they incorporate key transition risk parameters, such as policy developments which are aligned to a 2.1-3°C world (i.e., aligned with NDCs), as well as the rate of technology change (slow change), and communicate the magnitude of different variations of those risk drivers through a clear carbon price metric. The NGFS scenarios have been developed by central financial institutions from eight major economies and build on IPCC assessments, socioeconomic assumptions, and three different climate integrated assessment models. Through a shadow emissions price, the scenarios provide a proxy for government policy intensity, and changes in technology and consumer preferences.</p> <p>Assumptions: Using Marvell’s assumptions around emissions growth for Scopes 1, 2, and 3 GHG emissions, and assuming that costs of emissions would be passed to Marvell throughout our value chain, Marvell examined our 2030 and 2050 possible carbon pricing exposure. This analysis provided an indication of how resilient our strategy is to different future carbon policy developments. We found that the scenarios, where policy decarbonization action is delayed, are of highest risk to our business. Our efforts to set a science-based target aligned with a 1.5°C scenario could significantly mitigate our future transition risk exposure.</p> <p>Analytical choices: We considered two timeframes – 2030 and 2050, and we applied three different integrated assessment models - GCAM 5.3, MESSAGEix-GLOBIOM, and REMIND-MAgPIE 4.2. NGFS pricing is driven by the Global Change Analysis Model (“GCAM”), an integrated assessment tool that represents the behavior and complex interactions between energy systems, water, agriculture and land use, economy, and climate.</p>
<p>Transition scenarios Customized publicly available</p>	<p>Company-wide</p>	<p>3.1°C - 4°C</p>	<p>To assess and evaluate the transition risks and opportunities for our business, we applied the Network for Greening the Financial System (NGFS) “Current Policies” scenario to analyze a scenario aligned with a 3.1°C - 4°C policy ambition.</p>

<p>transition scenario</p>			<p>Parameters: We used the NGFS scenarios as the basis for our analysis, as they incorporate key transition risk parameters, such as policy developments which are aligned to a 3.1-4°C world (i.e., current policies, no change), the rate of technology change (slow change), and communicate the magnitude of different variations of those risk drivers through a clear carbon price metric. The NGFS scenarios have been developed by central financial institutions from eight major economies and build on IPCC assessments, socioeconomic assumptions, and three different climate integrated assessment models. Through a shadow emissions price, the scenarios provide a proxy for government policy intensity, and changes in technology and consumer preferences.</p> <p>Assumptions: Using Marvell’s assumptions around emissions growth for Scopes 1, 2, and 3 GHG emissions, and assuming that costs of emissions would be passed to Marvell throughout our value chain, Marvell examined our 2030 and 2050 possible carbon pricing exposure. This analysis provided an indication of how resilient our strategy is to different future carbon policy developments. We found that the scenarios, where policy decarbonization action is delayed, are of highest risk to our business. Our efforts to set a science-based target aligned with a 1.5°C scenario could significantly mitigate our future transition risk exposure.</p> <p>Analytical choices: We considered two timeframes – 2030 and 2050, and we applied three different integrated assessment models - GCAM 5.3, MESSAGEix-GLOBIOM, and REMIND-MAGPIE 4.2. NGFS pricing is driven by the Global Change Analysis Model (“GCAM”), an integrated assessment tool that represents the behavior and complex interactions between energy systems, water, agriculture and land use, economy, and climate.</p>
<p>Physical climate</p>	<p>Company-wide</p>		<p>In FY23 (reporting period), we completed an initial climate risk screening that was followed by a quantitative scenario analysis aligned with the TCFD</p>

<p>scenarios RCP 4.5</p>			<p>recommendations. To obtain a deeper view into our top physical risks, we applied three Shared Socioeconomic Pathways (SSP) scenarios across the 2030 and 2050 timeframes which leverage IPCC’s AR6 climate models and represent lower and upper boundary conditions and support our analysis under both low-carbon transition as well as business-as-usual, worse-case scenario emissions trajectories.</p> <p>Parameters: The SSP2-4.5 (aligned with RCP 4.5 and 2.7°C warming) is a “middle of the road scenario”, in which CO2 emissions hover around current levels before starting to fall mid-century, but do not reach net-zero by 2100. SSP-based scenarios combine elements from the new narratives about future societal development (the SSPs) with the previous iteration of scenarios, the Representative Concentration Pathways (RPCs), which describe trajectories of change in atmospheric GHG and aerosol concentrations over time. Some of the key parameters include: population, education, urbanization, gross domestic product (GDP), economic growth, rate of technological developments, greenhouse gas (GHG) and aerosol emissions, energy supply and demand, land-use changes, among others.</p> <p>Assumptions: The world follows a path in which social, economic, and technological trends do not shift markedly from historical patterns. Development and income growth proceeds unevenly, with some countries making relatively good progress while others fall short of expectations. Global and national institutions work toward but make slow progress in achieving sustainable development goals. Environmental systems experience degradation, although there are some improvements and overall the intensity of resource and energy use declines. Global population growth is moderate and levels off in the second half of the century.</p> <p>Analytical choices: The SSP2-4.5 (aligned with RCP 4.5 and 2.7°C warming) is a “middle of the road scenario”, in which CO2 emissions hover around current levels before starting to fall mid-century, but</p>
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			do not reach net-zero by 2100. The scenario leverages IPCC's sixth assessment report (AR6) which features the Sixth Phase of the Coupled Model Intercomparison Project (CMIP6) comprising of 23 individual MIPs. In this analysis, we considered two timeframes – 2030 and 2050.
Physical climate scenarios RCP 8.5	Company-wide		<p>In FY23 (reporting period), we completed an initial climate risk screening that was followed by a quantitative scenario analysis aligned with the TCFD recommendations. To obtain a deeper view into our top physical risks, we applied three Shared Socioeconomic Pathways (SSP) scenarios across the 2030 and 2050 timeframes which leverage IPCC's AR6 climate models and represent lower and upper boundary conditions and support our analysis under both low-carbon transition as well as business-as-usual, worse-case scenario emissions trajectories.</p> <p>Parameters: The SSP5-8.5 scenario (aligned with RCP 8.5 and 4.7°C warming) was considered a “pessimistic scenario”, in which current CO2 emissions levels roughly double by 2050. Our physical risk scenario analysis assessed potential impacts of climate change on a number of locations, including owned and leased sites within our direct operations and key direct supplier sites.</p> <p>Assumptions: This world places increasing faith in competitive markets, innovation and participatory societies to produce rapid technological progress and development of human capital as the path to sustainable development. Global markets are increasingly integrated.</p> <p>There are strong investments in health, education, and institutions to enhance human and social capital. The push for economic and social development is coupled with the exploitation of abundant fossil fuel resources and the adoption of resource and energy intensive lifestyles around the world. All these factors lead to rapid growth of the global economy, while global population peaks and declines in the 21st century. Local environmental problems like air pollution are successfully managed.</p>

			<p>Analytical choices: The SSP5-8.5 scenario (aligned with RCP 8.5 and 4.7°C warming) was considered a “pessimistic scenario”, in which current CO2 emissions levels roughly double by 2050. The scenario leverages IPCC’s sixth assessment report (AR6) which features the Sixth Phase of the Coupled Model Intercomparison Project (CMIP6) comprising of 23 individual MIPs. In this analysis, we considered two timeframes – 2030 and 2050.</p>
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C3.2b

(C3.2b) Provide details of the focal questions your organization seeks to address by using climate-related scenario analysis, and summarize the results with respect to these questions.

Row 1

Focal questions

In FY23, we completed a climate risk screening process and a TCFD-aligned quantitative climate risk and opportunity assessment. Our initial climate risk screening process included engagement of stakeholders across our mission-critical business functions in a series of climate workshops. The workshops allowed us to identify potential climate-related physical and transition risks and opportunities as well as evaluate our organizational vulnerability across our business planning timeframes - short (up to 1 year), medium (1-3 years) and long-term (3-5 years) business planning time horizons – as well as longer term climate time horizons of 10+ and 30+ years, as our business and people transition to a low-carbon economy.

To obtain a deeper view into our top physical risks, we conducted a TCFD-aligned quantitative climate scenario analysis using the Shared Socioeconomic Pathways (SSP) scenarios across the 2030 and 2050 timeframes which leverage IPCC’s AR6 climate models and represent lower and upper boundary conditions and support our analysis under both low-carbon transition as well as business-as-usual, worse-case scenario emissions trajectories. To assess and evaluate the transition risks and opportunities for our business, we applied all six Network for Greening the Financial System (NGFS) scenarios, which incorporate policy reaction, policy intensity, regional policy variation, and rate of technology change, and communicate the magnitude of different variations of those risk drivers through a carbon price metric.

Key focal questions explored in our climate risk assessment included:

- (1) What are top physical climate risks that could affect our direct operations and our supply chain in the future?
- (2) What are top transition climate risks and opportunities that could affect our direct operations and our supply chain in the future?

(3) What is Marvell’s exposure to potential climate risks in the mid- and long-term climate time horizons (10+ years and 30+ years)?

Results of the climate-related scenario analysis with respect to the focal questions

Results of the conducted scenario analysis: Our preliminary scenario analysis indicated that within our operations, only our owned site in Santa Clara, California (USA) could observe increasing impacts of both drought and flooding coupled with local power outages. According to the U.S.’s Energy Information Administration data, 11% of California’s electrical grid mix is attributed to hydropower, therefore in Santa Clara water stress induced by prolonged drought events could potentially impact our electricity supply. Similarly, our supplier operating facilities in Taiwan could see increased risk of drought and flooding coupled with storm surges. Due to the long-time horizons (2030 and 2050) analyzed for our climate scenario analysis, the identified potential risks are not financial forecasts, but broad conceptualizations of possible business and financial impact pathways. Additionally, our physical risk assessment did not consider any efforts around potential enhancement of our own or our suppliers’ adaptive capacity and ability to respond to future climate-related impacts.

How the results have informed our decision and actions: With the results of this initial analysis, over the short-term timeframe (up to 1 year), we have been able to inform our key business functions, including Global Real Estate, Procurement, Legal, and Finance, test the resilience of our management processes in the face of climate change, and begin the development of strategies to integrate the findings into our ERM process and low-carbon transition planning.

Example of actions we took over longer term timeline include:

- (1) Joining the CDP Supply Chain program to engage our direct suppliers to better understand their GHG emission data and evaluate how they are integrating climate considerations into their business plans and strategies (in FY 2023).
- (2) Developing water action plans for sites where we have operational control to enhance our operational resilience and preparedness to potential water risks, such as drought (by FY 2025).
- (3) Conducting more detailed supplier risk assessment to better understand our suppliers’ exposure to potential climate and water-related risks and how they are enhancing their own risk preparedness and operational resilience (by FY 2025).

C3.3

(C3.3) Describe where and how climate-related risks and opportunities have influenced your strategy.

Have climate-related risks and opportunities influenced your strategy in this area?	Description of influence

<p>Products and services</p>	<p>Yes</p>	<p>Marvell's strategy has been influenced by climate-related opportunities associated with developing more energy efficient products over the medium time horizon. When designing our products, we focus not only on product performance, capacity and security, but we also develop design solutions that help reduce Marvell product energy consumption during the use phase, making devices that contain our products more energy efficient and causing a reduction in our downstream GHG emissions. One of the most substantial strategic decisions that we have made influenced by this opportunity is developing a science-based target aligned with a 1.5°C climate scenario to reduce product use emissions by improving energy efficiency of our products. As of July 2023, we plan to submit our target to SBTi imminently. This goal will be tracked annually, and we will continuously evaluate and report our progress towards this goal. To intentionally pursue design solutions that could help achieve energy efficiency of our products, in FY 2023, we established a new working group at Marvell with a specific focus on Responsible Product Design. Its first priority was to mobilize the implementation of R&D solutions targeting product power across the company. To reduce power consumption of our products during the use phase, we collaborate on low-power design methods and computer-aided design (CAD) tools, we encourage development of power-saving circuits, and we raise awareness of novel chip packaging approaches to manage thermal heat. Our ESG team also regularly reviews proposed product design solutions in our internal IP submission system, to identify energy-efficient solutions and engage with respective business units to explore and promote opportunities to pursue energy-efficient designs.</p>
<p>Supply chain and/or value chain</p>	<p>Yes</p>	<p>Marvell's strategy has been influenced by climate-related risks associated with our supply chain over the medium and long-term time horizon. In FY 2023, to obtain a deeper understanding of our supply chain exposure to potential climate risks, we conducted a TCFD-aligned quantitative climate scenario analysis using the Shared Socioeconomic Pathways (SSP) scenarios across the 2030 and 2050 timeframes which leverage IPCC's AR6 climate models. Our preliminary scenario analysis indicated that our supplier operating facilities in Taiwan could see increased risk of drought and flooding coupled with storm surges. For example, in 2021, a prolonged drought in Taiwan caused cuts to the water supply for a major chip making hub. Due to</p>

		<p>the long-time horizons (2030 and 2050) analyzed for our climate scenario analysis, the identified potential risks are not financial forecasts, but broad conceptualizations of possible business and financial impact pathways. Additionally, our physical risk assessment did not consider any efforts around potential enhancement of our own or our suppliers' adaptive capacity and ability to respond to future impacts of climate change. With the results of this initial analysis, we have been able to inform our key business functions, including Procurement, Legal, and Finance, test the resilience of our management processes in the face of climate change, and begin the development of strategies to integrate the findings into our enterprise risk management program and low-carbon transition planning. We will continue to update our risk assessment and engage and inform key internal and external stakeholders. In addition, as a multinational fabless semiconductor company with a global footprint and thousands of stakeholders around the world, we are well positioned to pursue opportunities to engage our manufacturing, assembly and testing suppliers around greenhouse gas reduction through supplier assessment, training, prioritization and management. One of the largest categories of our upstream Scope 3 GHG emissions is associated with our suppliers' operations, and in FY 2023 (reporting period), we joined the CDP Supply Chain program and started requesting GHG information from our direct suppliers. Partnering with our suppliers around carbon reduction will help us achieve our climate commitments.</p>
Investment in R&D	Yes	<p>Marvell's strategy has been influenced by climate-related opportunities associated with enhancing our R&D capabilities, pursuing innovation, and developing lower-carbon and more energy efficient products over a medium time horizon. When designing our products, we focus not only on performance, capacity and security, but we also develop design solutions that help reduce Marvell product energy consumption during the use phase, making data infrastructure systems that contain our products (e.g., data centers, 5G, and automotive) more energy efficient and leading to a reduction in our downstream GHG emissions and in operational GHG emissions of our customers. One of the most substantial strategic decisions that we have made in FY23 (reporting) influenced by this opportunity is developing a science-based target aligned with a 1.5°C climate scenario (to be validated by SBTi) to reduce product use emissions by improving energy efficiency of our</p>

		<p>products. This goal will be tracked annually, and we will continuously evaluate and report our progress towards this goal. To intentionally pursue design solutions that could help achieve energy efficiency of our products, in FY 2023, we established a new working group at Marvell with a specific focus on Responsible Product Design. Its first priority was to mobilize the implementation of R&D solutions targeting product power across the company. To reduce power consumption of our products during the use phase, we collaborate on low-power design methods and computer-aided design (CAD) tools, we encourage development of power-saving circuits, and we raise awareness of novel chip packaging approaches to manage thermal heat. Our ESG team also regularly reviews proposed product design solutions in our internal IP submission system, to identify energy-efficient solutions and engage with respective business units to explore and promote opportunities to pursue energy-efficient designs.</p>
Operations	Yes	<p>Marvell is continuing to pursue climate-related opportunities to enhance energy and resource efficiency within our operations over medium and long-term time horizons. The most substantial decision that we have made in FY 2023 (reporting period) influenced by this opportunity is developing a science-based target aligned with a 1.5°C climate scenario (approval by SBTi is in progress). Our target will cover both our direct (Scope 1 and Scope 2) GHG emissions, as well as our value chain (Scope 3) emissions. As part of our target achievement roadmap, we plan to implement onsite energy reduction measures across our facilities as well as to procure renewable energy for our direct operations, thereby reducing our Scope 1 and market-based Scope 2 emissions. To date, we have implemented onsite solar panels at our Santa Clara campus that enable one of our buildings to run on renewable energy. In addition, we deployed third-party data centers operated by one of the leading data center colocation providers that runs all its facilities on 100% renewable energy and provides Marvell with a Sustainability Certificate for using 100% Renewable Energy. This certificate demonstrates that our data center colocation provider has retired Renewable Energy Credits (RECs) on behalf of Marvell, enabling Marvell to designate our energy consumption from our US-based data centers as 100% renewable. These RECs were generated by US-based solar farms and comply with principles of locality and additionality.</p>

C3.4

(C3.4) Describe where and how climate-related risks and opportunities have influenced your financial planning.

	Financial planning elements that have been influenced	Description of influence
Row 1	Revenues Capital allocation	<p>Revenues: Marvell’s strategy has been influenced by climate-related opportunities associated with developing lower-carbon and more energy efficient products. When designing our products, we focus not only on product performance, capacity and security, but we also develop design solutions that help reduce Marvell product energy consumption during the use phase, making devices that contain our products more energy efficient and causing a reduction in our downstream GHG emissions. Developing products with lower power is a competitive differentiator for us, and we integrate power efficiency considerations in the design of all products in our portfolio. Marvell plays an important role in improving the overall efficiency of clouds, enterprise networks, and automobiles by developing our products that continuously increase performance per watt. This challenge will grow with the rise of artificial intelligence (AI), machine learning (ML) and autonomous driving, as these are inextricably linked to the growth in processing power. Similarly, as telecommunications networks migrate from 4G to 5G, hardware power consumption is expected to increase rapidly. Across our product categories, we work collaboratively with our customers to meet their needs to optimize power performance. This includes increasing performance or density, moving to new technology nodes, consolidating features onto more integrated chips, applying novel architectures, improving thermal management to reduce cooling, employing power management, and using virtualization innovations to more efficiently utilize data infrastructure. Therefore, the development of power efficient products or services influences our financial planning in terms of our allocation of R&D investments and increased revenue as a result of increased demand for our products.</p> <p>Access to capital: We regularly engage with our investors and shareholders, and view our sustainability strategy and commitments, including those related to climate, as an advantage and differentiator. For example, we integrate information on our sustainability performance, including our progress on climate strategy and commitments, in the communication with our large institutional investors through 1:1 meetings. We also disclose our sustainability data and progress on our climate goals and commitments in our annual ESG Report, which is aligned with key ESG reporting frameworks, such as the Global Reporting Initiative (GRI)</p>

		Standards, the Sustainable Accounting Standards Board (SASB), the Task Force on Climate-related Financial Disclosures (TCFD), the United Nations Guiding Principles on Business and Human Rights Reporting Framework, and the UN Sustainable Development Goals. We are also continuously monitoring our ESG performance based on ratings and rankers, and in FY23 (reporting year), we improved our MSCI score to AA (leader) and maintained low risk (ESG Risk Rating 17.5) by Sustainalytics.
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C3.5

(C3.5) In your organization’s financial accounting, do you identify spending/revenue that is aligned with your organization’s climate transition?

Identification of spending/revenue that is aligned with your organization’s climate transition	
Row 1	No, but we plan to in the next two years

C4. Targets and performance

C4.1

(C4.1) Did you have an emissions target that was active in the reporting year?

No target

C4.1c

(C4.1c) Explain why you did not have an emissions target, and forecast how your emissions will change over the next five years.

	Primary reason	Five-year forecast	Please explain
Row 1	We are planning to introduce a target in the next two years	In FY 2023 (reporting period), Marvell continued to grow through acquisitions, and we expect that our direct (Scope 1 and Scope 2) emissions will grow as we expand our business. As a fabless semiconductor company, we expect that our direct emissions will be associated solely with the operation of our offices and R&D hubs. In FY23, we developed a science-based target aligned with a 1.5°C climate scenario (to be validated by SBTi). Our target will cover both our direct (Scope 1 and Scope 2) GHG emissions, as well as	As a major multinational company in the fabless semiconductor industry with a global footprint and thousands of stakeholders around the world, Marvell has a part to play in helping address climate-related impacts. In FY 2023 (reporting year), we developed a Science Based Target (SBT) for validation by SBTi, and we expect the target to be formally reviewed and approved by the end of FY 2024. Our SBT is aligned with a 1.5°C climate scenario, supporting the goals of the Paris Agreement.

	<p>our value chain (Scope 3) emissions. As part of our target achievement roadmap, we are planning to implement onsite energy reduction measures across our facilities as well as to procure renewable energy for our direct operations, thereby reducing our Scope 1 and market-based Scope 2 emissions. Regarding Scope 3 emissions, our largest categories include: (1) purchased goods and services associated with the operations of our upstream manufacturing, assembly and testing suppliers and (2) the use of sold products associated with the operations of our customers. As we grow our business and sell more products, we expect that our absolute Scope 3 emissions associated with the use of our products will grow, but with each new generation, our products will become more energy efficient, leading to lower product carbon intensity per performance. Marvell is continually improving the accuracy of our GHG emission data and evaluating opportunities for efficiencies within our operations and in our products.</p> <p>A forecast of our emissions reduction in the next five years is aligned with our science-based target that we plan to submit to SBTi for validation imminently. Since our target was developed based on the SBTi guidance, it will meet the SBTi criteria for a 1.5°C climate scenario path, i.e., our target will aim at least 50% reduction for Scope 1 and 2 and will cover at least 67% of our Scope 3 emissions.</p>	<p>Timeline: The timeline of our target achievement is FY22-FY30, where FY22 is the base year and FY30 is the target year. Our plans to implement the target is informed by our SBT roadmap, and it is now part of our internal low-carbon transition plan.</p> <p>Plan: Our low-carbon transition plan includes a quantitative roadmap illustrating the carbon reduction that Marvell would achieve by FY30, and how Marvell will operate in the future to achieve our climate commitments. For example, an important part of our science-based target achievement roadmap is procuring renewable energy for our owned and leased facilities wherever possible. We are planning to implement onsite energy reduction measures across our facilities as well as to procure renewable energy for our direct operations, thereby reducing our Scope 1 and market-based Scope 2 emissions. To date, we have implemented onsite solar panels at our Santa Clara campus that enable one of our buildings to run on renewable energy. In addition, we deployed third-party data centers operated by one of the leading data center colocation providers that runs all its facilities on 100% renewable energy and provides Marvell with a Sustainability Certificate for using 100% Renewable Energy, enabling Marvell to designate our energy consumption from our US-based data centers as 100% renewable. These RECs were generated by US-based solar farms and comply with principles of locality and additionality. In addition, recognizing the need to scale renewable energy availability in the</p>
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			United States, in FY23 we joined the Clean Energy Buyers Association (CEBA). This community of institutional energy customers partner with clean energy providers, business partners, leading environmental NGOs and climate-focused philanthropies to drive a vision of “customer-driven clean energy for all”.
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C4.2

(C4.2) Did you have any other climate-related targets that were active in the reporting year?

No other climate-related targets

C4.3

(C4.3) Did you have emissions reduction initiatives that were active within the reporting year? Note that this can include those in the planning and/or implementation phases.

Yes

C4.3a

(C4.3a) Identify the total number of initiatives at each stage of development, and for those in the implementation stages, the estimated CO2e savings.

	Number of initiatives	Total estimated annual CO2e savings in metric tonnes CO2e (only for rows marked *)
Under investigation	0	0
To be implemented*	0	0
Implementation commenced*	0	0
Implemented*	3	6,696
Not to be implemented	0	0

C4.3b

(C4.3b) Provide details on the initiatives implemented in the reporting year in the table below.

Initiative category & Initiative type

Low-carbon energy generation

Solar PV

Estimated annual CO₂e savings (metric tonnes CO₂e)

378

Scope(s) or Scope 3 category(ies) where emissions savings occur

Scope 2 (market-based)

Voluntary/Mandatory

Voluntary

Annual monetary savings (unit currency – as specified in C0.4)

0

Investment required (unit currency – as specified in C0.4)

0

Payback period

No payback

Estimated lifetime of the initiative

Ongoing

Comment

Onsite solar panels generate renewable energy for a portion of our Santa Clara campus in the USA.

Initiative category & Initiative type

Low-carbon energy generation

Solar PV

Estimated annual CO₂e savings (metric tonnes CO₂e)

4,192

Scope(s) or Scope 3 category(ies) where emissions savings occur

Scope 2 (market-based)

Voluntary/Mandatory

Voluntary

Annual monetary savings (unit currency – as specified in C0.4)

0

Investment required (unit currency – as specified in C0.4)

0

Payback period

No payback

Estimated lifetime of the initiative

Ongoing

Comment

Marvell hosts our compute, server, storage, and networking equipment in the USA into third-party data centers operated by one of the leading data center colocation providers that runs all its facilities on 100% renewable energy and provides Marvell with a Sustainability Certificate for using 100% Renewable Energy. This certificate demonstrates that our data center colocation provider has retired Renewable Energy Credits (RECs) on behalf of Marvell, enabling Marvell to designate our energy consumption from our US-based data centers as 100% renewable. These RECs were generated by US-based solar farms and comply with principles of locality and additionality. The cost for renewable energy is part of the total cost we pay to our data center colocation provider, so there are no additional investments.

Initiative category & Initiative type

Low-carbon energy generation
Other, please specify
Renewable mix

Estimated annual CO2e savings (metric tonnes CO2e)

2,126

Scope(s) or Scope 3 category(ies) where emissions savings occur

Scope 2 (market-based)

Voluntary/Mandatory

Voluntary

Annual monetary savings (unit currency – as specified in C0.4)

0

Investment required (unit currency – as specified in C0.4)

0

Payback period

No payback

Estimated lifetime of the initiative

Ongoing

Comment

Our San Jose offices are powered by San Jose Clean Energy, a local electricity supplier, providing residents and businesses with clean energy. The energy content consists of 60% renewable energy and up to 95% carbon-free power. Non-renewable carbon-free sources are a combination of large hydroelectric and nuclear. The cost for renewable energy is part of the total utility bill for our San Jose offices, so there are no additional investments.

C4.3c

(C4.3c) What methods do you use to drive investment in emissions reduction activities?

Method	Comment
Internal finance mechanisms	Marvell's IT Infrastructure and Global Real Estate and Workplace teams consider estimated GHG emission reductions and potential monetary savings from our onsite solar panels at our Santa Clara campus and renewable energy consumption at our US-based data centers as part of our annual budget planning and existing internal finance mechanisms. As we implement the achievement roadmap for our science-based target (to be validated by SBTi), we plan to allocate additional budget dedicated specifically to GHG reduction projects.
Other Product efficiency improvements	In FY 2023 (reporting period), as part of our science-based target, we set a goal to reduce energy intensity of our products and as a result, decrease Scope 3 emissions from the use of sold products. This goal will be tracked annually, and we will continuously evaluate and report our progress towards this goal. To intentionally pursue design solutions that could help achieve energy efficiency of our products, in FY23, we established a new working group at Marvell with a specific focus on Responsible Product Design. Its first priority was to mobilize the implementation of R&D solutions targeting product power across the company. To reduce power consumption of our products during the use phase, we collaborate on low power design methods and computer aided design (CAD) tools, we encourage development of power saving circuits, and we raise awareness of novel chip packaging approaches to manage thermal heat. As we implement the achievement roadmap for our science-based target (approval by SBTi is in progress), we plan to track budget dedicated specifically to product energy efficiency projects.

C4.5

(C4.5) Do you classify any of your existing goods and/or services as low-carbon products?

No

C5. Emissions methodology

C5.1

(C5.1) Is this your first year of reporting emissions data to CDP?

No

C5.1a

(C5.1a) Has your organization undergone any structural changes in the reporting year, or are any previous structural changes being accounted for in this disclosure of emissions data?

Row 1

Has there been a structural change?

Yes, an acquisition

Name of organization(s) acquired, divested from, or merged with

Tanzanite Silicon Solutions, Inc.

Details of structural change(s), including completion dates

In FY23 (reporting period), Marvell completed an acquisition of Tanzanite Silicon Solutions, Inc, a leading developer of advanced Compute Express Link™ (CXL™) technologies. In this CDP report, we provide our GHG emission data for the reporting year running from January 30, 2022 to January 28, 2023 (corresponding to Marvell's FY 2023, the reporting period), and hence we accounted for this acquisition in our company-wide GHG operational footprint. This acquisition did not affect Marvell's ownership or control of the emitting activities.

C5.1b

(C5.1b) Has your emissions accounting methodology, boundary, and/or reporting year definition changed in the reporting year?

	Change(s) in methodology, boundary, and/or reporting year definition?
Row 1	No

C5.1c

(C5.1c) Have your organization's base year emissions and past years' emissions been recalculated as a result of any changes or errors reported in C5.1a and/or C5.1b?

	Base year recalculation	Scope(s) recalculated	Base year emissions recalculation policy, including significance threshold	Past years' recalculation
Row 1	Yes	Scope 1 Scope 2, location-based Scope 2, market-based Scope 3	In FY 2023 (reporting period), Marvell developed our first company-wide science-based target which we plan to submit for validation by SBTi imminently (as of July 2023). The target will cover Scope 1, 2, and a portion of our downstream Scope 3 GHG emissions. We expect to disclose the final target later in FY 2024. Our target has been set against FY 2022, and therefore, our	Yes

			revised base year is now FY 2022. The FY 2022 period corresponds to January 30, 2021 – January 29, 2022. We will be tracking our progress towards the target annually, and the target will be measured as a reduction in GHG emissions from our base year (FY 2022) through the target year (FY30).	
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C5.2

(C5.2) Provide your base year and base year emissions.

Scope 1

Base year start

February 1, 2021

Base year end

January 31, 2022

Base year emissions (metric tons CO₂e)

4,320

Comment

In FY23 (reporting period), Marvell developed our first company-wide science-based target which we plan to submit for validation by SBTi imminently (as of July 2023). The target will cover Scope 1, 2, and a portion of our downstream Scope 3 GHG emissions. We expect to disclose the final target later in FY24. Our target has been set against FY22, and therefore, our revised base year is now FY22. The FY22 period corresponds to January 30, 2021 – January 29, 2022. We will be tracking our progress towards the target annually, and the target will be measured as a reduction in GHG emissions from our base year (FY22) through the target year (FY30).

Note: Marvell's FY 2022 runs over the period January 30, 2021 – January 29, 2022. For the purposes of reporting to CDP, we are reporting a period that is 365 days long.

Scope 2 (location-based)

Base year start

February 1, 2021

Base year end

January 31, 2022

Base year emissions (metric tons CO₂e)

26,188

Comment

In FY23 (reporting period), Marvell developed our first company-wide science-based target which we plan to submit for validation by SBTi imminently (as of July 2023). The

target will cover Scope 1, 2, and a portion of our downstream Scope 3 GHG emissions. We expect to disclose the final target later in FY24. Our target has been set against FY22, and therefore, our revised base year is now FY22. The FY22 period corresponds to January 30, 2021 – January 29, 2022. We will be tracking our progress towards the target annually, and the target will be measured as a reduction in GHG emissions from our base year (FY22) through the target year (FY30).

Note: Marvell's FY 2022 runs over the period January 30, 2021 – January 29, 2022. For the purposes of reporting to CDP, we are reporting a period that is 365 days long.

Scope 2 (market-based)

Base year start

February 1, 2021

Base year end

January 31, 2022

Base year emissions (metric tons CO₂e)

23,176

Comment

In FY23 (reporting period), Marvell developed our first company-wide science-based target which we plan to submit for validation by SBTi imminently (as of July 2023). The target will cover Scope 1, 2, and a portion of our downstream Scope 3 GHG emissions. We expect to disclose the final target later in FY24. Our target has been set against FY22, and therefore, our revised base year is now FY22. The FY22 period corresponds to January 30, 2021 – January 29, 2022. We will be tracking our progress towards the target annually, and the target will be measured as a reduction in GHG emissions from our base year (FY22) through the target year (FY30).

Note: Marvell's FY 2022 runs over the period January 30, 2021 – January 29, 2022. For the purposes of reporting to CDP, we are reporting a period that is 365 days long.

Scope 3 category 1: Purchased goods and services

Base year start

February 1, 2021

Base year end

January 31, 2022

Base year emissions (metric tons CO₂e)

462,123

Comment

In FY23 (reporting period), Marvell developed our first company-wide science-based target which we plan to submit for validation by SBTi imminently (as of July 2023). The target will cover Scope 1, 2, and a portion of our downstream Scope 3 GHG emissions. We expect to disclose the final target later in FY24. Our target has been set against FY22, and therefore, our revised base year is now FY22. The FY22 period corresponds

to January 30, 2021 – January 29, 2022. We will be tracking our progress towards the target annually, and the target will be measured as a reduction in GHG emissions from our base year (FY22) through the target year (FY30).

Note: Marvell's FY 2022 runs over the period January 30, 2021 – January 29, 2022. For the purposes of reporting to CDP, we are reporting a period that is 365 days long.

Scope 3 category 2: Capital goods

Base year start

February 1, 2021

Base year end

January 31, 2022

Base year emissions (metric tons CO₂e)

57,695

Comment

In FY23 (reporting period), Marvell developed our first company-wide science-based target which we plan to submit for validation by SBTi imminently (as of July 2023). The target will cover Scope 1, 2, and a portion of our downstream Scope 3 GHG emissions. We expect to disclose the final target later in FY24. Our target has been set against FY22, and therefore, our revised base year is now FY22. The FY22 period corresponds to January 30, 2021 – January 29, 2022. We will be tracking our progress towards the target annually, and the target will be measured as a reduction in GHG emissions from our base year (FY22) through the target year (FY30).

Note: Marvell's FY 2022 runs over the period January 30, 2021 – January 29, 2022. For the purposes of reporting to CDP, we are reporting a period that is 365 days long.

Scope 3 category 3: Fuel-and-energy-related activities (not included in Scope 1 or 2)

Base year start

February 1, 2021

Base year end

January 31, 2022

Base year emissions (metric tons CO₂e)

5,620

Comment

In FY23 (reporting period), Marvell developed our first company-wide science-based target which we plan to submit for validation by SBTi imminently (as of July 2023). The target will cover Scope 1, 2, and a portion of our downstream Scope 3 GHG emissions. We expect to disclose the final target later in FY24. Our target has been set against FY22, and therefore, our revised base year is now FY22. The FY22 period corresponds to January 30, 2021 – January 29, 2022. We will be tracking our progress towards the target annually, and the target will be measured as a reduction in GHG emissions from

our base year (FY22) through the target year (FY30).

Note: Marvell's FY 2022 runs over the period January 30, 2021 – January 29, 2022. For the purposes of reporting to CDP, we are reporting a period that is 365 days long.

Scope 3 category 4: Upstream transportation and distribution

Base year start

February 1, 2021

Base year end

January 31, 2022

Base year emissions (metric tons CO₂e)

1,305

Comment

In FY23 (reporting period), Marvell developed our first company-wide science-based target which we plan to submit for validation by SBTi imminently (as of July 2023). The target will cover Scope 1, 2, and a portion of our downstream Scope 3 GHG emissions. We expect to disclose the final target later in FY24. Our target has been set against FY22, and therefore, our revised base year is now FY22. The FY22 period corresponds to January 30, 2021 – January 29, 2022. We will be tracking our progress towards the target annually, and the target will be measured as a reduction in GHG emissions from our base year (FY22) through the target year (FY30).

Note: Marvell's FY 2022 runs over the period January 30, 2021 – January 29, 2022. For the purposes of reporting to CDP, we are reporting a period that is 365 days long.

Scope 3 category 5: Waste generated in operations

Base year start

February 1, 2021

Base year end

January 31, 2022

Base year emissions (metric tons CO₂e)

267

Comment

In FY23 (reporting period), Marvell developed our first company-wide science-based target which we plan to submit for validation by SBTi imminently (as of July 2023). The target will cover Scope 1, 2, and a portion of our downstream Scope 3 GHG emissions. We expect to disclose the final target later in FY24. Our target has been set against FY22, and therefore, our revised base year is now FY22. The FY22 period corresponds to January 30, 2021 – January 29, 2022. We will be tracking our progress towards the target annually, and the target will be measured as a reduction in GHG emissions from our base year (FY22) through the target year (FY30).

Note: Marvell's FY 2022 runs over the period January 30, 2021 – January 29, 2022. For the purposes of reporting to CDP, we are reporting a period that is 365 days long.

Scope 3 category 6: Business travel

Base year start

February 1, 2021

Base year end

January 31, 2022

Base year emissions (metric tons CO₂e)

1,047

Comment

In FY23 (reporting period), Marvell developed our first company-wide science-based target which we plan to submit for validation by SBTi imminently (as of July 2023). The target will cover Scope 1, 2, and a portion of our downstream Scope 3 GHG emissions. We expect to disclose the final target later in FY24. Our target has been set against FY22, and therefore, our revised base year is now FY22. The FY22 period corresponds to January 30, 2021 – January 29, 2022. We will be tracking our progress towards the target annually, and the target will be measured as a reduction in GHG emissions from our base year (FY22) through the target year (FY30).

Note: Marvell's FY 2022 runs over the period January 30, 2021 – January 29, 2022. For the purposes of reporting to CDP, we are reporting a period that is 365 days long.

Scope 3 category 7: Employee commuting

Base year start

February 1, 2021

Base year end

January 31, 2022

Base year emissions (metric tons CO₂e)

14,359

Comment

In FY23 (reporting period), Marvell developed our first company-wide science-based target which we plan to submit for validation by SBTi imminently (as of July 2023). The target will cover Scope 1, 2, and a portion of our downstream Scope 3 GHG emissions. We expect to disclose the final target later in FY24. Our target has been set against FY22, and therefore, our revised base year is now FY22. The FY22 period corresponds to January 30, 2021 – January 29, 2022. We will be tracking our progress towards the target annually, and the target will be measured as a reduction in GHG emissions from our base year (FY22) through the target year (FY30).

Note: Marvell's FY 2022 runs over the period January 30, 2021 – January 29, 2022. For the purposes of reporting to CDP, we are reporting a period that is 365 days long.

Scope 3 category 8: Upstream leased assets

Base year start

February 1, 2021

Base year end

January 31, 2022

Base year emissions (metric tons CO2e)

153

Comment

In FY23 (reporting period), Marvell developed our first company-wide science-based target which we plan to submit for validation by SBTi imminently (as of July 2023). The target will cover Scope 1, 2, and a portion of our downstream Scope 3 GHG emissions. We expect to disclose the final target later in FY24. Our target has been set against FY22, and therefore, our revised base year is now FY22. The FY22 period corresponds to January 30, 2021 – January 29, 2022. We will be tracking our progress towards the target annually, and the target will be measured as a reduction in GHG emissions from our base year (FY22) through the target year (FY30).

Note: Marvell's FY 2022 runs over the period January 30, 2021 – January 29, 2022. For the purposes of reporting to CDP, we are reporting a period that is 365 days long.

Scope 3 category 9: Downstream transportation and distribution

Base year start

February 1, 2021

Base year end

January 31, 2022

Base year emissions (metric tons CO2e)

21,135

Comment

In FY23 (reporting period), Marvell developed our first company-wide science-based target which we plan to submit for validation by SBTi imminently (as of July 2023). The target will cover Scope 1, 2, and a portion of our downstream Scope 3 GHG emissions. We expect to disclose the final target later in FY24. Our target has been set against FY22, and therefore, our revised base year is now FY22. The FY22 period corresponds to January 30, 2021 – January 29, 2022. We will be tracking our progress towards the target annually, and the target will be measured as a reduction in GHG emissions from our base year (FY22) through the target year (FY30).

Note: Marvell's FY 2022 runs over the period January 30, 2021 – January 29, 2022. For the purposes of reporting to CDP, we are reporting a period that is 365 days long.

Scope 3 category 10: Processing of sold products

Base year start

February 1, 2021

Base year end

January 31, 2022

Base year emissions (metric tons CO2e)

907

Comment

In FY23 (reporting period), Marvell developed our first company-wide science-based target which we plan to submit for validation by SBTi imminently (as of July 2023). The target will cover Scope 1, 2, and a portion of our downstream Scope 3 GHG emissions. We expect to disclose the final target later in FY24. Our target has been set against FY22, and therefore, our revised base year is now FY22. The FY22 period corresponds to January 30, 2021 – January 29, 2022. We will be tracking our progress towards the target annually, and the target will be measured as a reduction in GHG emissions from our base year (FY22) through the target year (FY30).

Note: Marvell's FY 2022 runs over the period January 30, 2021 – January 29, 2022. For the purposes of reporting to CDP, we are reporting a period that is 365 days long.

Scope 3 category 11: Use of sold products

Base year start

February 1, 2021

Base year end

January 31, 2022

Base year emissions (metric tons CO2e)

23,277,351

Comment

In FY23 (reporting period), Marvell developed our first company-wide science-based target which we plan to submit for validation by SBTi imminently (as of July 2023). The target will cover Scope 1, 2, and a portion of our downstream Scope 3 GHG emissions. We expect to disclose the final target later in FY24. Our target has been set against FY22, and therefore, our revised base year is now FY22. The FY22 period corresponds to January 30, 2021 – January 29, 2022. We will be tracking our progress towards the target annually, and the target will be measured as a reduction in GHG emissions from our base year (FY22) through the target year (FY30).

Note: Marvell's FY 2022 runs over the period January 30, 2021 – January 29, 2022. For the purposes of reporting to CDP, we are reporting a period that is 365 days long.

Scope 3 category 12: End of life treatment of sold products

Base year start

February 1, 2021

Base year end

January 31, 2022

Base year emissions (metric tons CO2e)

173

Comment

In FY23 (reporting period), Marvell developed our first company-wide science-based target which we plan to submit for validation by SBTi imminently (as of July 2023). The target will cover Scope 1, 2, and a portion of our downstream Scope 3 GHG emissions. We expect to disclose the final target later in FY24. Our target has been set against FY22, and therefore, our revised base year is now FY22. The FY22 period corresponds to January 30, 2021 – January 29, 2022. We will be tracking our progress towards the target annually, and the target will be measured as a reduction in GHG emissions from our base year (FY22) through the target year (FY30).

Note: Marvell's FY 2022 runs over the period January 30, 2021 – January 29, 2022. For the purposes of reporting to CDP, we are reporting a period that is 365 days long.

Scope 3 category 13: Downstream leased assets

Base year start

Base year end

Base year emissions (metric tons CO2e)

Comment

Scope 3 category 14: Franchises

Base year start

Base year end

Base year emissions (metric tons CO2e)

Comment

Scope 3 category 15: Investments

Base year start

Base year end

Base year emissions (metric tons CO2e)

Comment

Scope 3: Other (upstream)

Base year start

Base year end

Base year emissions (metric tons CO2e)

Comment

Scope 3: Other (downstream)

Base year start

Base year end

Base year emissions (metric tons CO2e)

Comment

C5.3

(C5.3) Select the name of the standard, protocol, or methodology you have used to collect activity data and calculate emissions.

Defra Environmental Reporting Guidelines: Including streamlined energy and carbon reporting guidance, 2019

IEA CO2 Emissions from Fuel Combustion

IPCC Guidelines for National Greenhouse Gas Inventories, 2006

The Greenhouse Gas Protocol: A Corporate Accounting and Reporting Standard (Revised Edition)

The Greenhouse Gas Protocol: Scope 2 Guidance

US EPA Center for Corporate Climate Leadership: Direct Emissions from Stationary Combustion Sources

US EPA Center for Corporate Climate Leadership: Direct Emissions from Mobile Combustion Sources

US EPA Emissions & Generation Resource Integrated Database (eGRID)

C6. Emissions data

C6.1

(C6.1) What were your organization's gross global Scope 1 emissions in metric tons CO₂e?

Reporting year

Gross global Scope 1 emissions (metric tons CO₂e)

4,645

Start date

February 1, 2022

End date

January 31, 2023

Comment

Note: Marvell's FY 2023 runs over the period of January 30, 2022 - January 28, 2023. For the purposes of disclosing to CDP, we are reporting a period that is 365 days long.

Past year 1

Gross global Scope 1 emissions (metric tons CO₂e)

4,320

Start date

February 1, 2021

End date

January 31, 2022

Comment

Over the past year, we improved the accuracy and completeness of our FY22 GHG emissions inventory. The FY22 GHG data presented here reflect those updates and have been restated from what was reported previously in our 2022 CDP Climate Change response. Note: Marvell's FY22 runs over the period of January 31, 2021 – January 29, 2022. For the purposes of disclosing to CDP, we are reporting a period that is 365 days long.

C6.2

(C6.2) Describe your organization's approach to reporting Scope 2 emissions.

Row 1

Scope 2, location-based

We are reporting a Scope 2, location-based figure

Scope 2, market-based

We are reporting a Scope 2, market-based figure

Comment

C6.3

(C6.3) What were your organization's gross global Scope 2 emissions in metric tons CO₂e?

Reporting year

Scope 2, location-based

29,046

Scope 2, market-based (if applicable)

23,686

Start date

February 1, 2022

End date

January 31, 2023

Comment

Note: Marvell's FY 2023 runs over the period of January 30, 2022 - January 28, 2023. For the purposes of disclosing to CDP, we are reporting a period that is 365 days long.

Past year 1

Scope 2, location-based

26,188

Scope 2, market-based (if applicable)

23,176

Start date

February 1, 2021

End date

January 31, 2022

Comment

Over the past year, we improved the accuracy and completeness of our FY22 GHG emissions inventory. The FY22 GHG data presented here reflect those updates and have been restated from what was reported previously in our 2022 CDP Climate Change response. Note: Marvell's FY22 runs over the period of January 31, 2021 – January 29, 2022. For the purposes of disclosing to CDP, we are reporting a period that is 365 days long.

C6.4

(C6.4) Are there any sources (e.g. facilities, specific GHGs, activities, geographies, etc.) of Scope 1, Scope 2 or Scope 3 emissions that are within your selected reporting boundary which are not included in your disclosure?

No

C6.5

(C6.5) Account for your organization's gross global Scope 3 emissions, disclosing and explaining any exclusions.

Purchased goods and services

Evaluation status

Relevant, calculated

Emissions in reporting year (metric tons CO₂e)

614,695

Emissions calculation methodology

Spend-based method

Percentage of emissions calculated using data obtained from suppliers or value chain partners

0

Please explain

Methodology used is in line with GHG Protocol's Corporate Value Chain (Scope 3) Standard. We calculate emissions of purchased goods and services that are particularly material to the company's footprint or relevant to our core business, our customers, or our employees. A combination of spend data and economic input-output (EIO) tables from the EPA Supply Chain Greenhouse Gas Emission Factors for US Industries and Commodities (2020) are used to estimate emissions.

Capital goods

Evaluation status

Relevant, calculated

Emissions in reporting year (metric tons CO₂e)

28,489

Emissions calculation methodology

Spend-based method

Percentage of emissions calculated using data obtained from suppliers or value chain partners

0

Please explain

Methodology used is in line with GHG Protocol's Corporate Value Chain (Scope 3) Standard. We calculate emissions of purchased goods and services that are particularly material to the company's footprint or relevant to our core business, our customers, or our employees. A combination of spend data and economic input-output (IO) tables from the EPA Supply Chain Greenhouse Gas Emission Factors for US Industries and Commodities (2020) are used to estimate emissions.

Fuel-and-energy-related activities (not included in Scope 1 or 2)

Evaluation status

Relevant, calculated

Emissions in reporting year (metric tons CO₂e)

7,890

Emissions calculation methodology

Fuel-based method

Percentage of emissions calculated using data obtained from suppliers or value chain partners

100

Please explain

Methodology used is in line with GHG Protocol's Corporate Value Chain (Scope 3) Standard. Upstream emissions from purchased fuels, electricity, steam and hot and chilled water, include generation and Transportation & Distribution (T&D) emissions, and any other losses in this category. Upstream emissions of purchased electricity are calculated for the US and other countries by multiplying electricity activity data by country or region-specific emission factors from UK Defra 2019 Guidelines for GHG Reporting. Upstream emissions from purchased fuels, steam, hot and chilled water are calculated using emissions factors from UK Defra 2020 Guidelines for GHG Reporting. Emissions associated with losses were calculated for the US and other countries by multiplying the energy use by type by emission factors from UK Defra 2020 Guidelines for GHG Reporting. All GWPs are from the IPCC Fifth Assessment Report (GWP for CH₄ = 28, GWP for N₂O = 265), consistent with reporting under the United Nations Framework Convention on Climate Change (UNFCCC). For market-based FERA emissions, the methodology builds on the existing FERA location-based methodology. The market-based methodology considers the application of RECs, which reduce well-to-tank emissions from supplies covered by RECS for renewable sources (solar, wind, hydro) to zero. Under the market-based methodology, T&D losses still apply to locations covered by RECs unless there are sufficient RECs to cover the total of the electricity consumption and the T&D losses.

Upstream transportation and distribution

Evaluation status

Relevant, calculated

Emissions in reporting year (metric tons CO₂e)

1,366

Emissions calculation methodology

Distance-based method

Percentage of emissions calculated using data obtained from suppliers or value chain partners

100

Please explain

Methodology used is in line with GHG Protocol's Corporate Value Chain (Scope 3) Standard. Upstream emissions, paid by Marvell, from product shipping records and the weight of shipments were used to calculate shipping emissions using emission factors from US EPA's Emission Factors For Greenhouse Gas Inventories (Table 8), which provides emission factors for transportation type in units of GHGs per ton-mile. The total distance traveled by each package was calculated using the Latitude and Longitude of the origin and destinations.

Waste generated in operations

Evaluation status

Relevant, calculated

Emissions in reporting year (metric tons CO₂e)

217

Emissions calculation methodology

Waste-type-specific method

Site-specific method

Percentage of emissions calculated using data obtained from suppliers or value chain partners

100

Please explain

Methodology used is in line with GHG Protocol's Corporate Value Chain (Scope 3) Standard. Upstream emissions from waste generated in operations were calculated based on invoice data from facilities for non-hazardous landfill waste, recycled waste, and hazardous waste. Where data was not available for some facilities, non-hazardous landfill waste was estimated for those facilities based on square footage.

Business travel

Evaluation status

Relevant, calculated

Emissions in reporting year (metric tons CO₂e)

6,098

Emissions calculation methodology

Fuel-based method
Distance-based method

Percentage of emissions calculated using data obtained from suppliers or value chain partners

100

Please explain

Methodology used is in line with GHG Protocol's Corporate Value Chain (Scope 3) Standard. We used data provided by our vendor partners to estimate business travel emissions associated with air travel, car rental, and hotel stays. Travel data was multiplied by the corresponding emissions factors for each travel type to estimate emissions of business travel. We apply radiative forcing factor to our air travel emissions.

Employee commuting

Evaluation status

Relevant, calculated

Emissions in reporting year (metric tons CO2e)

10,919

Emissions calculation methodology

Fuel-based method
Distance-based method
Site-specific method

Percentage of emissions calculated using data obtained from suppliers or value chain partners

0

Please explain

Methodology used is in line with GHG Protocol's Corporate Value Chain (Scope 3) Standard. To calculate emissions of employee commuting, we use headcount data, work days in the current reporting year by country, national commuting statistics, and emission factors for corresponding community methods. Remote work emissions are included in this category to account for the high percentage of remote workforce in this reporting year. Remote work emissions are estimated by using the methodology authored by Anthesis, which uses employee headcount data, residential electricity and natural gas energy intensity by country published by IEA, and the incremental percent of energy use associated with employees working from home.

Upstream leased assets

Evaluation status

Relevant, calculated

Emissions in reporting year (metric tons CO2e)

180

Emissions calculation methodology

Fuel-based method

Site-specific method

Percentage of emissions calculated using data obtained from suppliers or value chain partners

100

Please explain

Methodology used is in line with GHG Protocol's Corporate Value Chain (Scope 3) Standard. We calculate and report the emissions associated with the overhead electricity of our purchased colocation data services using primary data of Power Usage Effectiveness (PUE) from the data center providers and relevant grid electricity emission factors.

Downstream transportation and distribution

Evaluation status

Relevant, calculated

Emissions in reporting year (metric tons CO2e)

12,272

Emissions calculation methodology

Distance-based method

Site-specific method

Percentage of emissions calculated using data obtained from suppliers or value chain partners

100

Please explain

Methodology used is in line with GHG Protocol's Corporate Value Chain (Scope 3) Standard. Upstream emissions, paid by customers, from product shipping records and the weight of shipments were used to calculate shipping emissions using emission factors from US EPA's Emission Factors For Greenhouse Gas Inventories (Table 8), which provides emission factors for transportation type in units of GHGs per ton-mile. The total distance traveled by each package was calculated using the Latitude and Longitude of the origin and destinations.

Processing of sold products

Evaluation status

Relevant, calculated

Emissions in reporting year (metric tons CO2e)

772

Emissions calculation methodology

Average product method
Fuel-based method

Percentage of emissions calculated using data obtained from suppliers or value chain partners

0

Please explain

Marvell's products typically need to be welded before they can be installed. This process uses approximately 0.0048 kwh per board and 0.000016 kwh per unit. An average of these power consumption estimates are then multiplied by the total number of units shipped during the reporting year. Emissions were then allocated to different regions, where there products were processed using regional electricity emission factors. This was much higher than the previous year due to increased manufacturing and shipping.

Use of sold products

Evaluation status

Relevant, calculated

Emissions in reporting year (metric tons CO2e)

21,379,519

Emissions calculation methodology

Average product method
Fuel-based method

Percentage of emissions calculated using data obtained from suppliers or value chain partners

100

Please explain

To calculate Category 11 emissions, the value for product power consumption in the use phase is multiplied by the percent of product operation in each operating mode, the operating hours per year, the expected lifetime of the products, and the appropriate purchased electricity emissions factor, based on the country of product shipment and ultimate use. Activity data provided by Marvell include Marvell's sales, shipping, and energy usage reports at a product level for the given reporting year.

End of life treatment of sold products

Evaluation status

Relevant, calculated

Emissions in reporting year (metric tons CO2e)

86

Emissions calculation methodology

Average product method

Waste-type-specific method

Percentage of emissions calculated using data obtained from suppliers or value chain partners

0

Please explain

Methodology used is in line with GHG Protocol's Corporate Value Chain (Scope 3) Standard. To calculate emissions of end-of-life treatment of sold products, we apply the total weight of goods sold, the primary composition of materials in the goods sold, an assumption on the proportion of goods by weight that are landfilled and recycled. The emission factors are referenced from the US EPA Waste Reduction Model (WARM) Tool (2020).

Downstream leased assets

Evaluation status

Not relevant, explanation provided

Please explain

Marvell has no leased downstream assets.

Franchises

Evaluation status

Not relevant, explanation provided

Please explain

Marvell is not a retailer and does not have franchises.

Investments

Evaluation status

Not relevant, explanation provided

Please explain

Marvell is not a financial company, and does not have investments.

Other (upstream)

Evaluation status

Not relevant, explanation provided

Please explain

All relevant upstream emissions data have been provided.

Other (downstream)

Evaluation status

Not relevant, explanation provided

Please explain

All relevant downstream emissions data have been provided.

C6.5a

(C6.5a) Disclose or restate your Scope 3 emissions data for previous years.

Past year 1

Start date

February 1, 2021

End date

January 31, 2022

Scope 3: Purchased goods and services (metric tons CO2e)

Scope 3: Capital goods (metric tons CO2e)

**Scope 3: Fuel and energy-related activities (not included in Scopes 1 or 2)
(metric tons CO2e)**

5,620

Scope 3: Upstream transportation and distribution (metric tons CO2e)

Scope 3: Waste generated in operations (metric tons CO2e)

Scope 3: Business travel (metric tons CO2e)

Scope 3: Employee commuting (metric tons CO2e)

Scope 3: Upstream leased assets (metric tons CO2e)

Scope 3: Downstream transportation and distribution (metric tons CO2e)

Scope 3: Processing of sold products (metric tons CO2e)

Scope 3: Use of sold products (metric tons CO2e)

23,277,351

Scope 3: End of life treatment of sold products (metric tons CO2e)

Scope 3: Downstream leased assets (metric tons CO2e)

Scope 3: Franchises (metric tons CO2e)

Scope 3: Investments (metric tons CO2e)

Scope 3: Other (upstream) (metric tons CO2e)

Scope 3: Other (downstream) (metric tons CO2e)

Comment

Over the past year, we improved the accuracy and completeness of our FY22 GHG emissions inventory. The FY22 Scope 3, Category 11 GHG data presented here had not been calculated in the last reporting year when we submitted our 2022 CDP Climate response.

C6.7

(C6.7) Are carbon dioxide emissions from biogenic carbon relevant to your organization?

No

C6.10

(C6.10) Describe your gross global combined Scope 1 and 2 emissions for the reporting year in metric tons CO2e per unit currency total revenue and provide any additional intensity metrics that are appropriate to your business operations.

Intensity figure

0.00000479

Metric numerator (Gross global combined Scope 1 and 2 emissions, metric tons CO2e)

28,331

Metric denominator

unit total revenue

Metric denominator: Unit total

5,919,600,000

Scope 2 figure used

Market-based

% change from previous year

22

Direction of change

Decreased

Reason(s) for change

Change in renewable energy consumption
 Change in revenue

Please explain

Our emissions intensity in metric tons CO₂e per USD of total revenue has decreased by about 22% from the previous year. Our combined FY 2023 Scope 1 and 2 emissions increased by 3% compared to FY 2022, and our FY 2023 net revenue increased by about 33% compared to FY 2022. Such a reduction in emission intensity was driven by both an increase in renewable energy procurement as well as an increase in revenue. In FY23, we increased our renewable energy procurement to 23,936 MWh (which is about 10,000 MWh higher than in the previous year). The increase in renewables resulted in a decrease of Scope 2 emissions as expected. At the same time, our revenue increased by 33% compared to the previous year.

C7. Emissions breakdowns

C7.1

(C7.1) Does your organization break down its Scope 1 emissions by greenhouse gas type?

Yes

C7.1a

(C7.1a) Break down your total gross global Scope 1 emissions by greenhouse gas type and provide the source of each used greenhouse warming potential (GWP).

Greenhouse gas	Scope 1 emissions (metric tons of CO ₂ e)	GWP Reference
CO ₂	4,007.39	IPCC Fifth Assessment Report (AR5 – 100 year)
CH ₄	2.16	IPCC Fifth Assessment Report (AR5 – 100 year)
N ₂ O	3.01	IPCC Fifth Assessment Report (AR5 – 100 year)
HFCs	632.5	IPCC Fifth Assessment Report (AR5 – 100 year)

C7.2

(C7.2) Break down your total gross global Scope 1 emissions by country/area/region.

Country/area/region	Scope 1 emissions (metric tons CO2e)
Argentina	31.24
Canada	195.19
China	139.89
Denmark	0.69
Finland	0.43
Germany	25.1
India	299.43
Israel	1,050.48
Italy	17.48
Japan	19.61
Republic of Korea	9.76
Netherlands	11.11
Poland	2.56
Romania	3.62
Singapore	77.62
Spain	2.2
Sweden	0.17
United States of America	2,616.47
Viet Nam	35.81
Taiwan, China	106.21

C7.3

(C7.3) Indicate which gross global Scope 1 emissions breakdowns you are able to provide.

By business division

C7.3a

(C7.3a) Break down your total gross global Scope 1 emissions by business division.

Business division	Scope 1 emissions (metric ton CO2e)
Owned Operations	1,697.2
Leased Operations	2,947.86

C7.5

(C7.5) Break down your total gross global Scope 2 emissions by country/area/region.

Country/area/region	Scope 2, location-based (metric tons CO2e)	Scope 2, market-based (metric tons CO2e)
Argentina	98.34	98.34
Canada	16.68	16.68
China	1,272.73	1,272.73
Denmark	0.7	4.17
Finland	0.34	1.42
Germany	86.2	178.49
India	5,871.11	5,871.11
Israel	4,048.71	4,048.71
Italy	48.74	91.85
Japan	148.12	148.12
Republic of Korea	13.53	13.53
Netherlands	36.65	57.61
Poland	17.18	25.09
Romania	40	6.62
Singapore	530.56	89.96
Spain	3.88	7.64
Sweden	0.02	0.15
United Kingdom of Great Britain and Northern Ireland	3.96	1.42
United States of America	15,592.41	10,536.24
Viet Nam	377.97	377.97

C7.6

(C7.6) Indicate which gross global Scope 2 emissions breakdowns you are able to provide.

By business division

C7.6a

(C7.6a) Break down your total gross global Scope 2 emissions by business division.

Business division	Scope 2, location-based (metric tons CO2e)	Scope 2, market-based (metric tons CO2e)
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Owned Operations	6,936.78	8,294.01
Leased Operations	22,108.92	15,391.72

C7.7

(C7.7) Is your organization able to break down your emissions data for any of the subsidiaries included in your CDP response?

Not relevant as we do not have any subsidiaries

C7.9

(C7.9) How do your gross global emissions (Scope 1 and 2 combined) for the reporting year compare to those of the previous reporting year?

Increased

C7.9a

(C7.9a) Identify the reasons for any change in your gross global emissions (Scope 1 and 2 combined), and for each of them specify how your emissions compare to the previous year.

	Change in emissions (metric tons CO2e)	Direction of change in emissions	Emissions value (percentage)	Please explain calculation
Change in renewable energy consumption	3,109	Decreased	11	In FY 2023, we increased our renewable electricity procurement to 23,936 MWh total, which is about 10,000 MWh higher than in the previous year. The increase in renewable energy procurement resulted in a decrease of Scope 2 emissions as expected.
Other emissions reduction activities	0	No change	0	We are currently evaluating reduction strategies as part of our science-based target analysis. Emission reduction activities will be implemented as part of a larger effort in the coming years.
Divestment				
Acquisitions	93.92	Increased	0.33	Acquisition of Tanzanite Silicon Solutions, Inc. with around 25 employees working in Santa Clara HQ from May 2022 to January 2023. Total

				number of employees working in the site can be obtained from their employee commute data and the corresponding effect on Scope 1 and 2 emissions can be calculated using respective ratios.
Mergers				
Change in output				
Change in methodology				
Change in boundary				
Change in physical operating conditions				
Unidentified				
Other				

C7.9b

(C7.9b) Are your emissions performance calculations in C7.9 and C7.9a based on a location-based Scope 2 emissions figure or a market-based Scope 2 emissions figure?

Market-based

C8. Energy

C8.1

(C8.1) What percentage of your total operational spend in the reporting year was on energy?

More than 0% but less than or equal to 5%

C8.2

(C8.2) Select which energy-related activities your organization has undertaken.

	Indicate whether your organization undertook this energy-related activity in the reporting year
Consumption of fuel (excluding feedstocks)	Yes

Consumption of purchased or acquired electricity	Yes
Consumption of purchased or acquired heat	No
Consumption of purchased or acquired steam	No
Consumption of purchased or acquired cooling	No
Generation of electricity, heat, steam, or cooling	Yes

C8.2a

(C8.2a) Report your organization’s energy consumption totals (excluding feedstocks) in MWh.

	Heating value	MWh from renewable sources	MWh from non-renewable sources	Total (renewable and non-renewable) MWh
Consumption of fuel (excluding feedstock)	HHV (higher heating value)	0	20,648.98	20,648.98
Consumption of purchased or acquired electricity		22,345.08	62,687.46	85,032.53
Consumption of self-generated non-fuel renewable energy		1,591.38		1,591.38
Total energy consumption		23,936.46	83,336.43	107,272.89

C8.2b

(C8.2b) Select the applications of your organization’s consumption of fuel.

	Indicate whether your organization undertakes this fuel application
Consumption of fuel for the generation of electricity	No
Consumption of fuel for the generation of heat	Yes
Consumption of fuel for the generation of steam	No

Consumption of fuel for the generation of cooling	No
Consumption of fuel for co-generation or tri-generation	No

C8.2c

(C8.2c) State how much fuel in MWh your organization has consumed (excluding feedstocks) by fuel type.

Sustainable biomass

Heating value

HHV

Total fuel MWh consumed by the organization

0

Comment

Marvell did not consume energy generated by biomass.

Other biomass

Heating value

HHV

Total fuel MWh consumed by the organization

0

Comment

Marvell did not consume energy generated by biomass.

Other renewable fuels (e.g. renewable hydrogen)

Heating value

HHV

Total fuel MWh consumed by the organization

0

Comment

Marvell did not consume energy generated by other renewables.

Coal

Heating value

HHV

Total fuel MWh consumed by the organization

0

Comment

Marvell did not consume energy generated by coal.

Oil

Heating value

HHV

Total fuel MWh consumed by the organization

4,356.07

Comment

Oil includes diesel and motor gasoline. The calculations are based on the US EPA emission factors: "Emission Factors for Greenhouse Gas Inventories," Table 1 Stationary Combustion Emission Factors, March 26, 2020 (<https://www.epa.gov/climateleadership/center-corporate-climate-leadership-ghg-emission-factors-hub>).

Gas

Heating value

HHV

Total fuel MWh consumed by the organization

16,292.91

Comment

Gas includes natural gas and propane. The calculations are based on the US EPA emission factors: "Emission Factors for Greenhouse Gas Inventories," Table 1 Stationary Combustion Emission Factors, March 26, 2020 (<https://www.epa.gov/climateleadership/center-corporate-climate-leadership-ghg-emission-factors-hub>).

Other non-renewable fuels (e.g. non-renewable hydrogen)

Heating value

HHV

Total fuel MWh consumed by the organization

0

Comment

Marvell did not consume energy generated by other non-renewables.

Total fuel

Heating value

HHV

Total fuel MWh consumed by the organization

20,648.98

Comment

C8.2d

(C8.2d) Provide details on the electricity, heat, steam, and cooling your organization has generated and consumed in the reporting year.

	Total Gross generation (MWh)	Generation that is consumed by the organization (MWh)	Gross generation from renewable sources (MWh)	Generation from renewable sources that is consumed by the organization (MWh)
Electricity	1,591.38	1,591.38	1,591.38	1,591.38
Heat	20,648.98	20,648.98	0	0
Steam	0	0	0	0
Cooling	0	0	0	0

C8.2e

(C8.2e) Provide details on the electricity, heat, steam, and/or cooling amounts that were accounted for at a zero or near-zero emission factor in the market-based Scope 2 figure reported in C6.3.

Country/area of low-carbon energy consumption

United States of America

Sourcing method

Unbundled procurement of energy attribute certificates (EACs)

Energy carrier

Electricity

Low-carbon technology type

Solar

Low-carbon energy consumed via selected sourcing method in the reporting year (MWh)

14,147.38

Tracking instrument used

US-REC

Country/area of origin (generation) of the low-carbon energy or energy attribute

United States of America

Are you able to report the commissioning or re-powering year of the energy generation facility?

No

Commissioning year of the energy generation facility (e.g. date of first commercial operation or repowering)

Comment

Low-carbon energy procured through third-party data center colocation providers

Country/area of low-carbon energy consumption

United States of America

Sourcing method

Other, please specify

Onsite Generation - Solar

Energy carrier

Electricity

Low-carbon technology type

Solar

Low-carbon energy consumed via selected sourcing method in the reporting year (MWh)

1,591.38

Tracking instrument used

Other, please specify

Onsite solar

Country/area of origin (generation) of the low-carbon energy or energy attribute

United States of America

Are you able to report the commissioning or re-powering year of the energy generation facility?

Yes

Commissioning year of the energy generation facility (e.g. date of first commercial operation or repowering)

2013

Comment

Onsite solar generation at Marvell's HQ in Santa Clara

Country/area of low-carbon energy consumption

United States of America

Sourcing method

Other, please specify

Retail supply contract with an electricity supplier (retail green electricity)

Energy carrier

Electricity

Low-carbon technology type

Low-carbon energy mix, please specify

The energy content consists of 60% renewable energy (wind, solar) and up to 95% carbon-free power (a combination of large hydroelectric and nuclear).

Low-carbon energy consumed via selected sourcing method in the reporting year (MWh)

928.59

Tracking instrument used

Contract

Country/area of origin (generation) of the low-carbon energy or energy attribute

United States of America

Are you able to report the commissioning or re-powering year of the energy generation facility?

Yes

Commissioning year of the energy generation facility (e.g. date of first commercial operation or repowering)

2020

Comment

Low-carbon energy procured through San Jose Clean Energy Community Choice Aggregate program

Country/area of low-carbon energy consumption

United States of America

Sourcing method

Other, please specify

Retail supply contract with an electricity supplier (retail green electricity)

Energy carrier

Electricity

Low-carbon technology type

Renewable energy mix, please specify
Solar, wind, small hydropower

Low-carbon energy consumed via selected sourcing method in the reporting year (MWh)

5,987.04

Tracking instrument used

Contract

Country/area of origin (generation) of the low-carbon energy or energy attribute

United States of America

Are you able to report the commissioning or re-powering year of the energy generation facility?

Yes

Commissioning year of the energy generation facility (e.g. date of first commercial operation or repowering)

2022

Comment

Low-carbon energy procured through Orange County Power Authority program

Country/area of low-carbon energy consumption

United Kingdom of Great Britain and Northern Ireland

Sourcing method

Unbundled procurement of energy attribute certificates (EACs)

Energy carrier

Electricity

Low-carbon technology type

Renewable energy mix, please specify
Solar, wind, small hydropower

Low-carbon energy consumed via selected sourcing method in the reporting year (MWh)

16.53

Tracking instrument used

REGO

Country/area of origin (generation) of the low-carbon energy or energy attribute

United Kingdom of Great Britain and Northern Ireland

Are you able to report the commissioning or re-powering year of the energy generation facility?

Yes

Commissioning year of the energy generation facility (e.g. date of first commercial operation or repowering)

2021

Comment

Low-carbon energy procured through E.On Next power, backed by REGOs

Country/area of low-carbon energy consumption

Singapore

Sourcing method

Unbundled procurement of energy attribute certificates (EACs)

Energy carrier

Electricity

Low-carbon technology type

Renewable energy mix, please specify
Solar, wind, small hydropower

Low-carbon energy consumed via selected sourcing method in the reporting year (MWh)

1,143.04

Tracking instrument used

Other, please specify
RECs

Country/area of origin (generation) of the low-carbon energy or energy attribute

Singapore

Are you able to report the commissioning or re-powering year of the energy generation facility?

Yes

Commissioning year of the energy generation facility (e.g. date of first commercial operation or repowering)

2020

Comment

Low-carbon energy procured through Flo Energy, backed by RECs

Country/area of low-carbon energy consumption

Romania

Sourcing method

Retail supply contract with an electricity supplier (retail green electricity)

Energy carrier

Electricity

Low-carbon technology type

Renewable energy mix, please specify

Solar, wind, small hydropower

Low-carbon energy consumed via selected sourcing method in the reporting year (MWh)

122.48

Tracking instrument used

Contract

Country/area of origin (generation) of the low-carbon energy or energy attribute

Romania

Are you able to report the commissioning or re-powering year of the energy generation facility?

Yes

Commissioning year of the energy generation facility (e.g. date of first commercial operation or repowering)

2022

Comment

Low-carbon energy procured through Timar Energy

C8.2g

(C8.2g) Provide a breakdown by country/area of your non-fuel energy consumption in the reporting year.

Country/area

Argentina

Consumption of purchased electricity (MWh)

359.46

Consumption of self-generated electricity (MWh)

0

Consumption of purchased heat, steam, and cooling (MWh)

0

Consumption of self-generated heat, steam, and cooling (MWh)

0

Total non-fuel energy consumption (MWh) [Auto-calculated]

359.46

Country/area

Canada

Consumption of purchased electricity (MWh)

691.74

Consumption of self-generated electricity (MWh)

0

Consumption of purchased heat, steam, and cooling (MWh)

0

Consumption of self-generated heat, steam, and cooling (MWh)

0

Total non-fuel energy consumption (MWh) [Auto-calculated]

691.74

Country/area

China

Consumption of purchased electricity (MWh)

2,061.67

Consumption of self-generated electricity (MWh)

0

Consumption of purchased heat, steam, and cooling (MWh)

0

Consumption of self-generated heat, steam, and cooling (MWh)

0

Total non-fuel energy consumption (MWh) [Auto-calculated]

2,061.67

Country/area

Denmark

Consumption of purchased electricity (MWh)

7.88

Consumption of self-generated electricity (MWh)

0

Consumption of purchased heat, steam, and cooling (MWh)

0

Consumption of self-generated heat, steam, and cooling (MWh)

0

Total non-fuel energy consumption (MWh) [Auto-calculated]

7.88

Country/area

Finland

Consumption of purchased electricity (MWh)

4.98

Consumption of self-generated electricity (MWh)

0

Consumption of purchased heat, steam, and cooling (MWh)

0

Consumption of self-generated heat, steam, and cooling (MWh)

0

Total non-fuel energy consumption (MWh) [Auto-calculated]

4.98

Country/area

Germany

Consumption of purchased electricity (MWh)

288.89

Consumption of self-generated electricity (MWh)

0

Consumption of purchased heat, steam, and cooling (MWh)

0

Consumption of self-generated heat, steam, and cooling (MWh)

0

Total non-fuel energy consumption (MWh) [Auto-calculated]

288.89

Country/area

India

Consumption of purchased electricity (MWh)

8,477.27

Consumption of self-generated electricity (MWh)

0

Consumption of purchased heat, steam, and cooling (MWh)

0

Consumption of self-generated heat, steam, and cooling (MWh)

0

Total non-fuel energy consumption (MWh) [Auto-calculated]

8,477.27

Country/area

Israel

Consumption of purchased electricity (MWh)

8,769.3

Consumption of self-generated electricity (MWh)

0

Consumption of purchased heat, steam, and cooling (MWh)

0

Consumption of self-generated heat, steam, and cooling (MWh)

0

Total non-fuel energy consumption (MWh) [Auto-calculated]

8,769.3

Country/area

Italy

Consumption of purchased electricity (MWh)

201.17

Consumption of self-generated electricity (MWh)

0

Consumption of purchased heat, steam, and cooling (MWh)

0

Consumption of self-generated heat, steam, and cooling (MWh)

0

Total non-fuel energy consumption (MWh) [Auto-calculated]

201.17

Country/area

Japan

Consumption of purchased electricity (MWh)

309.83

Consumption of self-generated electricity (MWh)

0

Consumption of purchased heat, steam, and cooling (MWh)

0

Consumption of self-generated heat, steam, and cooling (MWh)

0

Total non-fuel energy consumption (MWh) [Auto-calculated]

309.83

Country/area

Republic of Korea

Consumption of purchased electricity (MWh)

28.97

Consumption of self-generated electricity (MWh)

0

Consumption of purchased heat, steam, and cooling (MWh)

0

Consumption of self-generated heat, steam, and cooling (MWh)

0

Total non-fuel energy consumption (MWh) [Auto-calculated]

28.97

Country/area

Netherlands

Consumption of purchased electricity (MWh)

127.81

Consumption of self-generated electricity (MWh)

0

Consumption of purchased heat, steam, and cooling (MWh)

0

Consumption of self-generated heat, steam, and cooling (MWh)

0

Total non-fuel energy consumption (MWh) [Auto-calculated]

127.81

Country/area

Poland

Consumption of purchased electricity (MWh)

29.5

Consumption of self-generated electricity (MWh)

0

Consumption of purchased heat, steam, and cooling (MWh)

0

Consumption of self-generated heat, steam, and cooling (MWh)

0

Total non-fuel energy consumption (MWh) [Auto-calculated]

29.5

Country/area

Romania

Consumption of purchased electricity (MWh)

145.97

Consumption of self-generated electricity (MWh)

0

Consumption of purchased heat, steam, and cooling (MWh)

0

Consumption of self-generated heat, steam, and cooling (MWh)

0

Total non-fuel energy consumption (MWh) [Auto-calculated]

145.97

Country/area

Singapore

Consumption of purchased electricity (MWh)

1,376.43

Consumption of self-generated electricity (MWh)

0

Consumption of purchased heat, steam, and cooling (MWh)

0

Consumption of self-generated heat, steam, and cooling (MWh)

0

Total non-fuel energy consumption (MWh) [Auto-calculated]

1,376.43

Country/area

Spain

Consumption of purchased electricity (MWh)

25,835

Consumption of self-generated electricity (MWh)

0

Consumption of purchased heat, steam, and cooling (MWh)

0

Consumption of self-generated heat, steam, and cooling (MWh)

0

Total non-fuel energy consumption (MWh) [Auto-calculated]

25,835

Country/area

Sweden

Consumption of purchased electricity (MWh)

2

Consumption of self-generated electricity (MWh)

0

Consumption of purchased heat, steam, and cooling (MWh)

0

Consumption of self-generated heat, steam, and cooling (MWh)

0

Total non-fuel energy consumption (MWh) [Auto-calculated]

2

Country/area

United Kingdom of Great Britain and Northern Ireland

Consumption of purchased electricity (MWh)

20.59

Consumption of self-generated electricity (MWh)

0

Consumption of purchased heat, steam, and cooling (MWh)

0

Consumption of self-generated heat, steam, and cooling (MWh)

0

Total non-fuel energy consumption (MWh) [Auto-calculated]

20.59

Country/area

United States of America

Consumption of purchased electricity (MWh)

59,975

Consumption of self-generated electricity (MWh)

1,591.38

Consumption of purchased heat, steam, and cooling (MWh)

0

Consumption of self-generated heat, steam, and cooling (MWh)

0

Total non-fuel energy consumption (MWh) [Auto-calculated]

61,566.38

Country/area

Viet Nam

Consumption of purchased electricity (MWh)

598.79

Consumption of self-generated electricity (MWh)

0

Consumption of purchased heat, steam, and cooling (MWh)

0

Consumption of self-generated heat, steam, and cooling (MWh)

0

Total non-fuel energy consumption (MWh) [Auto-calculated]

598.79

C9. Additional metrics

C9.1

(C9.1) Provide any additional climate-related metrics relevant to your business.

Description

Metric value

Metric numerator

Metric denominator (intensity metric only)

% change from previous year

Direction of change

Please explain

C10. Verification

C10.1

(C10.1) Indicate the verification/assurance status that applies to your reported emissions.

	Verification/assurance status
Scope 1	Third-party verification or assurance process in place
Scope 2 (location-based or market-based)	Third-party verification or assurance process in place
Scope 3	Third-party verification or assurance process in place

C10.1a

(C10.1a) Provide further details of the verification/assurance undertaken for your Scope 1 emissions, and attach the relevant statements.

Verification or assurance cycle in place

Annual process

Status in the current reporting year

Complete

Type of verification or assurance

Limited assurance

Attach the statement

 Marvell 2022 CDP Verification Statement Limited_v2.pdf

Page/ section reference

Entire document (pages 1-3)

Relevant standard

ISO14064-3

Proportion of reported emissions verified (%)

100

C10.1b

(C10.1b) Provide further details of the verification/assurance undertaken for your Scope 2 emissions and attach the relevant statements.

Scope 2 approach

Scope 2 market-based

Verification or assurance cycle in place

Annual process

Status in the current reporting year

Complete

Type of verification or assurance

Limited assurance

Attach the statement

 Marvell 2022 CDP Verification Statement Limited_v2.pdf

Page/ section reference

Entire document (pages 1-3)

Relevant standard

ISO14064-3

Proportion of reported emissions verified (%)

100

C10.1c

(C10.1c) Provide further details of the verification/assurance undertaken for your Scope 3 emissions and attach the relevant statements.

Scope 3 category

Scope 3: Purchased goods and services

Verification or assurance cycle in place

Annual process

Status in the current reporting year

Complete

Type of verification or assurance

Limited assurance

Attach the statement

 Marvell 2022 CDP Verification Statement Limited_v2.pdf

Page/section reference

Entire document (pages 1-3)

Relevant standard

ISO14064-3

Proportion of reported emissions verified (%)

100



C10.2

(C10.2) Do you verify any climate-related information reported in your CDP disclosure other than the emissions figures reported in C6.1, C6.3, and C6.5?

Yes

C10.2a

(C10.2a) Which data points within your CDP disclosure have been verified, and which verification standards were used?

Disclosure module verification relates to	Data verified	Verification standard	Please explain
C5. Emissions performance	Renewable energy products	ISO 14064-3 (2019-04) Second Edition: Greenhouse gases -- Part 3: Specification with guidance for the verification and validation of greenhouse gas statements.	Marvell worked with a third-party assurance partner to verify our renewable electricity consumption (23,936 MWh), which includes all renewable energy commodities that Marvell procured in FY 2023.  1
C6. Emissions data	Renewable energy products	ISO 14064-3 (2019-04) Second Edition: Greenhouse gases -- Part 3: Specification with guidance for the verification and validation of greenhouse gas statements.	Marvell worked with a third-party assurance partner to verify our renewable electricity consumption (23,936 MWh), which includes all renewable energy commodities that Marvell procured in FY 2023.  1

 1Marvell 2022 CDP Verification Statement Limited_v2.pdf

C11. Carbon pricing

C11.1

(C11.1) Are any of your operations or activities regulated by a carbon pricing system (i.e. ETS, Cap & Trade or Carbon Tax)?

No, and we do not anticipate being regulated in the next three years

C11.2

(C11.2) Has your organization canceled any project-based carbon credits within the reporting year?

No

C11.3

(C11.3) Does your organization use an internal price on carbon?

No, and we do not currently anticipate doing so in the next two years

C12. Engagement

C12.1

(C12.1) Do you engage with your value chain on climate-related issues?

Yes, our suppliers

Yes, our customers/clients

Yes, other partners in the value chain

C12.1a

(C12.1a) Provide details of your climate-related supplier engagement strategy.

Type of engagement

Information collection (understanding supplier behavior)

Details of engagement

Collect GHG emissions data at least annually from suppliers

Collect other climate related information at least annually from suppliers

% of suppliers by number

17

% total procurement spend (direct and indirect)

80

% of supplier-related Scope 3 emissions as reported in C6.5

100

Rationale for the coverage of your engagement

All suppliers are required to comply with Marvell's Supplier Code of Conduct, which requires all suppliers and their subcontractors that are contracted to manufacture Marvell products or related components to comply with the RBA Code of Conduct. The RBA requests suppliers to track, document, and publicly report energy consumption and greenhouse gas emission data on an annual basis. Suppliers are also required to look for methods to improve energy efficiency and to minimize their energy consumption and greenhouse gas emissions. We actively engage with suppliers that comprise top 80% by spend to participate in the RBA Environmental survey.

In 2023, Marvell joined the CDP Supply Chain program, and we requested that our top suppliers (representing 80% by total direct supplier spend) participate in the 2023 CDP Supply Chain program. We selected these suppliers as they represent the majority of our spend and carbon impact from our supply chain.

Impact of engagement, including measures of success

Marvell has helped to advance action on climate change throughout our supplier base by advancing the RBA Code of Conduct. Measure of success: We measure the success of our RBA supplier engagement program (based on RBA Code 7.0) based on the number of our suppliers that disclose their energy use and GHG emissions to the RBA Self-Assessment Questionnaire (SAQ) and annual Environmental Survey, set emission reduction targets and commitments, and report against those commitments annually. We strive to have 100% of our suppliers (among those who are requested to submit their data) respond to the RBA annual survey. In 2023, Marvell also became a member of the CDP Supply Chain program, and more than 70% of suppliers requested to participate have confirmed to submit their responses (compared to a member average of 44%).

Impact of engagement: We have observed an improvement in a response rate through RBA, and we plan to continue tracking suppliers' climate-related responses, including GHG emission data, and information and progress on their carbon reduction goals and commitments – both through RBA and the CDP Supply Chain program. Based on the GHG data we collected to date, more than 70% of our direct suppliers have set a carbon reduction target and they have been annually reporting their progress through an RBA survey as well as their annual ESG Reports. We also track supplier RBA Validated Audit Program (VAP) scores. VAP tracks compliance with RBA Code of Conduct. We require all strategic suppliers to conduct an SAQ and encourage them to complete a VAP.

Comment

C12.1b

(C12.1b) Give details of your climate-related engagement strategy with your customers.

Type of engagement & Details of engagement

Education/information sharing

Share information about your products and relevant certification schemes (i.e. Energy STAR)

% of customers by number

100

% of customer - related Scope 3 emissions as reported in C6.5

100

Please explain the rationale for selecting this group of customers and scope of engagement

Rationale: Since Marvell is a fabless semiconductor company focused on product design, we view product power and energy efficiency as a differentiator of our products, and we are engaging all our customers to make sure we are meeting their demand for

products with lower power consumption. Many of our key customers have set carbon reduction goals, and we also enhance our engagement with these customers to align around carbon emission reduction priorities and explore opportunities for co-innovation. Scope of engagement: We report on our sustainability and product power performance to all customers via our annual ESG report (<https://www.marvell.com/company/esg.html>) and website. We also include information on the potential power and energy savings of our products in our responses to customers' requests for proposals (RFPs) and our direct business-to-business marketing materials. We also engage with customers on climate change via Ecovadis, and we make our annual response available to any customer that requests it. We are proactively reaching out to our customers directly to engage them on climate-related matters, through 1:1 meetings and our annual customer survey. In addition, we respond to direct customer requests regarding climate change and engage in calls to discuss strategies to work towards our climate commitments. Climate change may also be called out in customers' Supplier Codes of Conduct, which we sign and comply with.

Impact of engagement, including measures of success

Engagement with direct customers on sustainability performance of our products are prioritized to ensure that Marvell products meet and exceed industry and specific customer requirements. The impact of these engagements in FY 2023 (reporting period) included Marvell's enhanced reputation, direct positive feedback from customers on our sustainability performance, as well as Marvell's continuous ability to win new business and meet customers' expectations around our products. We track the number of customers who engage with us via direct engagements, CDP, RBA, Ecovadis, and their own Supplier Codes of Conduct. Measures of success: We measure success of our customer engagement by tracking the following metrics: (1) year-over-year increase in the number of collaborative opportunities around product power reduction that emerged as a result of direct customer engagement, (2) positive feedback received from customers, leading to deepening customer relationships, (3) positive responses we receive from customers through our annual customer survey, and (4) maintaining relationships with existing customers and winning new business. In FY23 (reporting period), our ESG team directly engaged with more than 30 customers, identified several opportunities to work with customers around our corporate climate commitments and product power. For example, as a result of direct customer engagement, we set a target to conduct lifecycle assessments (LCA) on our three key product families. LCAs will help us identify our product GHG emission hotspots, so we can optimize our product design to reduce the energy consumption and carbon footprint of our products.

C12.1d

(C12.1d) Give details of your climate-related engagement strategy with other partners in the value chain.

Our key partners in the value chain are our employees, suppliers, customers, investors, subcontractors, non-governmental organization, trade associations, industry organizations and consortia, as well as government and regulatory associations. We use multiple channels to communication with our stakeholders and keep them informed about our progress on ESG

issues, including those related to climate. Method of engagement include regular meetings and calls, participation in industry working groups and conferences, sharing communication materials, and responding to direct requests. For the purposes of CDP reporting, we are providing an example of our engagement with investors, employees, and industry consortia.

Investor engagement: We regularly engage with our investors and shareholders, and view our sustainability strategy and commitments, including those related to climate, as an advantage and differentiator. We integrate information on our sustainability performance, including our progress on climate strategy and commitments, in the communication with our large institutional investors through 1:1 meetings, our Investor Days (every 18 months), investor roadshows, quarterly earnings calls, and SEC filings. We also disclose our sustainability data and progress on our climate goals and commitments in our annual ESG Report, which is aligned with key ESG reporting frameworks, such as the Global Reporting Initiative (GRI) Standards, the Sustainable Accounting Standards Board (SASB), the Task Force on Climate-related Financial Disclosures (TCFD), the United Nations Guiding Principles on Business and Human Rights Reporting Framework, and the UN Sustainable Development Goals. We are also continuously monitoring our ESG performance based on ratings and rankers, and in FY23 (reporting year), we improved our MSCI score to AA (leader) and maintained low risk (ESG Risk Rating 17.5) by Sustainalytics.

Industry consortia: In FY23 (reporting period), Marvell joined the Semiconductor Climate Consortium, which is the first of its kind collaborative for companies operating in the semiconductor space and which works to speed industry value chain efforts to reduce greenhouse gas emissions in member company operations and in other sectors of our value chain. The consortium is based on three pillars: (1) Collaborate and align (aligning on common approaches to continuously improve and reduce greenhouse gas emissions in the semiconductor industry value chain), (2) Be transparent and report (publicly reporting progress and GHG emissions for the value chain annually according to the guidelines and principles in the GHG Protocol and agree to key underlying assumptions), and (3) Be ambitious and target net zero. Through the consortium, Marvell has been working with companies (including our suppliers, customers, and peers) from across the value chain to address industry-level climate change issues through GHG emission baselining, carbon reduction roadmap development, advancing renewable energy sourcing, and improving communications between semiconductor equipment suppliers to support new manufacturing and reporting efficiencies, among others.

Employee engagement: Marvell reaches out to our employees (other partners in the value chain) globally through Marvell's Intranet, direct emails, as well as through employee engagement events. For example, in FY23 (reporting period), Marvell's ESG team hosted three sustainability webinars to raise awareness among our employees about environmental issues, including climate change (total attendance was 1,000 employees, representing over 10% of our total headcount). We also run a global Earth Week event that featured two webinars with external and internal speakers (total attendance was 330 employees, representing about 5% of our total headcount). During these events, we share with employees the updates on Marvell's company-wide strategy around sustainability as well as provide solutions and resources to encourage employees to reduce their own carbon footprint through more sustainable lifestyle choices. We also host a global annual Innovation Contest which encourages employees to

submit their project proposals that help solve problems or identify opportunities to improve an area of our customers' businesses, including product design solutions that lead to product power efficiency during the use phase. Additional engagements with our employees around sustainability and climate include swapping non-essential travel for video conferencing, offering options for bike usage on campus, ride-share, and carpool information. Through continuous engagement, whether it be through similar events or online communication platforms, we encourage our employees to take action on climate change.

C12.2

(C12.2) Do your suppliers have to meet climate-related requirements as part of your organization's purchasing process?

No, but we plan to introduce climate-related requirements within the next two years

C12.3

(C12.3) Does your organization engage in activities that could either directly or indirectly influence policy, law, or regulation that may impact the climate?

Row 1

External engagement activities that could directly or indirectly influence policy, law, or regulation that may impact the climate

Yes, our membership of/engagement with trade associations could influence policy, law, or regulation that may impact the climate

Does your organization have a public commitment or position statement to conduct your engagement activities in line with the goals of the Paris Agreement?

Yes

Attach commitment or position statement(s)

 Marvell Commitment Letter - Business Ambition for 1.5 Campaign.pdf

Describe the process(es) your organization has in place to ensure that your external engagement activities are consistent with your climate commitments and/or climate transition plan

To commit to conduct our engagement activities in line with the goals of the Paris Agreement, we signed the Business Ambition for 1.5°C Pledge. This is a campaign led by the United Nations Global Compact, We Mean Business and the Science- Based Targets Initiative that urges companies to set science-based targets aiming for net zero greenhouse gas emissions by 2050.

Marvell's ESG Working Groups provide cross-functional knowledge and decision-making to develop, deliver and report on Marvell's ESG efforts, including those related to the SBT goal setting. Relevant topics covered by the Environment and Responsible

Product Design working groups include climate, waste, and water in our direct operations, and across the value chain. Each working group has an executive-level sponsor who sits on the ESG Committee and retains ultimate accountability for the Working Group's responsibilities; the group will provide bimonthly updates to the sponsor in advance of the committee meetings. As part of its duties, the working group will set strategies and goals and identify and deliver approaches to managing environmental topics, such as climate and water. The cross-functionality of the working groups combined with the executive level of sponsorship adds a layer of checks and balances to ensure that all activities are consistent with Marvell's overall climate change strategy. Additionally, Marvell's ESG Committee provides, among other things, executive oversight and support of Marvell's strategy, goals and incentives to address its ESG issues. The Committee will assist in setting the company's general strategy with respect to ESG matters such as climate and water and will consider and recommend, policies, practices, and disclosures that conform with the strategy. It will also consider and inform the Board of Directors, the Board of Directors' Committees, and senior leadership, as appropriate, on current and emerging ESG matters that may affect the business, operations, performance or public image of the Company or are otherwise pertinent to the Company and its stakeholders, and will make recommendations on how the Company's policies, practices and disclosures can adjust to or address current trends.

C12.3b

(C12.3b) Provide details of the trade associations your organization is a member of, or engages with, which are likely to take a position on any policy, law or regulation that may impact the climate.

Trade association

Other, please specify

Semiconductor Industry Association (SIA)

Is your organization's position on climate change policy consistent with theirs?

Consistent

Has your organization attempted to influence their position in the reporting year?

Yes, we publicly promoted their current position

Describe how your organization's position is consistent with or differs from the trade association's position, and any actions taken to influence their position

The Semiconductor Industry Association (SIA) advances policies that help the semiconductor industry grow and unites semiconductor companies around common challenges. SIA and its members have been engaged in ongoing efforts to reduce GHG

emissions both in their own operations and by designing and fabricating products with improved energy efficiency to drive down emissions throughout the economy. Under a Memorandum of Understanding (MOU) with EPA, SIA members voluntarily reported on their emissions of PFCs, a category of GHGs. Under this agreement, SIA members reduced their collective absolute US emissions of F-gases by more than 35% since 1995; and down 50% from their peak in 1999. SIA and its members have participated in the efforts of the World Semiconductor Council (WSC) to reduce emissions of PFCs. The global industry committed to a 10% reduction from a baseline year, and in 2011 the industry announced that it far surpassed this goal and achieved a reduction of 32% in absolute emissions. To build on this success, the global industry is implementing a new 10-year reduction goal. Since Marvell is a member of SIA and Marvell's CEO sits on the SIA's Board of Directors, we engage with Congress, the Administration, and key industry stakeholders to encourage policies and regulations that fuel innovation and promote environmental sustainability in the design, manufacture, and use of semiconductor products, as well as the health and safety of its operations and impacts on workers in semiconductor facilities.

Funding figure your organization provided to this trade association in the reporting year (currency as selected in C0.4)

333,785

Describe the aim of your organization's funding

To maintain its membership with the SIA, Marvell contributes to SIA an annual Charter Membership fee. Charter Membership is reserved for semiconductor design and manufacturing companies (integrated device manufacturers, foundries, fablite, and fabless firms) headquartered in the United States.

Have you evaluated whether your organization's engagement with this trade association is aligned with the goals of the Paris Agreement?

Yes, we have evaluated, and it is aligned

Trade association

Other, please specify

Semiconductor Climate Consortium

Is your organization's position on climate change policy consistent with theirs?

Consistent

Has your organization attempted to influence their position in the reporting year?

Yes, we publicly promoted their current position

Describe how your organization's position is consistent with or differs from the trade association's position, and any actions taken to influence their position

In FY23 (reporting period), Marvell joined the Semiconductor Climate Consortium, which is the first of its kind collaborative for companies operating in the semiconductor space and which works to speed industry value chain efforts to reduce greenhouse gas emissions in member company operations and in other sectors of our value chain. The consortium is based on three pillars: (1) Collaborate and align (aligning on common approaches to continuously improve and reduce greenhouse gas emissions in the semiconductor industry value chain), (2) Be transparent and report (publicly reporting progress and GHG emissions for the value chain annually according to the guidelines and principles in the GHG Protocol and agree to key underlying assumptions), and (3) Be ambitious and target net zero. Marvell's position is aligned with the consortium, and through the consortium working groups, Marvell has been engaging with members companies from across the value chain to address industry-level climate change issues through GHG emission baselining, industry-level carbon reduction roadmap development, advancing renewable energy sourcing globally, and improving communications between semiconductor equipment suppliers to support new manufacturing and reporting efficiencies, among others.

Funding figure your organization provided to this trade association in the reporting year (currency as selected in C0.4)

15,000

Describe the aim of your organization's funding

To maintain its membership with the Semiconductor Climate Consortium, Marvell contributes an annual Participant Level membership fee.

Have you evaluated whether your organization's engagement with this trade association is aligned with the goals of the Paris Agreement?

Yes, we have evaluated, and it is aligned

C12.4

(C12.4) Have you published information about your organization's response to climate change and GHG emissions performance for this reporting year in places other than in your CDP response? If so, please attach the publication(s).

Publication

In mainstream reports

Status

Complete

Attach the document

 MRVL (Marvell Technology Inc.) (10-K) 2023-03-09.pdf_.pdf

Page/Section reference

Page 13, see section 'Climate Change'

Content elements

Governance
Strategy
Risks & opportunities
Emissions figures
Emission targets

Comment

Marvell's FY 2023 Annual Report on Form 10-K: <https://investor.marvell.com/annual-reports>


Publication

In voluntary sustainability report

Status

Underway – previous year attached

Attach the document

 Marvell_FY22_ESG_Report.pdf

Page/Section reference

Page 12 ('Climate Change Governance'), pages 17-20 ('Climate Change' and 'Product Power')

Content elements

Governance
Strategy
Risks & opportunities
Emissions figures
Emission targets

Comment

C12.5

(C12.5) Indicate the collaborative frameworks, initiatives and/or commitments related to environmental issues for which you are a signatory/member.

Environmental collaborative framework, initiative and/or commitment	Describe your organization's role within each framework, initiative and/or commitment
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<p>Row 1</p>	<p>Business Ambition for 1.5C UN Global Compact Other, please specify</p>	<p>Business Ambition for 1.5°C: In FY22, we joined the Business Ambition for 1.5°C call to action and committed to set a science-based emission reduction target aligned with the Science-Based Target initiative’s (SBTi) guidance and criteria. In FY24 (current fiscal year at Marvell), we completed our science-based target setting process and developed an internal achievement roadmap that would inform our carbon reduction strategy. WE expect to have our SBT validated by SBTi later in FY24.</p> <p>UN Global Compact: Marvell is a signatory to the United Nations Global Compact (UNGC), which is a special initiative of the Executive Office of the Secretary-General and the world’s largest corporate sustainability initiative. The UNGC calls for companies to align their strategies and operations with universal principles on human rights, labour, environment, and anti-corruption, and take actions that advance broader societal goals aligned with the United Nations’ Sustainable Development Agenda and the Sustainable Development Goals. Marvell supports the Ten Principles of the UNGC in the areas of Human Rights, Labor, Environment and Anti-Corruption and annually submits our Communication on Progress.</p> <p>Semiconductor Climate Consortium: In FY23 (reporting period), Marvell became a member of the Semiconductor Climate Consortium, which is the first of its kind collaborative for companies operating in the semiconductor space and which works to speed industry value chain efforts to reduce greenhouse gas emissions in member company operations and in other sectors of our value chain. The consortium is based on three pillars: (1) Collaborate and align (aligning on common approaches to continuously improve and reduce greenhouse gas emissions in the semiconductor industry value chain, (2) Be transparent and report (publicly reporting progress and GHG emissions for the value chain annually according to the guidelines and principles in the GHG Protocol and agree to key underlying assumptions), and (3) Be ambitious and target net zero. Marvell’s position is aligned with the consortium, and through the consortium working groups, Marvell has been engaging with members companies from across the value chain to address industry-level climate change issues through GHG emission baselining, industry-level carbon reduction roadmap development, advancing renewable energy sourcing globally, and improving communications between semiconductor equipment suppliers to support new manufacturing and reporting efficiencies, among others.</p> <p>Clean Energy Buyers Association (CEBA): An important part of Marvell’s science-based target achievement roadmap is procuring</p>
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		<p>renewable energy for our owned and leased facilities wherever possible. In FY23 (reporting period), recognizing the need to scale renewable energy availability in the U.S., we joined the Clean Energy Buyers Alliance (CEBA) as a member. This community of institutional energy customers partners with clean energy providers, business partners, leading environmental nongovernmental organizations and top climate-focused philanthropies to drive a vision of “customer-driven clean energy for all.” Its members help to deploy market and policy solutions for a carbon-free energy system in the U.S.</p> <p>Responsible Business Alliance (RBA): Marvell is a member of the Responsible Business Alliance, a nonprofit organization that is the world’s largest industry coalition dedicated to corporate social responsibility in global supply chains, which includes members from the electronics, retail, auto and toy industries. Within our Supplier Code of Conduct, we expect our suppliers to follow the RBA Code of Conduct. Working through the RBA helps to drive consistency in the standards across our industry and allows us to help improve ESG practices in partnership with our customers and peers. We are committed to adopting and implementing the RBA Code internally at Marvell and externally with our supply chain partners. In FY23 (reporting year), we joined the RBA Environmental Sustainability Workgroup. As part of this group, we regularly engage with our peers and partners in the technology space and collaborate on sustainability initiatives and solutions that drive improvement in our organizations and supply chains, including climate action, water stewardship and waste reduction, among others. Specific strategies and tools are co-developed in partnership with RBA to improve measurement of environmental impact, enable higher resource efficiency and building industry capacity and performance. These include, an emissions management tool, an annual environmental survey, an environmental maturity profile, supplier trainings as well as new e-waste and circular economy working groups.</p>
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C15. Biodiversity

C15.1

(C15.1) Is there board-level oversight and/or executive management-level responsibility for biodiversity-related issues within your organization?

	<p>Board-level oversight and/or executive management-level responsibility for biodiversity-related issues</p>
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Row 1	No, and we do not plan to have both within the next two years
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C15.2

(C15.2) Has your organization made a public commitment and/or endorsed any initiatives related to biodiversity?

Indicate whether your organization made a public commitment or endorsed any initiatives related to biodiversity	
Row 1	No, and we do not plan to do so within the next 2 years

C15.3

(C15.3) Does your organization assess the impacts and dependencies of its value chain on biodiversity?

Impacts on biodiversity

Indicate whether your organization undertakes this type of assessment

No and we don't plan to within the next two years

Dependencies on biodiversity

Indicate whether your organization undertakes this type of assessment

No and we don't plan to within the next two years

C15.4

(C15.4) Does your organization have activities located in or near to biodiversity-sensitive areas in the reporting year?

Not assessed

C15.5

(C15.5) What actions has your organization taken in the reporting year to progress your biodiversity-related commitments?

Have you taken any actions in the reporting period to progress your biodiversity-related commitments?	
Row 1	No, and we do not plan to undertake any biodiversity-related actions

C15.6

(C15.6) Does your organization use biodiversity indicators to monitor performance across its activities?

	Does your organization use indicators to monitor biodiversity performance?	Indicators used to monitor biodiversity performance
Row 1	No	

C15.7

(C15.7) Have you published information about your organization’s response to biodiversity-related issues for this reporting year in places other than in your CDP response? If so, please attach the publication(s).

Report type	Content elements	Attach the document and indicate where in the document the relevant biodiversity information is located

C16. Signoff

C-FI

(C-FI) Use this field to provide any additional information or context that you feel is relevant to your organization's response. Please note that this field is optional and is not scored.

C16.1

(C16.1) Provide details for the person that has signed off (approved) your CDP climate change response.

	Job title	Corresponding job category
Row 1	Chief Operations Officer	Chief Operating Officer (COO)