

Welcome to your CDP Water Security Questionnaire 2022

W0. Introduction

W0.1

(W0.1) Give a general description of and introduction to your organization.

JT Group is a leading global tobacco company operating in over 70 markets and our products are sold in over 130 markets. We are also active in pharmaceutical and processed food business and we expect them to establish a foundation for future profit contribution, as we strive for sustainable growth. Headquartered in Tokyo, JT is listed on the Tokyo Stock Exchange and our company comprises three main business units: Tobacco business: headquartered in Geneva, Switzerland since 2022, manufactures and offers tobacco products all over the world. Our leading brands are Winston, Camel, MEVIUS and LD in combustibles, as well as Ploom and Logic in RRP (Reduced-Risk Products). Pharmaceutical business: Our pharmaceutical business focuses on the R&D, manufacturing, and sale of prescription drugs, concentrating on three specific therapeutic areas: Cardiovascular, Renal and Metabolism (CVRM); immunology; and neuroscience. Processed food business: Our processed food business handles the frozen and ambient food business, mainly for frozen noodles, packaged cooked rice, and frozen okonomiyaki (Japanese savory pancakes); the seasonings business, focusing on seasonings including yeast extracts; and the bakery business through bakery chain outlets, mainly in the Tokyo metropolitan area.

W-FB0.1a

(W-FB0.1a) Which activities in the food, beverage, and tobacco sector does your organization engage in?

- Agriculture
- Processing/Manufacturing
- Distribution

W0.2

(W0.2) State the start and end date of the year for which you are reporting data.

	Start date	End date
Reporting year	January 1, 2021	December 31, 2021

W0.3

(W0.3) Select the countries/areas in which you operate.

Algeria
Andorra
Armenia
Austria
Azerbaijan
Bangladesh
Belarus
Belgium
Bolivia (Plurinational State of)
Brazil
Bulgaria
Cambodia
Canada
China
Colombia
Czechia
Denmark
Dominican Republic
Egypt
Ethiopia
Finland
France
Georgia
Germany
Greece
Hong Kong SAR, China
Hungary
Indonesia
Iran (Islamic Republic of)
Ireland
Italy
Japan
Jordan
Kazakhstan
Kyrgyzstan
Lebanon
Lithuania
Malawi
Malaysia
Mexico
Mongolia
Morocco
Myanmar

Netherlands
Nigeria
Norway
Philippines
Poland
Portugal
Republic of Korea
Republic of Moldova
Romania
Russian Federation
Serbia
Singapore
Slovakia
South Africa
South Sudan
Spain
Sudan
Sweden
Switzerland
Taiwan, China
Tajikistan
Thailand
Tunisia
Turkey
Ukraine
United Arab Emirates
United Kingdom of Great Britain and Northern Ireland
United Republic of Tanzania
United States of America
Viet Nam
Zambia

W0.4

(W0.4) Select the currency used for all financial information disclosed throughout your response.

JPY

W0.5

(W0.5) Select the option that best describes the reporting boundary for companies, entities, or groups for which water impacts on your business are being reported.

Companies, entities or groups over which operational control is exercised

W0.6

(W0.6) Within this boundary, are there any geographies, facilities, water aspects, or other exclusions from your disclosure?

No

W0.7

(W0.7) 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, an ISIN code	JP3726800000

W1. Current state

W1.1

(W1.1) Rate the importance (current and future) of water quality and water quantity to the success of your business.

	Direct use importance rating	Indirect use importance rating	Please explain
Sufficient amounts of good quality freshwater available for use	Vital	Important	Water is vital for JTG as we cannot operate our business without water. Many of JT Group's operations are water intensive. In particular, our primary use of freshwater is for manufacturing products within our processed food business. These processes require a significant quantity of good quality freshwater. Across our business segments, we aim to locate operations in water rich areas. If an operation is located in a water-scarce area, we aim to cut down on water use in order to reduce water risks, both in our business and in communities within which we operate. Across our business segments, good quality freshwater for indirect use is also important to us. Our primary indirect use of freshwater is for growing agricultural products such as tobacco leaf, but it is also important in the manufacture of paper, card and other materials. We do not foresee changes in the business processes for

			which we / our suppliers depend on water. For instance, our dependency on water is not likely to lessen significantly for the processing of food products or the growing of tobacco leaves in the future.
Sufficient amounts of recycled, brackish and/or produced water available for use	Important	Important	Recycling water is important for both direct and indirect use as it contributes to reducing water withdrawn and discharged, as well as reducing costs for our operations. Some of JT Group's direct operations use recycled water within the production process as well as for sanitary purposes. Within our tobacco business, a number of operations located within water-scarce areas use recycled water. Recycled water is also important in indirect operations, for example, in the manufacturing of paper, card and other materials. This is unlikely to change in the future. Recycled water will continue to be important for our business as the forecast is that access to fresh water will reduce globally. However, most of the water used in our manufacturing processes is fresh water. Therefore, although the importance of recycled water is high, it is considered that its importance continues to be lower than that for fresh water.

W-FB1.1a

(W-FB1.1a) Which water-intensive agricultural commodities that your organization produces and/or sources are the most significant to your business by revenue?

Select up to five.

Agricultural commodities	% of revenue dependent on these agricultural commodities	Produced and/or sourced	Please explain
Tobacco	More than 80%	Sourced	90.1% of JT Group's revenue is relevant to our tobacco business that significantly depends on tobacco, our key agricultural commodity. The remainder of the revenue comes from our pharmaceutical business (3.5%), our processed food business (6.3%) and others (0.1%). Tobacco accounts for a significant proportion of revenue and accounts for the majority of emissions and so

			it will be the only commodity presented in this response.
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W1.2

(W1.2) Across all your operations, what proportion of the following water aspects are regularly measured and monitored?

	% of sites/facilities/operations	Please explain
Water withdrawals – total volumes	76-99	Water withdrawal data are collected from all JT Group sites using actual data, whenever they are available, or using extrapolation where actual data are not available. For our tobacco business of JTI, total volumes are monitored monthly for manufacturing facilities and quarterly for non-manufacturing facilities. For operations in Japan, total volumes are monitored every two months for all sites, while extrapolation is made once a year for the sites where actual data are not available.
Water withdrawals – volumes by source	76-99	Water withdrawal data are collected from all JT Group sites using actual data, whenever they are available, or using extrapolation where actual data are not available. For our tobacco business of JTI, volumes by source are monitored monthly for manufacturing facilities and quarterly for non-manufacturing facilities. For operations in Japan, volumes by source are monitored every two months for all sites, while extrapolation is made once a year for the sites where actual data are not available.
Water withdrawals quality	76-99	Water withdrawal quality data are assessed at JT Group facilities where water quality is an important aspect for our production. The monitoring frequency is decided by individual facilities. Where water quality is critical for production and product quality we typically monitor this monthly. At other locations, the quality of water withdrawn is periodically monitored. Monitoring is typically by direct sampling and analysis.
Water discharges – total volumes	76-99	Water discharge data are collected from all JT Group sites using actual data, whenever they are available, or using extrapolation where actual

		<p>data are not available. For our tobacco business of JTI, total volumes are monitored monthly for manufacturing facilities and quarterly for non-manufacturing facilities. For our operations in Japan, total volumes are monitored every two months for all sites, while extrapolation is made once a year for the sites where actual data are not available.</p>
Water discharges – volumes by destination	76-99	<p>Data in relation to water discharge destination are collected from all JT Group sites, whenever available. If the destination is not known, it is assumed that the wastewater is sent for municipal treatment. In the absence of volume data, it is assumed that water discharge is the same as water withdrawal. For our tobacco business of JTI, volumes by destination are monitored monthly for manufacturing facilities and quarterly for non-manufacturing facilities. For our operations in Japan, volumes by destination are monitored every two months for all sites, while extrapolation is made once a year for the sites where actual data are not available.</p>
Water discharges – volumes by treatment method	76-99	<p>Final treatment method is determined at JT Group site level by destination of water discharged. The data are mainly collected from sites where actual data are available and in some cases, extrapolated for sites where actual data are not available. For our tobacco business of JTI, volumes by treatment method are monitored monthly for manufacturing facilities and quarterly for non-manufacturing facilities. For our operations in Japan, volumes by treatment method are monitored every two months for all sites, while extrapolation is made once a year for the sites where actual data are not available.</p>
Water discharge quality – by standard effluent parameters	76-99	<p>JT Group's operations are located in jurisdictions that have regulatory requirements with differing water discharge parameters. The monitoring frequency is decided by individual facilities dependent on local regulatory requirements and site procedures. For production facilities, this is typically monthly. Our factories are required to monitor water discharge before and after on-site treatment, where installed. In 2018 our tobacco business of JTI introduced an internal guidance</p>

		with a list of parameters and minimum expectations (concentrations) for direct discharge in natural waters, against which factories monitor such discharges. In relation to exceedances of standard effluent parameters, data are collected from a site when it does not meet the water discharge parameters prescribed in the regulations relevant to that location.
Water discharge quality – temperature	76-99	Monitoring is conducted by reviewing local regulation and putting in place the relevant monitoring requirements. Where temperature is a regulatory-prescribed parameter and/or a critical variable in water discharged, we monitor this monthly, in-line with other wastewater monitoring. At other locations, the monitoring frequency varies between monthly and annually. For some locations, e.g. where water discharged will typically not be of excessive or variable temperature (e.g. sanitary wastewater only) we do not routinely monitor.
Water consumption – total volume	76-99	We apply the following formula for water consumption: $\text{Water consumption} = \text{Water withdrawals} - \text{Water discharges}$ Total volumes are calculated monthly for manufacturing facilities and quarterly for non-manufacturing facilities.
Water recycled/reused	76-99	Water recycled/reused data are monitored at JT Group’s manufacturing and processing facilities. Frequency of monitoring is monthly. Where possible this is monitored by direct measurement.
The provision of fully-functioning, safely managed WASH services to all workers	100%	Fully functioning WASH services are deemed to be provided where a facility is providing workers with drinking water and sanitation facilities, and the facility hasn’t received any upheld claims from workers relating to their access to drinking water or sanitation facilities. Dedicated departments at sites monitor functioning and management of wash services once a week and implement improvements if required. We monitor by direct inspection, for example, when we carry out assessments/audits of our locations and by checking claims if they arise.

W1.2b

(W1.2b) What are the total volumes of water withdrawn, discharged, and consumed across all your operations, and how do these volumes compare to the previous reporting year?

	Volume (megaliters/year)	Comparison with previous reporting year	Please explain
Total withdrawals	9,856	About the same	In the processed food business that consumes the most water in the group, the production volume of products that use a lot of water, decreased as well as new equipment installation and existing ones upgraded which improved the water efficiency of the entire group, resulting in a decrease in total water withdrawal. As a result, FY2021 is about the same as FY2020 (3.6% decrease). Going forward, we will be striving for improving water withdrawal, as an increase is expected due to the production volume growth in the processed food business.
Total discharges	5,581	About the same	In processed food business that consumes the most water in the group, the production volume of products, that use a lot of water, decreased as well as new equipment installed and existing ones upgraded which improved the water efficiency of the entire group, resulting in a decrease in total discharges. As a result, FY2021 is about the same as FY2020 (3.3% decrease). Going forward, we will be striving for improving water discharge as an increase is expected due to the production volume growth in processed food business.
Total consumption	4,275	About the same	In processed food business that consumes the most water in the group, the production volume of products, that use a lot of water, decreased as well as new equipment installed and existing ones upgraded which improved the water efficiency of the entire group, resulting in a decrease in total water consumption. As a result, FY2021 is about the same as FY2020 (4.0% decrease). Going forward, we will be striving for improving

			water intensity as an increase is expected due to the production volume growth in processed food business.
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W1.2d

(W1.2d) Indicate whether water is withdrawn from areas with water stress and provide the proportion.

	Withdrawals are from areas with water stress	% withdrawn from areas with water stress	Comparison with previous reporting year	Identification tool	Please explain
Row 1	Yes	1-10	About the same	WRI Aqueduct	JT Group established a water risk assessment methodology in 2016 and started to assess water risks at our JT Group manufacturing sites. In 2017 we began tracking the percentage of water withdrawn from stressed areas. We use WRI Aqueduct to inform our assessment of water stress at all sites within direct operations. All sites that were rated high to extremely high risk in the "Baseline Water Stress" were considered to be in water stressed areas. We also included locations in "Arid and Low Water Use". The WRI Aqueduct tool has had an update in August 2019 following which the ratings for water stress at many of our sites increased. As overall water withdrawal is about the same and business footprint didn't change in 2021 volumes withdrawn from areas with water stress have not changed as well.

W-FB1.2e

(W-FB1.2e) For each commodity reported in question W-FB1.1a, do you know the proportion that is produced/sourced from areas with water stress?

Agricultural commodities	The proportion of this commodity produced in areas with water stress is known	The proportion of this commodity sourced from areas with water stress is known	Please explain
Tobacco	Not applicable	Yes	<p>JT Group partially owns a small amount of land which is used for tobacco production. However, this production volume is not material in comparison to tobacco sourced from third parties (about 0.1%).</p> <p>The WRI Aqueduct tool has been used to assess commodities sourced from water stressed areas. This assessment is of baseline water stress, covering quantity of water sourced. This is in line with the JT Group internal risk assessment methodology we have developed and implemented since 2016. For some countries Maplecroft Risk Indices was more appropriate to carry out the assessment. For the purpose of this assessment, sites in areas that were rated medium to extremely high risk in the "Baseline water stress" category for Aqueduct and "Water stress" category for Maplecroft Risk Indices were considered to be in water stressed areas.</p>

W-FB1.2g

(W-FB1.2g) What proportion of the sourced agricultural commodities reported in W-FB1.1a originate from areas with water stress?

Agricultural commodities	% of total agricultural commodity sourced from areas with water stress	Please explain
Tobacco	Less than 1%	<p>The figure was calculated using WRI Aqueduct and Maplecroft Risk Indices assessments of sourcing locations. All locations rated high to extremely high risk in the "Baseline</p>

		<p>water stress" category for Aqueduct and "Water stress" category for Maplecroft Risk Indices were considered to be in water stressed areas. A small amount of tobacco leaf sourced from Lebanon and North Macedonia was identified as being in a water stressed area. Further Aqueduct assessment found that water stress in Turkey could increase by 1.4 times by 2030.</p> <p>Leaf tobacco is procured from raw material suppliers based in Turkey, the USA and other countries, where water stress varies by location, so if the proportion of leaf tobacco procured change, that of procurement from stressed regions could also change. It is possible to source from multiple regions to reduce the effects of water stress.</p> <p>Metrics from these assessments clearly show that water stress is increasing across our global supply chain. This information is directly fed into our Environment Plan 2030 and therefore is reflected in our long-term strategic planning. An example of this is our commitment in the JTG Environment Plan 2030 that by 2022 we will have implemented a water risk management process in our manufacturing supply chain. We completed the pilot phase of this work in 2020. We prioritized the list of strategically important non-tobacco materials suppliers based on water intensity of the products supplied and whether the suppliers fell into a 'polluting industry'. We then assessed the risks associated with the suppliers based on published information. Currently we are developing comprehensive approach to assess and manage ESG risks in our supply chain including water related issues. By the end of 2021, 99.6% of our key suppliers had been screened against ESG criteria including Water security and risks. In 2021, we have developed a thorough new supplier screening process. We also selected and initiated the discussion with the right business partners to kick off a pilot implementation in 2022. In terms of tobacco leaf suppliers, JTI is one of six tobacco companies who have worked together on the Sustainable Tobacco Program (STP), an industry-wide platform enabling businesses to collaborate on human rights, environmental issues, and other sustainability challenges, and to drive sustainable agriculture through a continuous improvement process. Water is one of the 8 focus areas of STP.</p>
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W1.2h

(W1.2h) Provide total water withdrawal data by source.

	Relevance	Volume (megaliters/year)	Comparison with previous reporting year	Please explain
Fresh surface water, including rainwater, water from wetlands, rivers, and lakes	Relevant	1,812	About the same	An overseas factory in our processed food business withdraws the river water for production, cleaning and cooling facilities/machinery. In 2021, the production volume of products that use a lot of river water increased slightly. For future years, the processed food business plans to increase the production and as such, the water withdrawal also will be increased. Recognizing this, we will be striving for improving water intensity.
Brackish surface water/Seawater	Not relevant			JT Group does not withdraw any water from this source. This is not predicted to change in the near future.
Groundwater – renewable	Relevant	5,171	Lower	Some of our factories use this water, for some purposes, for example, cleaning and cooling facilities/machinery. In the processed food business that consumes the most water in the group, the production volume of products that use a lot of ground water decreased. As a result, the number in FY2021 was lower than FY2020. For future years, the processed food business plans to increase the production and as such, the water withdrawal also will be increased. Recognizing this, we will be striving for improving water intensity.

Groundwater – non-renewable	Not relevant			JT Group does not withdraw any water from this source. This is not predicted to change in the near future.
Produced/Entrained water	Not relevant			JT Group does not withdraw any water from this source. This is not predicted to change in the near future.
Third party sources	Relevant	2,873	About the same	<p>We use this water for various purposes, for example, production/drinking/cleaning. In the processed food business that consumes the most water in the group, the production volume of products that use a lot of municipal water decreased. However, one of our overseas factories in China has been changed their water withdrawal source from groundwater to municipal water. Due to this change, the usage of municipal water volume has increased in the processed food business.</p> <p>On the other hand, some sites in our tobacco business are sourcing slightly less municipal water. As a result, the number in FY2021 was about the same as FY2020.</p> <p>For future years, processed food business plans to increase the production and as such, the water withdrawal also will be increased. Recognizing this, we will be striving for improving water intensity.</p>

W1.2i

(W1.2i) Provide total water discharge data by destination.

	Relevance	Volume (megaliters/year)	Comparison with previous	Please explain
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			reporting year	
Fresh surface water	Relevant	2,730	Lower	In processed food business that consumes the most water in the group, fresh surface water discharge decreased. Rainwater and water used are discharged to surface water only at some of our manufacturing sites, after confirming that the used water complies with relevant water quality standards. In the tobacco business, discharge to this destination has decreased, in line with production decrease at factories discharging water to fresh surface. Going forward, we will be striving for improving water intensity as an increase is expected due to the production growth in processed food business.
Brackish surface water/seawater	Relevant	6	Higher	This destination is relevant as one site discharges water to brackish surface water/ seawater. The volume of discharge is higher in 2021 (between a 5 and 20% change) than 2020 due to an increase in production volume at that site.
Groundwater	Relevant	12	About the same	This destination is relevant as three sites discharge water to groundwater. The volume is about the same (less than 5% difference year on year) in 2021 as 2020.
Third-party destinations	Relevant	2,833	About the same	JT Group tobacco, processed food and pharmaceutical business factories and offices are located in all over the world and we discharge water to this destination where municipal water treatment plants are available. In processed food business, that consumes the most water in the

				<p>group, the production volume of products that use a lot of water decreased as well as new equipment introduced and existing ones upgraded which improved the water efficiency of the entire group, resulting in a decrease in total discharge to third parties. In the tobacco business, 86% of water discharged goes to a third-party treatment plant which is the same as last year. Overall, the number in FY2021 discharge to third-party destination was about the same as FY2020.</p> <p>Going forward, we will be striving for improving water intensity as an increase is expected due to the production growth in processed food business.</p>
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W1.2j

(W1.2j) Within your direct operations, indicate the highest level(s) to which you treat your discharge.

	Relevance of treatment level to discharge	Volume (megaliters/year)	Comparison of treated volume with previous reporting year	% of your sites/facilities/operations this volume applies to	Please explain
Tertiary treatment	Relevant	12	Higher	Less than 1%	One JTG site in Brazil has a wastewater treatment plant that includes a Biological Aerated reactor, Secondary Sedimentation and chlorination.

					<p>Wastewater discharge has increased (between 5% and 20% increase) in FY2021. The site complies with local regulatory standards and minimum wastewater parameters set by JTG, whichever are more stringent. On-site treatment systems are installed when requested by local regulation or adequate treatment is not ensured by communal wastewater treatment systems according to JTG's voluntary set parameters.</p>
Secondary treatment	Relevant	4,336	About the same	11-20	<p>Several JTG sites have wastewater treatment plants using secondary treatment including aerobic</p>

					<p>treatment of wastewater. Discharges are about the same (less than 5% change) in 2021 compared to 2020. The site complies with local regulatory standards and minimum wastewater parameters set by JTG, whichever are more stringent. On-site treatment systems are installed when requested by local regulation or adequate treatment is not ensured by communal wastewater treatment systems according to JTG's voluntary set parameters.</p>
Primary treatment only	Relevant	208	About the same	1-10	<p>Several JTG sites have septic tanks which treat wastewater to a primary</p>

					level before discharging thid to third-parties for further treatment. Discharges are about the same (less than 5% change) in 2021 compared to 2020. The site complies with local regulatory standards and minimum wastewater parameters set by JTG, whichever are more stringent. On-site treatment systems are installed when requested by local regulation or adequate treatment is not ensured by communal wastewater treatment systems according to JTG's voluntary set parameters.
Discharge to the	Relevant	267	About the same	1-10	Some JTG sites

natural environment without treatment					discharge wastewater untreated to the natural environment. For example, a JTG site in Germany discharges a small amount of cooling water back into the ground via an on-site lagoon. Discharges are about the same (less than 5% change) compared to 2020. The discharge complies with German regulatory requirements and is below the criteria set by JTG for Water waste parameters.
Discharge to a third party without treatment	Relevant	758	About the same	71-80	84% of JTI sites discharge wastewater to a third-party without treatment including all office and R&D sites. This is then treated by the

					third-party. Discharges are about the same (less than 5% change) in 2021 compared to 2020. These sites are in areas where the communal wastewater treatment systems are adequate to meet JTG's voluntary wastewater treatment requirements.
Other	Not relevant				JTG does not discharge water using 'other' treatment. All levels of treatment are disclosed in the above rows.

W1.3

(W1.3) Provide a figure for your organization's total water withdrawal efficiency.

	Revenue	Total water withdrawal volume (megaliters)	Total water withdrawal efficiency	Anticipated forward trend
Row 1	2,325	9,856	0.2358969156	Decreasing

W-FB1.3

(W-FB1.3) Do you collect/calculate water intensity for each commodity reported in question W-FB1.1a?

Agricultural commodities	Water intensity information for this produced commodity is collected/calculated	Water intensity information for this sourced commodity is collected/calculated	Please explain
Tobacco	Not applicable	Yes	<p>JT Group owns a small amount of land which is used for tobacco production. However, the volume of tobacco grown on own land is not material (about 0.1%) in comparison to tobacco sourced from third parties. Tobacco is a key ingredient in our products. Tobacco is predominantly rainfed, with some irrigation required in regions in which we operate. We have collected data on water requirements for tobacco leaf production in countries where we directly contract growers, and data of water use in leaf processing and cigarette manufacturing of our tobacco business to calculate abstracted water intensity.</p>

W-FB1.3b

(W-FB1.3b) Provide water intensity information for each of the agricultural commodities identified in W-FB1.3 that you source.

Agricultural commodities

Tobacco

Water intensity value (m3)

194

Numerator: Water aspect

Freshwater withdrawals

Denominator

Other, please specify
millions of cigarettes

Comparison with previous reporting year

About the same

Please explain

Water intensity has remained about the same (less than a 5% change year on year) as production increases have been offset by water reduction initiatives. We use cigarettes as the denominator for the water intensity calculation as they are our main finished goods product. For the calculation of tobacco water intensity, we used abstracted water only, disregarding rainwater due to lack of accurate and reliable data. We use water intensity data internally as basis for analysis and as a direction towards opportunities for more efficient water use and management practices across the value chain. We anticipate reduction in water intensity as we implement water efficiency programs. We have a strategy in place to reduce water intensity; The JT Group Environment Plan 2030 has a target to reduce water withdrawal associated with our tobacco business by 15% from 2015 to 2030.

We have an Annual and Strategic Planning (ASP) process which is carried out annually and measures progress against annual targets for the next three years.

Sites are required to set specific actions showing how they can contribute to achieving our longer-term targets relating to water efficiency at the site, business and company level.

W1.4

(W1.4) Do you engage with your value chain on water-related issues?

Yes, our suppliers

W1.4a

(W1.4a) What proportion of suppliers do you request to report on their water use, risks and/or management information and what proportion of your procurement spend does this represent?

Row 1

% of suppliers by number

76-100

% of total procurement spend

51-75

Rationale for this coverage

Within JT Group, leaf and Non-Tobacco Material suppliers, equipment manufacturers and logistics suppliers of our tobacco business have been engaged via CDP Supply Chain. These materials are, for example, tobacco leaf, paper and cardboard and cellulose based acetate tow. In order to have a representative number of suppliers, we selected these using a Pareto analysis to get close to 80% coverage based on procurement spend in these categories of materials suppliers. To encourage suppliers to respond we explain the importance of water and what we as a business are currently doing in relation to water management. We further encourage suppliers to respond by

asking them to identify potential opportunities for collaboration with suppliers. Direct engagement with our tobacco growers is via our company-specific grower programs, our Agricultural Labour Practices (ALP), and our Minimum Agronomic Standards (MAS).

Impact of the engagement and measures of success

In 2021, our tobacco business requested suppliers to respond to CDP Supply Chain questionnaire. The responses and data gathered, such as governance, performance, risks and opportunities. The information is used on an annual basis to better understand risks and opportunities in our supply chain. Also, our aim is to raise awareness of water and its importance among our suppliers, thus the number of responders is used as a metric of success for the program.

The information provided is also used to develop our Group-wide water risk management approach in the tobacco business manufacturing supply chain. We have a commitment in the JTG Environment Plan 2030 that by 2022 we will have implemented a water risk management process in our manufacturing supply chain. We completed the pilot phase of this work in 2020. We prioritized the list of strategically important non-tobacco materials suppliers based on water intensity of the products supplied and whether the suppliers fell into a 'polluting industry'. We then assessed the risks associated with the suppliers based on published information, such as CDP responses, websites etc using an internally developed framework. This has provided us a list of suppliers with whom we may engage with to further our understanding of water risk within our supply chain, sharing good practices where they exist and overall improving performance and reducing risk to JTG. Our measure of success is if we achieve the target in the Environment Plan 2030. Our Agronomy Technicians monitor and report back on implementation of our grower programmes and their benefits.

Comment

In our tobacco business, prior to entering a commercial relationship, our key suppliers undergo a screening process. This process allows us to understand potential risks related to environment, compliance, human rights, and health and safety. In the last three years, we have screened 64% of the key suppliers in our tobacco business and we have a target in our Tobacco Business Sustainability Strategy to reach 100% of key suppliers by 2023.

W1.4b

(W1.4b) Provide details of any other water-related supplier engagement activity.

Type of engagement

Innovation & collaboration

Details of engagement

Provide training and support on sustainable agriculture practices to improve water stewardship

% of suppliers by number

76-100

% of total procurement spend

1-25

Rationale for the coverage of your engagement

Our engagement is predominantly with tobacco growers from our vertically integrated origins (growers with which we directly contract). These growers are our most important partners to the business, given that tobacco is the primary raw material for our products. Within JT Group, our tobacco business has greater opportunity to work more closely with growers in its vertically integrated origins and to directly engage with them.

Impact of the engagement and measures of success

We deploy programs aligned with Principles of Sustainable Agriculture. Through providing extensive training and promoting Good Agriculture Practices (GAP), our Minimum Agronomic Standards (MAS), soil and water management practices to our growers, they are able to improve yield and quality, and achieve beneficial outcomes such as reduced water usage and water security. To measure success, we record number of GAP/MAS trainings, participants and conduct follow up surveys. We have MAS observation and monitoring system, and ultimately measure success by growers' improvement in yield, quality and integrity of tobacco.

JTI also engages with its suppliers of tobacco leaf through the Sustainable Tobacco Program (STP). JTI is one of six tobacco companies who have worked together to refresh and revise the STP an industry-wide platform enabling businesses to collaborate on human rights, environmental issues, and other sustainability challenges, and to drive sustainable agriculture through a continuous improvement process. Water is one of the 8 focus areas of the STP which aims to have beneficial outcomes including enhance supplier water-use and efficiency and conservation. Through Sustainable Tobacco Program we encourage our leaf suppliers to set water related targets. The measure of success of this engagement is the improvement of supplier scores after each self-assessment.

Comment

The Target Crop Calendar that forms part of MAS stipulates that tobacco seedlings are planted at a preferential period in the crop year so that the maximum plant water requirement is most likely to correspond with consistent and adequate rainfall, reducing the need for extraction of local water supply for irrigation.

W2. Business impacts

W2.1

(W2.1) Has your organization experienced any detrimental water-related impacts?

No

W2.2

(W2.2) In the reporting year, was your organization subject to any fines, enforcement orders, and/or other penalties for water-related regulatory violations?

No

W3. Procedures

W-FB3.1

(W-FB3.1) How does your organization identify and classify potential water pollutants associated with its food, beverage, and tobacco sector activities that could have a detrimental impact on water ecosystems or human health?

JT Group identifies water pollutants stemming from our own business operations as well as upstream agricultural processes. Local and national legislation relating to quality parameters for water (e.g. Water Pollution control law, Offensive odor control law) is a primary input for the identification of potential water pollutants. We have multiple other inputs that feed information into creating our own internal standards that identify potential pollutants, rather than using an established standard. Our internal standard on water pollutants sets expectations and concentration thresholds for a set of water parameters (e.g., BOD, ammonia, hydrocarbons etc.,) which sites have to meet when discharging to the natural environment. Our communication with various stakeholders e.g. internal and external experts, growers, international research institutes and NGOs, gives us insight into risks and opportunities around water use and discharge and helps us to identify potential water pollutants that could have impact on water ecosystems and human health. From abovementioned process of identifying water pollutants, major pollutants identified and relevant to our business value chain include but are not limited to: heavy metals, bacteria and hydrocarbons. When the contamination level is exceeded, these substances are classified as pollutants that disturb wastewater treatment system (incl. biological treatment process), which in turn cause damage such as eutrophication (water ecosystem) and bacterial contamination (human health). Impacts vary across our value chain, but our main concern is in the upstream supply chain in relation to the use of fertilizer, Crop Protection Agents (CPAs) and other products in agricultural processes. If not applied properly in terms of amount and timing, those can possibly enter watercourses, causing impacts mentioned earlier. We consider this as a risk and thus we have required growers to follow good agricultural practices. At our own production sites, the water pollutants are mainly edible fat and oil contained in the water discharge from our food processing factories. These are the substances stemming from food manufacturing such as grilling and frying processes and we control the quality of wastewater to comply with regulations to manage the impacts.

W-FB3.1a

(W-FB3.1a) Describe how your organization minimizes the adverse impacts of potential water pollutants on water ecosystems or human health associated with your food, beverage, and tobacco sector activities.

Potential water pollutant

Fertilizers

Activity/value chain stage

Agriculture – supply chain

Description of water pollutant and potential impacts

The misuse and improper handling and management of fertilizers can contribute to increased risks of soil and water contamination e.g. fertilizers if overused can eventually run-off from agricultural landscapes to adjacent water sources and courses (rivers, streams, springs) and contaminate groundwater sources; this is detrimental to achieving sustainable agriculture, not only due to the potential negative environmental impacts, but also in relation to human health and economic losses (i.e. with the purchase and use of unnecessary crop inputs).

Management procedures

Soil conservation practices
Crop management practices
Fertilizer management
Waste water management

Please explain

JT Group works with growers to deploy appropriate programs, such as good agricultural practices, initiatives on soil management and water conservation. All of our leaf suppliers are expected to follow Good Agricultural Practices (GAP), an external international standard to support our commitment to sustainable tobacco farming, through a cycle of continuous improvement. In addition, the majority of our directly contracted growers are required to act in accordance with our Minimum Agronomic Standards (MAS).

We have direct relationships with tens of thousands of growers and actively engage with them in relation to fertilizer management. This includes optimizing the quantity and rate of fertilizers applied and the timing of this, which is specific to each production system. This reduces the potential for fertilizers to run-off into watercourses. Soil conservation and crop management practices including crop rotation, cover crops, and minimum tillage are included in MAS. These practices improve water retention which thus reduces additional water requirements for tobacco production. We also provide trainings for our direct contracted growers and provide customized fertilizer application recommendations. We currently employ 547 Agronomy Technicians in our tobacco business, each providing extension services to an average 106 directly contracted growers. They visit every contracted grower approximately seven times during the course of the cropping cycle to ensure the growers understand how to implement best practices.

In terms of measuring success, Agronomy Technicians, through MAS observations record their observations which are then analyzed in order to select the right improvement measures. We track the effectiveness of our response using KPIs, internal

evaluation, assessments, and on-site investigations. MAS allows us to gather information in relation to water such as mulching to decrease water evaporation, reservoirs for seedling production, the use of box ridges to capture rainwater within the field and reduce runoff and erosion. Also, we encourage growers to use seasonal crop rotation, which improves soil conservation.

Potential water pollutant

Pesticides and other agrochemical products

Activity/value chain stage

Agriculture – supply chain

Description of water pollutant and potential impacts

Pesticides and other agrochemicals are used to assist the growth of our agricultural commodities including tobacco. The misuse and improper handling and management of Crop Protection Agents (CPAs), which include pesticides and agrochemicals, can contribute to increased risks of soil and water contamination as these have the potential to run-off from agricultural landscapes to adjacent water sources and courses (rivers, streams, springs) and contaminate groundwater sources, leading to negative impacts on ecosystems and biodiversity. This is detrimental to achieving sustainable agriculture, not only due to the potential negative environmental impacts but also in relation to human health and economic losses (i.e. with the purchase and use of unnecessary crop inputs).

Management procedures

Soil conservation practices
Crop management practices
Pesticide management
Waste water management

Please explain

JT Group directly contracts small-scale growers worldwide and has a well-defined and established framework of principles to enable tobacco growing, under the stewardship of JTG, to be conducted in a socially responsible, commercially viable and environmentally sustainable manner, and is in compliance with local and/or regional regulatory requirements.

JT Group works with growers to deploy appropriate programs, such as good agricultural practices, initiatives on soil management and water conservation. All of our leaf suppliers are expected to follow Good Agricultural Practices (GAP), an external international standard to support our commitment to sustainable tobacco farming, through a cycle of continuous improvement. The majority of our directly contracted growers are required to act in accordance with our Minimum Agronomic Standards (MAS). Also, we have a Good Agricultural Practices Protocol, that promotes the maintenance of soil structure and fertility, as well as cultivation practices that optimize water usage, and limit the detrimental impact on ground and surface water quality, protecting aquatic plant, animal and human life.

Regarding pesticide and other agrochemical product management, only registered and

lower hazard Crop Protection Agents (CPAs) are permitted and recommended for use with specific modalities and dosages in tobacco production. This minimises the risk of CPAs runoff to groundwater and other unintended ecosystems. Crop management practices include selecting pest and disease resistant varieties of tobacco which reduces the need for pesticides, thus minimises the risk of runoff.

We provide trainings and capacity building of leaf extension, contracted growers and their workers in correct CPA use and management, in respect of people and the environment (i.e. CPA products, hazard levels, rates, storage, handling, application, safe disposal). We currently employ 547 Agronomy Technicians in our tobacco business, each providing extension services to an average 106 directly contracted growers. They visit every contracted grower about seven times during the course of the cropping cycle to ensure the growers understand how to implement best practices. To measure success, our leaf technicians undertake comprehensive leaf CPA residue testing programs to ensure that growers are following the management procedures. They record their observations which are analyzed to select the right improvement measures.

W3.3

(W3.3) Does your organization undertake a water-related risk assessment?

Yes, water-related risks are assessed

W3.3a

(W3.3a) Select the options that best describe your procedures for identifying and assessing water-related risks.

Value chain stage

Direct operations

Coverage

Full

Risk assessment procedure

Water risks are assessed as a standalone issue

Frequency of assessment

Annually

How far into the future are risks considered?

More than 6 years

Type of tools and methods used

Tools on the market

Databases

Other

Tools and methods used

- WRI Aqueduct
- WWF Water Risk Filter
- FAO/AQUASTAT
- Regional government databases
- Internal company methods
- External consultants

Contextual issues considered

- Water availability at a basin/catchment level
- Water quality at a basin/catchment level
- Stakeholder conflicts concerning water resources at a basin/catchment level
- Implications of water on your key commodities/raw materials
- Water regulatory frameworks
- Status of ecosystems and habitats
- Access to fully-functioning, safely managed WASH services for all employees

Stakeholders considered

- Customers
- Employees
- Investors
- Local communities
- NGOs
- Regulators
- Suppliers
- Water utilities at a local level
- Other water users at the basin/catchment level

Comment

JT Group's risk assessment methodology has been developed by incorporating relevant information which could influence our approach to future water management and water stewardship. The information includes that gained from the WRI Aqueduct and WWF-DEG and other tools (such as GEMI Local Water Tool etc.), as well as site information. We integrate these data with other publicly available information with help from subject matter experts to implement our overall risk assessment approach.

Value chain stage

Supply chain

Coverage

Full

Risk assessment procedure

Water risks are assessed as a standalone issue

Frequency of assessment

Annually

How far into the future are risks considered?

More than 6 years

Type of tools and methods used

Tools on the market
Databases
Other

Tools and methods used

WRI Aqueduct
Internal company methods
External consultants

Contextual issues considered

Water availability at a basin/catchment level
Water quality at a basin/catchment level
Stakeholder conflicts concerning water resources at a basin/catchment level
Implications of water on your key commodities/raw materials
Water regulatory frameworks
Status of ecosystems and habitats
Access to fully-functioning, safely managed WASH services for all employees

Stakeholders considered

Customers
Employees
Investors
Local communities
NGOs
Regulators
Suppliers
Water utilities at a local level
Other water users at the basin/catchment level

Comment

Via CDP supply chain we ask our suppliers to tell us about topics such as governance, performance, risks and opportunities. This information is used on an annual basis to better understand risks and opportunities in our supply chain. Also, our aim is to raise awareness of water and its importance amongst our suppliers.

The information provided by suppliers, alongside information from databases such as WRI Aqueduct, is also being used to develop our Group-wide water risk management approach in the tobacco business manufacturing supply chain which is a target in our new JT Group Environment Plan 2030. We completed the pilot phase of this work in 2020. We prioritized the list of strategically important non-tobacco materials suppliers based on water intensity of the products supplied and whether the suppliers fell into a 'polluting industry'. We then assessed the risks associated with the suppliers based on published information, such as CDP responses, websites etc using an internally

developed framework. This has provided us a list of suppliers with whom we may engage with to further our understanding of water risk within our supply chain, sharing good practices where they exist and overall improving performance and reducing risk to JTG. Currently we are developing comprehensive approach to assess and manage ESG risks in our supply chain including water related issues.

W3.3b

(W3.3b) Describe your organization's process for identifying, assessing, and responding to water-related risks within your direct operations and other stages of your value chain.

The first three stages of the JT Group water risk assessment methodology involve data gathering from a number of sources. This includes using existing water risk tools (e.g. WWF-DEG water risk filter, WRI Aqueduct) for understanding the context in the region/area where the site is located, obtaining site-specific information through a questionnaire for understanding context on the site, and undertaking desk-based research with external databases (e.g. FAO/AQUASTAT, Regional government databases). The water risk tools were chosen based on subject matter expert advice and the fact that they are considered to be market-leading, best practice tools. Our questionnaire provides a practical overview of water availability, wastewater disposal and the factors that govern their use and control. The assessments consider: - physical/economic water scarcity, flooding, wastewater and future climate/ water trends - community and reputational aspects - regional/site information and historical evidence. The water risk assessment process also includes a water balance, to gain understanding of where water is used throughout the asset until its discharge from site. We have implemented our water risk assessment process which includes those contextual issues with the intention of identifying possible climate-related water risks and then implementing actions to address these issues. In terms of stakeholders, we consider customers and investors as it could represent business risk if we do not meet their expectations; employees, as ensuring their access to fully-functioning, safely managed WASH services is essential; NGOs, as their insights are necessary to identify potential water pollutants that could have impact on water ecosystems and human health; regulators, as we work with them to keep abreast of new regulations and regulatory changes with which we need to comply; water utilities at a local level, as we use water in our operations which they manage; local communities and other water users at the basin/catchment level, as we share the same water resources and it is our responsibility to maintain the water quality. Once these data are compiled, a report is written highlighting issues of concern and risks requiring additional countermeasures/further investigation. The location then establishes an action plan, considering: whether the concern identified represent a risk to the asset and/or its operations; what is that risk; whether further investigation or assessment of the risk is required; whether existing countermeasures for the risk are appropriate and adequate; and/or what additional countermeasures are required. Typically, our water risk assessment process for a site spans a number of months. Following completion of the initial assessments we will carry out a reassessment of the risk at a frequency determined by, for example, the risk level previously identified, significant operational changes, legislative changes, etc.

In line with our Environment Plan 2030, we are in the process of developing a water risk management process in our manufacturing supply chain to better understand water risk and

use in our supply chain. We completed the pilot phase of this work in 2020. We prioritized the list of strategically important non-tobacco materials suppliers based on water intensity of the products supplied and whether the suppliers fell into a 'polluting industry'. We then assessed the risks associated with the suppliers based on published information, such as CDP Supply Chain responses, websites etc using an internally developed framework as well as databases such as WRI Aqueduct. This has provided us a list of suppliers with whom we may engage with to further our understanding of water risk within our supply chain, sharing good practices where they exist and overall improving performance and reducing risk to JTG. Currently we are developing comprehensive approach to assess and manage ESG risks in our supply chain including water related issues.

W4. Risks and opportunities

W4.1

(W4.1) Have you identified any inherent water-related risks with the potential to have a substantive financial or strategic impact on your business?

No

W4.1a

(W4.1a) How does your organization define substantive financial or strategic impact on your business?

Internally the definition for substantive impact focuses on 3 key areas, any of which would result in the risk or opportunity being considered as important to JT Group's business:

- Financially: a materiality threshold of anything with the potential to impact profitability by 1 billion Yen
- Attention in the mainstream media: news articles in the mainstream or national media, whether positive or negative
- Attention from shareholders: issues raised by shareholders who have a 1% or larger stake in the business, whether positive or negative.

This applies to the assessment of risk in our direct operations and in our value chain. Examples of substantive impacts/risks considered include access to sufficient quantities of good quality freshwater and recycled water. Further impacts could include costs of additional technical control measures, business interruption, brand perception or reputational damage etc. In one of our Middle Eastern factories we considered the availability of fresh water and plan to implement suitable counter-measures. However, the overall impact of this risk was substantially below our 1bn yen threshold. The above definition of substantive impact was developed in 2017 to be in line with other enterprise-wide risk definitions. When applied to our risk assessment process we have not identified any inherent water-related risks with the potential to have substantive strategic or financial impact.

W4.2b

(W4.2b) Why does your organization not consider itself exposed to water risks in its direct operations with the potential to have a substantive financial or strategic impact?

	Primary reason	Please explain
Row 1	Risks exist, but no substantive impact anticipated	<p>We recognise that freshwater is vital for our direct operations. Therefore, through JT Group’s bespoke water risk assessment process, we have identified potential concerns in relation to certain sites (e.g.in relation to continuing borehole yield), but none have been confirmed as representing a substantive financial or strategic impact.</p> <p>As an example, in one of our Middle Eastern factories we considered the current and future availability of freshwater and plan to implement suitable countermeasures to mitigate risks. However, the overall impact of the risk was substantially below our 1bn yen threshold and therefore was not deemed to be substantive.</p> <p>Looking at a global scale, our business is geographically diverse, as such water risks at one particular site are unlikely to substantively impact the business as a whole either financially or strategically.</p> <p>We piloted our water risk assessment methodology during the period 2014-2016 and commenced roll out of the program in 2017. In 2020 we completed WRA of our manufacturing facilities. Our water risk assessments are part of an ongoing process. Following completion of the initial water risk assessments we will carry out a reassessment of the risk at a frequency determined by, for example, the risk level previously identified, significant operational changes, legislative changes, etc.</p>

W4.2c

(W4.2c) Why does your organization not consider itself exposed to water risks in its value chain (beyond direct operations) with the potential to have a substantive financial or strategic impact?

	Primary reason	Please explain
Row 1	Risks exist, but no substantive impact anticipated	<p>Through JT Group’s in-house risk analysis of supplier responses through CDP Supply Chain, to date we have not identified water-related risks in our supply chain that represent a potential substantive financial or strategic impact. As we deem water as important to our indirect operations, our in-house risk analysis takes into consideration the water-related risks identified and highlighted by our key suppliers through their CDP Supply Chain responses and other published information. To better understand the severity of the water-related risks for each supplier, and their potential to impact on our own business success, we weight suppliers individually in our risk analysis based on the type of products and services they provide to our tobacco business, whether the supplier fell into a ‘polluting industry’, the level of spend with each supplier, and the actions they are taking to mitigate water-related risks in their own organisations. This process allows us to rank our key suppliers in terms of the level of risk they therefore pose to our tobacco business. This has provided us a list of suppliers with whom we want to further engage on understanding water risk, sharing good</p>

		<p>practices where they exist and overall improving performance and reducing risk to JTG.</p> <p>Currently, we have not identified any suppliers with water-related risk that meet or surpass our threshold of 'substantive impact'. This is defined in three ways; Financially: a materiality threshold of anything with the potential to impact profitability by 1 billion Yen • Attention in the mainstream media: news articles in the mainstream or national media, whether positive or negative • Attention from shareholders: issues raised by shareholders who have a 1% or larger stake in the business, whether positive or negative.</p>
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W4.3

(W4.3) Have you identified any water-related opportunities with the potential to have a substantive financial or strategic impact on your business?

Yes, we have identified opportunities, and some/all are being realized

W4.3a

(W4.3a) Provide details of opportunities currently being realized that could have a substantive financial or strategic impact on your business.

Type of opportunity

Markets

Primary water-related opportunity

Increased brand value

Company-specific description & strategy to realize opportunity

"Description of processed food business"

Business segments: Frozen and ambient food (incl. staple food), seasonings and bakery

Revenue: 149 billion yen

Substantive impacts compared to the ones for Tobacco business (1 billion yen for Tobacco is equivalent to 80 million yen for processed food business in 2020)

Water use in the business: Approximately 70% of the total group water withdrawal comes from processed food business and why (see below)

"What is water for processed food business"

Key ingredients for the products

Key resources for the production as well as the sourced raw materials (mainly agricultural)

"What they do in relation to water opportunities"

We believe that further strengthening water reduction efforts will help fulfil our responsibilities as a water-reliant company and ultimately lead to an opportunity to increase the value of our corporate and product brands. The water is a valuable resource for processed food business. Although we have confirmed through water risk

assessment that stable water can be procured for a long period of time, conservation of forests that recharge water is an important issue for processed foods and societies that rely on good water resources. For this reason, the JT group has been conducting afforestation and forest conservation activities (JT Forest) since 2005 in Japan, where most of processed food's site are located. In 2021 We have concluded the agreement with 9 forests in Japan which covered 1,580ha. We are contributing to climate change issues and water resource conservation in the watershed through proper forest management. Specifically, in addition to financial contributions, employees are taking part in volunteer activities held at JT Forest and providing products manufactured by processed food. In addition, we are strategically developing products to promote environmental activities, such as selling products that show that part of the package sales is used for tree planting and forest conservation activities.

Estimated timeframe for realization

1 to 3 years

Magnitude of potential financial impact

Medium

Are you able to provide a potential financial impact figure?

Yes, a single figure estimate

Potential financial impact figure (currency)

3,500,000,000

Potential financial impact figure – minimum (currency)

Potential financial impact figure – maximum (currency)

Explanation of financial impact

The survey results from the Consumer Affairs Agency shows that consumers who choose eco-friendly products and services increased by about 2% in one year, and the change in environmental awareness of consumers is reflected in the market reliably and significantly. We believe that the ratio is increasing year by year. Here, we calculated the effect of increasing our market share by 1% (from 11% to 12%) against 2% (29.6 billion yen) of the total sales (about 1,480 billion yen) of Japanese frozen food companies.

W6. Governance

W6.1

(W6.1) Does your organization have a water policy?

Yes, we have a documented water policy that is publicly available

W6.1a

(W6.1a) Select the options that best describe the scope and content of your water policy.

	Scope	Content	Please explain
Row 1	Company-wide	<p>Description of business dependency on water</p> <p>Description of business impact on water</p> <p>Description of water-related performance standards for direct operations</p> <p>Description of water-related standards for procurement</p> <p>Reference to international standards and widely-recognized water initiatives</p> <p>Company water targets and goals</p> <p>Commitment to align with public policy initiatives, such as the SDGs</p> <p>Commitments beyond regulatory compliance</p> <p>Commitment to water-related innovation</p> <p>Commitment to stakeholder awareness and education</p> <p>Commitment to water stewardship and/or collective action</p> <p>Acknowledgement of the human right to water and sanitation</p> <p>Recognition of environmental linkages, for example, due to climate change</p>	<p>JT Group considers water and water related issues as critical to our business as a fundamental resource for direct operations and suppliers. Water and climate related issues could have a substantive impact on our business and value chain. Our company-wide “JT Group Environment Policy” specifically addresses water aspects. It is publicly available on JT’s website and shared by all our businesses company-wide. Our JT Group Environment Plan 2030 includes a target to reduce water use associated with our tobacco operations by 15% by 2030.</p> <p>To achieve the target, we set annually quantitative water targets on direct operations. The policy also includes education and encouragement of our employees and suppliers to reduce environmental impacts and optimize the use of natural resources including water. In addition, our Human Rights Policy also recognizes the human right to water and sanitation and JT Group supports the UN SDGs. We align our management systems with international standards ISO14001 and ISO50001.</p>

W6.2

(W6.2) Is there board level oversight of water-related issues within your organization?

Yes

W6.2a

(W6.2a) Identify the position(s) (do not include any names) of the individual(s) on the board with responsibility for water-related issues.

Position of individual	Please explain
Director on board	JT Group considers water-related issues to be strategically important for our business. As such, high level board oversight is critical. The person directly responsible for water-related issues is the Chief Sustainability Officer (CSO) of JT. This position reports directly to Representative Director and Executive Vice President of JT on corporate, sustainability management, pharmaceutical and processed food business. The Representative of Director and Executive Vice President is Member of the Board also serving as Executive Officer. They are directly responsible for developing and implementing strategies and plans for Sustainability Management, including water related issues. In 2019 the board members made the decision to approve our new Environment Plan 2030, which includes a target to reduce water use associated with our tobacco operations by 15% by 2030 and Implementation of a water risk management process in our manufacturing supply chain by 2022, as the long-term plan for JTG.

W6.2b

(W6.2b) Provide further details on the board's oversight of water-related issues.

	Frequency that water-related issues are a scheduled agenda item	Governance mechanisms into which water-related issues are integrated	Please explain
Row 1	Scheduled - some meetings	Monitoring implementation and performance Providing employee incentives Reviewing and guiding annual budgets Reviewing and guiding business plans	JT Group considers water-related issues to be strategically important for our business. As such, high level board oversight is critical so water-related issues are discussed in Board level meetings 4 times a year as part of environmental planning. Our governance mechanism contributes to the Board's oversight of water problems including following measures; 1) Review of Annual and Strategic Planning (ASP) 2) Approving the annual operation plan, which includes the yearly environmental plan. 3) Review of previous year performance as part of

	Reviewing and guiding major plans of action Reviewing and guiding risk management policies Reviewing and guiding strategy Reviewing and guiding corporate responsibility strategy Setting performance objectives	the Board meeting in May 4) Review of Sustainability Strategy The governance mechanisms are implemented within the four processes above, which contribute to the oversight of water-related issues.
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W6.2d

(W6.2d) Does your organization have at least one board member with competence on water-related issues?

	Board member(s) have competence on water-related issues	Criteria used to assess competence of board member(s) on water-related issues
Row 1	Yes	Our board has members with expertise in the area of sustainability, environment and society including water-related issues, and we have disclosed board member's skills matrix. This matrix is based on board members' past experience and the knowledge they have developed through this experience.

W6.3

(W6.3) Provide the highest management-level position(s) or committee(s) with responsibility for water-related issues (do not include the names of individuals).

Name of the position(s) and/or committee(s)

Chief Sustainability Officer (CSO)

Responsibility

Assessing future trends in water demand
 Assessing water-related risks and opportunities
 Managing water-related risks and opportunities

Frequency of reporting to the board on water-related issues

Quarterly

Please explain

1) CSO is in charge of JTG Sustainability Management. This position reports directly to Representative Director and Executive Vice President who is directly responsible for developing and implementing strategies and plans, including water-related issues.

2) CSO is responsible for water-related issue management and more broadly, sustainability management. The Sustainability function monitors and assesses water-related issues, coordinates activities, gathers data and provides information to the JTG's Board of Directors. For example, water withdrawal KPIs are reported to the Board of Directors as part of assessing progress and future trends towards JTG's group 2030 Environment Plan. Water-related management and performance are reported to the Board 4 times a year so that the Board can understand the progress and future trends to the target and provide oversight.

W6.4

(W6.4) Do you provide incentives to C-suite employees or board members for the management of water-related issues?

	Provide incentives for management of water-related issues	Comment
Row 1	Yes	

W6.4a

(W6.4a) What incentives are provided to C-suite employees or board members for the management of water-related issues (do not include the names of individuals)?

	Role(s) entitled to incentive	Performance indicator	Please explain
Monetary reward	Chief Sustainability Officer (CSO)	Reduction of water withdrawals	Our CSO is individually evaluated on achievement of their performance targets through execution of their duties that will lead to our sustainable profit growth. Performance targets are set through interviews with the Group CEO at the beginning of the fiscal year and evaluated at the end of the year. These targets include climate-related issues such as GHG emission reduction and water withdrawal reduction. The base salary for the following fiscal year is set within a certain range reflecting the individual performance evaluations. Therefore, the base salary of the CSO reflects ESG factors.
Non-monetary reward	No one is entitled to these incentives		Currently, there is not a formal non-monetary incentive provided for C-suite members.

W6.5


(W6.5) Do you engage in activities that could either directly or indirectly influence public policy on water through any of the following?

No

W6.6

(W6.6) Did your organization include information about its response to water-related risks in its most recent mainstream financial report?

Yes (you may attach the report - this is optional)

 integrated2021_E_all.pdf

W7. Business strategy

W7.1

(W7.1) Are water-related issues integrated into any aspects of your long-term strategic business plan, and if so how?

	Are water-related issues integrated?	Long-term time horizon (years)	Please explain
Long-term business objectives	Yes, water-related issues are integrated	11-15	<p>JT Sustainability Management – Environment team monitors changes in the external and internal environment in terms of water and associated changes, identifies risk/opportunity drivers which could impact on our businesses.</p> <p>Our Group environment plans contain commitments relating to improved water efficiency and the identification and mitigation of water-related risks. The JT Group Environment Plan 2030 introduced in 2019 has a target to reduce water withdrawal associated with our tobacco business by 15% from 2015 base year. To better understand water risk and use in our supply chain, by 2022 we will implement a water risk management process in our manufacturing supply chain. This allows to effectively make long term decisions whilst maintaining tangible objectives and targets.</p> <p>Our Annual and Strategic Planning (ASP) process carried out annually and measures progress against annual targets for the next three years.</p> <p>Sites are required to set specific actions showing how</p>

			<p>they can contribute to achieving our longer-term targets relating to water efficiency and water risk assessments, at the site, business and company level. As such, our environment plans form an integral a part of our overall business plan.</p> <p>In the tobacco business, we are undertaking country-level climate-scenario analysis (CSA) which includes assessing water-related issues such as drought and flood risk. By now we conducted CSA in 8 countries and developing action plan as a part of our ERM process.</p>
Strategy for achieving long-term objectives	Yes, water-related issues are integrated	11-15	<p>In addition to opportunities such as improving water efficiency by saving water, increasing market opportunities such as refining brand value and increasing ESG investment by conserving water resources, physical risks due to droughts and floods, water pollution, legal regulations and public Water-related issues, such as risks associated with reputational impacts of policy changes, are integrated into strategies for achieving long-term objectives. To address the above-mentioned water-related issues, we have established the JT Group Environment Plan 2030 in 2019 with a view to supporting water risk assessment (WRA), promote WRA in the supply chain toward achieving it, and take appropriate measures against detected risks. By integrating water-related issues into strategies for achieving long-term objectives the JT Board will also have a process for reviewing the integrated plan to ensure it is consistent with the long-term environmental strategy of the business, requesting changes (if necessary) and approving the plan. This enables you to make effective long-term decisions while maintaining specific goals and objectives.</p>
Financial planning	Yes, water-related issues are integrated	11-15	<p>Water related plans and programs are incorporated into JT Group's Annual and Strategic Planning processes, which includes both capital and operational financial planning. Where capital expenditure is required in relation to water related projects (e.g. upgrading facilities to reduce water consumption, improving wastewater treatment), this is requested and authorised through our Business Approval Process (BAP). The BAP can be used for CAPEX planning with paybacks beyond 11 years, hence this is considered in the timeframe 11-15 years.</p>

W7.2

(W7.2) What is the trend in your organization’s water-related capital expenditure (CAPEX) and operating expenditure (OPEX) for the reporting year, and the anticipated trend for the next reporting year?

Row 1

Water-related CAPEX (+/- % change)

-59

Anticipated forward trend for CAPEX (+/- % change)

2

Water-related OPEX (+/- % change)

9

Anticipated forward trend for OPEX (+/- % change)

-3

Please explain

Water-related CAPEX decreased by over 50% compared to the previous year, mainly because the equipment renewal or introduction had already been done in 2020. Going forward, it is anticipated that CAPEX will increase, mainly due to the upgrade and renewal of equipment such as coolers to recycle water, wastewater treatment plants, rain water flood mitigation etc.

OPEX increased by around 10% compared to the previous year due to the diminution in production in the processed food business. Even though the production is planned to grow, it is expected that OPEX will slightly decrease going forward due to capital investment and recycling water through new equipment.

W7.3

(W7.3) Does your organization use scenario analysis to inform its business strategy?

	Use of scenario analysis	Comment
Row 1	Yes	In 2019, we conducted climate-related scenario analysis (CSA) for our tobacco business. The process was aligned with TCFD and involved our Directors on Board. Also, we used 2DS model to assess emissions reductions including the inputs of current and anticipated GHG emissions to develop our climate targets, which were included in our Environment Plan 2030. We also use CSA to identify which factories and regions could be at higher water supply risks in the future to inform sourcing decisions and business expansion, and develop our water reduction targets and actions. Also, we are undertaking country-level CSA including water-related issues

	<p>across all stages of the JTI value chain.</p> <p>By the end of 2021 we conducted CSA in 8 countries, which feed into water-related action plans as part of our ERM process. The results of the country specific CSA's are fed back to the sites in those countries so they can be used to inform their Annual Strategic Planning process for the next 3 years.</p>
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W7.3a

(W7.3a) Provide details of the scenario analysis, what water-related outcomes were identified, and how they have influenced your organization's business strategy.

	Type of scenario analysis used	Parameters, assumptions, analytical choices	Description of possible water-related outcomes	Influence on business strategy
Row 1	Climate-related	2DS RCP 2.6Nationally determined contributions (NDCs) Other, please specify Aqueduct RCP4.5, 8.5 future projection	Increased flooding at various production sites and in our leaf supply chain for example in Japan (where our group HQ is located). Acute Risk: We conducted scenario analysis using external data such as reports by Japan Meteorological Agency. As an example outcome, we realised that climate change may increase precipitation, typhoon intensity and occurrence of large tropical cyclones in Japan. These risks could impact on the volume and quality of tobacco leaf we procure, which could result in disruption of our production site operations.	<p>We conduct water risk related climate scenario analysis for own factories and key tobacco growing regions. This water risk analysis is used to identify which sites are likely to experience climate change-induced flooding and are at higher flooding risk in future. The data tool that we use to conduct this initial analysis is the WRI's Aqueduct Tool which is then supplemented with extensive site-level research by independent water security experts. We have implemented our water risk assessment process with the intention of both identifying possible climate-related water risks and then implementing actions to address these risks.</p> <p>Responses vary depending on the scale of the risk at each site, but include measures such as implementing an evacuation drill and business continuity plans.</p> <p>Through our risk analysis using WRI Aqueduct, we have also identified some of the tobacco</p>

				growing regions that are likely to experience climate-related water issues in the future. Although no significant water issues have been identified at this time, in order to support global water stewardship by reducing our water withdrawal and by encouraging water risk management in our supply chain, by 2022, we will implement a water risk management process in our manufacturing supply chain.
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W7.4

(W7.4) Does your company use an internal price on water?

Row 1

Does your company use an internal price on water?

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

Please explain

Water does not represent a significant expense to JT Group's business, nor have we identified water-related risks that represent a substantive financial impact to our business.

W7.5

(W7.5) Do you classify any of your current products and/or services as low water impact?

	Products and/or services classified as low water impact	Primary reason for not classifying any of your current products and/or services as low water impact	Please explain
Row 1	No, and we do not plan to address this within the next two years	Important but not an immediate business priority	Our tobacco and processed food manufacturing activities all use water. However, for our main operation, the tobacco business, the water that is required for tobacco crops comes predominantly from rainfall, while tobacco

			processing and manufacturing are not water-intensive. Therefore we haven't planned to have the low water impact products within the next two years.
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W8. Targets

W8.1

(W8.1) Describe your approach to setting and monitoring water-related targets and/or goals.

	Levels for targets and/or goals	Monitoring at corporate level	Approach to setting and monitoring targets and/or goals
Row 1	Company-wide targets and goals Business level specific targets and/or goals Site/facility specific targets and/or goals	Targets are monitored at the corporate level Goals are monitored at the corporate level	Water related targets, plans and programs are incorporated into the JT Group Annual and Strategic Planning (ASP) processes and in our long-term environment plans. Through our ASP process we set targets relating to water withdrawal at the site, business and company level. We have targets in our new JT Group Environment Plan 2030 in relation to water reduction and water risk assessments. We have set a target to reduce our tobacco business-associated water withdrawal by 15% by 2030 vs 2015. This target was calculated, taking into account site level water intensities and regional predictions for future water stress. We plan to achieve the target by using less water for factory irrigation, reducing water use in our processes, improving leak control, using more recycled water, and improving cleaning practices. Progress against targets and goals in ASP and the group environment plan is monitored at group and business level and reported to the board.

W8.1a

(W8.1a) Provide details of your water targets that are monitored at the corporate level, and the progress made.

Target reference number

Target 1

Category of target

Water withdrawals

Level

Business

Primary motivation

Reduced environmental impact

Description of target

We will reduce water withdrawal associated with our tobacco business by 15% by 2030

Quantitative metric

% reduction in total water withdrawals

Baseline year

2015

Start year

2018

Target year

2030

% of target achieved

100

Please explain

Target was calculated by analysing site level intensities against peer factories, taking into account predicted future water stress for the region in which each site is located.

Target reference number

Target 2

Category of target

Water pollution reduction

Level

Company-wide

Primary motivation

Reduced environmental impact

Description of target

To achieve water conservation, the JT Group's goal of reducing water pollution is to maintain 100% of the wastewater meeting Discharge Standards (one of the indicators of compliance with laws and regulations). Is listed.

Quantitative metric

% proportion of wastewater that is safely treated

Baseline year

2020

Start year

2020

Target year

2021

% of target achieved

100

Please explain

Maintaining 100% of the water discharge that meeting Discharge Standards is one of the compliance evaluation indicators of laws and regulations.

W8.1b

(W8.1b) Provide details of your water goal(s) that are monitored at the corporate level and the progress made.

Goal

Other, please specify

Understand water-related risks in supply chain

Level

Company-wide

Motivation

Risk mitigation

Description of goal

Environmental protection is a crucial part of our responsibility to society, and key to the sustainability of our business. In regard to water, our JT Group Environment Plan 2030 included a goal to better understand water risk and use in our supply chain, by 2022, we will implement a water risk management process in our manufacturing supply chain. This goal included: 1. developing a methodology to assess water risk in manufacturing supply chain; 2. undertaking water risk assessments. The reason why this goal was adopted was so that we can reduce water related risks within our supply chain and ensure business continuity. This goal is important to the company as it drives awareness towards water related risks in the business and also delivers on our publicly declared commitment to address water related issues to make sure our operations are sustainable. We think of it as an important step to maintain and improve water security in our supply chain.

Baseline year

2015

Start year

2019

End year

2022

Progress

We completed the pilot phase of this work in 2020. We prioritized the list of strategically important non-tobacco materials suppliers based on water intensity of the products supplied and whether the suppliers fell into a 'polluting industry'. We then assessed the risks associated with the suppliers based on published information, such as CDP responses, websites etc using an internally developed framework. This has provided us a list of suppliers with whom we may engage with to further our understanding of water risk within our supply chain, sharing good practices where they exist and overall improving performance and reducing risk to JTG. Currently we are developing comprehensive approach to assess and manage ESG risks in our supply chain including water related issues.

Goal

Other, please specify

Screen all key suppliers against ESG criteria, including Water Quality and Water Stress.

Level

Business

Motivation

Risk mitigation

Description of goal

JTG aim to achieve the highest standards of integrity across our business operations and supply chain and also aim to mitigation any potential water related risk. We can only achieve this through close cooperation with our suppliers. Therefore, JTG have developed a thorough new process to screen suppliers across multiple ESG criteria, including water quality and water stress indexes. Tobacco business is now implementing a new onboarding solution to structure and further improve the supplier screening process.

Baseline year

2020

Start year

2020

End year

2023

Progress

The indicator used to assess progress against the goal is the percentage of key suppliers screened against the water quality and water stress criteria. The threshold of success is 100% and in 2021 the success threshold was met as 100% of key suppliers were screened.

W9. Verification

W9.1

(W9.1) Do you verify any other water information reported in your CDP disclosure (not already covered by W5.1a)?

Yes

 Independent_Assurance_Statement_Environment.pdf

W9.1a

(W9.1a) Which data points within your CDP disclosure have been verified, and which standards were used?

Disclosure module	Data verified	Verification standard	Please explain
W1 Current state	Total Water Withdrawal Total Water Discharge	ISAE 3000	These data points were verified under ISAE3000 (Revised) by Bureau Veritas.

W10. Sign off

W-FI

(W-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.

W10.1

(W10.1) Provide details for the person that has signed off (approved) your CDP water response.

	Job title	Corresponding job category
Row 1	Chief Executive Officer (CEO)	Chief Executive Officer (CEO)

W10.2

(W10.2) Please indicate whether your organization agrees for CDP to transfer your publicly disclosed data on your impact and risk response strategies to the CEO Water Mandate’s Water Action Hub [applies only to W2.1a (response to impacts), W4.2 and W4.2a (response to risks)].

No

Submit your response

In which language are you submitting your response?

English

Please confirm how your response should be handled by CDP

	I understand that my response will be shared with all requesting stakeholders	Response permission
Please select your submission options	Yes	Public

Please confirm below

I have read and accept the applicable Terms