Annual Securities Report

English excerpt translation of the "Yukashoken-Houkokusho" for the 100th fiscal year (from April 1, 2023 to March 31, 2024)

Nippon Paper Industries, Co., Ltd. 3863

Note: This document has been translated from the Japanese original for reference purposes only. In the event of any discrepancy between this translated document and the Japanese original, the original shall prevail.

[Business Risks]

The following is a list of major risks that management recognizes as having the potential to materially affect the consolidated company's financial position, operating results, and cash flows, among other matters related to the business and accounting conditions described in the Annual Securities Report (submitted on June 27, 2024). However, these are not an exhaustive list of all risks, and risks other than those listed may also exist and have an impact. Forward-looking statements in the text are based on the Group's judgment (the Company and its consolidated subsidiaries) as of the end of FY2024/3.

(1) Major Risks Associated with Management Strategies

1) Human Resources

NIPPON PAPER GROUP (the Group) considers its human resources strategy to be a key element of its business activities. We are focusing on securing and developing appropriate human resources for future business development. If the Group fails to recruit and train adequate personnel, it will be difficult to sustain the growth and competitiveness of our business, which could have an impact on our operating results and financial position.

We are working on securing human resources by actively recruiting and developing human resources with diverse backgrounds, and by creating a work environment that supports flexible working styles, and by creating of an organization where diverse human resources can demonstrate their full potential. In development, we are working to create "human resources who will take on the challenges of change". We introduced an in-house sideline system and selective education designed to train executive candidates at mills and offices to promote human resource development that will serve as the source for expanding earnings in growth businesses and strengthening the competitiveness of our core businesses.

As for work environment, we are working to establish a system that supports diverse work styles. For example, we are enhancing support system for balancing work with life events such as childcare and nursing care, and extending the mandatory retirement age for general employees from 60 to 65.

In addition, as labor force is decreasing due to low birthrate and aging of population, we are also considering automation and labor saving at mills, and introduction of IoT techniques in logistics.

As for safety, all of the Group's mills strive to operate with the highest priority on it. However, the occurrence of an occupational accident is a serious risk that could result in the loss of health and human life of workers. Depending on the nature of the accident, the Group is held liable for management as a company, and there is the possibility of facility shutdowns. Therefore, the Group operates a unique occupational health and safety management system to prevent occupational accidents. Through this system, we incorporate specific, ongoing, and voluntary activities at each business site into our safety and health plans, prevent occupational accidents, promote employee health, and ensure a comfortable workplace environment, to elevate the health and safety level.

Through these initiatives, we strive to secure and develop appropriate human resources, prevent occupational accidents, and secure sustainable growth and safe work environment.

2) Natural Disasters and Infectious Diseases, etc.

A large-scale natural disaster, such as an earthquake, typhoon or flood, in an area where the Group's production and sales bases are located could have a significant impact on business continuity. There is a possibility that there will be an outage of production activities, an increase in expenses for the restoration of facilities, or damage to products or raw materials, which may affect the Group's operating results and financial position.

Therefore, in case of emergency, we will promptly set up a Crisis Management HQ in accordance with the Crisis Management Regulations, to confirm the safety of employees and their families, to ascertain the status of damage, and to implement measures for continuing supply. In addition, we have strengthened our business continuity management (BCM) to respond to emergencies. We have established supply systems between several plants, and regularly conduct evacuation drills and safety confirmation drills based on disaster scenarios.

The outbreak of COVID-19 has once again reminded us of the possible impact of infectious diseases on business activities.

The risk of infectious diseases, including COVID-19, can be a threat to employee health and business continuity. Our group is continually strengthening its measures against infectious diseases, including measures to prevent the spread of infection among employees, establishment of a telecommuting system, and expansion of use of online conference system. If there are concerns about the occurrence of infection or impact on business activities, we will quickly share information

and launch Crisis Management HQ to curb the situation and stabilize our business.

Through these initiatives, we are flexibly responding to unexpected situations, such as natural disasters or infectious diseases, and building and maintaining a system to ensure business continuity and the safety of our employees. We will continue to respond to changing social conditions by continuously reviewing and strengthening risk countermeasures.

3) Climate Change

With energy-intensive Paper and pulp as our main business, we view a comprehensive response to climate-change as a crucial task for achieving Group Mission and are working to reduce GHG emissions with the aim of achieving carbon neutrality by 2050. As the global movement toward decarbonization accelerates, if our group's response is delayed, we may face regulatory risks, such as the strengthening of carbon pricing policies, and reputational risks due to declining confidence from customers and investors, which could have a financial impact.

We appropriately assess the financial impact of these risks and disclose them in a transparent manner based on the framework recommended by TCFD. To reduce risks, we are accelerating our efforts to reduce GHG emissions by introducing high-efficiency facilities and optimizing manufacturing processes to conserve energy, and by raising the ratio of renewable and waste-based energy use through a review of the energy mix. Furthermore, in logistics, we are working to reduce emissions throughout the value chain through collaboration with other companies in the same industry and across industries, through measures such as round-trip transportation, modal shifts, and shortening transportation distances. In this way, we are deepening collaboration with stakeholders.

Not only we strive to reduce the Group's GHG emissions, but we also actively undertake initiatives such as forest absorption and carbon recycling through appropriate forest management. We will promote decarbonization from a multifaceted perspective, strengthen our efforts to achieve 2050 carbon neutrality, and contribute to the realization of a sustainable society.

Addressing climate change goes beyond mere risk management and creates new business opportunities. We promote innovation centered on sustainability and aim for growth that is sustainable from both environmental and economic perspectives.

4) Delays in Business Structure Transformation and the Creation of New Businesses

Our Graphic Paper business continues to shrink due to the ongoing digitization and changes in working styles and lifestyles triggered by the COVID-19. Based on this situation, we are shifting our resources to growing fields such as Daily-Life Products Business and are working to quickly bring new businesses and products to market. However, if these initiatives do not progress as scheduled, the Group's operating results and financial position may be affected.

In 2021, we formulated 2030VISION and Medium-Term Business Plan 2025 with the aim of accelerating business structure transformation and expanding the scope of our growing and new businesses. By ensuring that this policy is instilled in employees, we strengthen awareness of our initiatives. Specific measures include developing paper containers and packaging that serve as plastic substitutes; expanding the use of wood biomass, including CNF; investing in growing businesses and reallocating human resources; and expanding oversea business.

In particular, we are accelerating and expanding oversea business. We manufacture and sell paper and pulp in North and South America, Northern Europe, Southeast Asia, Australia, and elsewhere. We also operate afforestation in overseas, with the aim of realizing synergies with our group businesses.

Opal Limited in Australia withdrew from Graphic Paper business and is strengthening its integrated system focusing on Packaging Business, which is expected to grow. With the launch of a new corrugated boxes plant Opal is expecting further growth in the packaging field.

Oversea business expansion is subject to unique risks such as changes in local governmental laws and regulations, labor disputes, and economic stagnation caused by political instability. To cope with these risks, we conduct appropriate risk management through information sharing with external law firms and strive to prevent risks from occurring. In addition, we recognize that global supply chain vulnerabilities, responsiveness to environmental changes, and the speed of technological innovation can bring new challenges to business development, and we continue to consider strategies to respond flexibly to these changes in the external environment.

5) Product Demand and Market Conditions

Our operations span a wide range of fields, including Paper and Paperboard Business, Daily-Life Products Business, Energy Business, and Wood Products and Construction Related Business. These products and services are subject to risks

of fluctuations in product selling prices due to changes in economic conditions, changes in consumer behavior and preferences, changes in demand caused by factors such as the supply and demand balance in the market, changes in raw materials and fuel prices, and price competition with competitors. These fluctuations may affect our operating results and financial position.

In Graphic Paper business, which has been particularly affected by the acceleration of DX and the establishment of new lifestyles due to the outbreak of COVID-19, we are improving cost-efficiency by reorganizing production system and consolidating production bases. We are also working to optimize our business portfolio by increasing investment in Daily-Life Products Business to meet emerging consumer needs, which include growing online shopping and spread of remote work.

Furthermore, we have strengthened our analysis based on global market trends and economic indicators, and to build strategies that can respond quickly and flexibly to market fluctuations. We are also working to increase resilience to market changes by capturing the needs of new markets, developing new products through innovation, and expanding our services.

6) Raw Material and Fuel Procurement, Domestic and International Transportation

Our group procures raw materials and fuel such as wood chips, waste paper, heavy oil, coal, and chemicals, for manufacturing. Prices of raw materials and fuel are significantly affected by domestic and overseas market conditions, and such price fluctuations may affect our operating results and financial position, etc.

We expect that transportation costs will continue to increase as a result of rising raw materials and fuel prices, primarily due to port workers and transportation capacity shortages, delays in the transportation network in the global supply chain due to high geopolitical tensions, and decarbonization policies to address climate change. In the case of domestic operations in particular, the so-called "Distribution 2024 Problem" has emerged as a new issue, and these problems may further affect our operating results and financial position.

To cope with this issue, we have set up and operate a scheme for purchasing reservations to hedge risks with respect to some of our raw materials and fuels. Also, as a measure to reduce cargo handling time, some plants have introduced a truck acceptance reservation system to shorten the waiting time for cargo handling. In addition, we will strengthen good relationships with suppliers and logistics companies to ensure stable procurement and optimize financial position through enhanced control on inventory levels realized by procurement from multiple regions and sources, expansion of distribution and procurement networks with strengthening group-wide collaboration. We are also working to optimize our financial position by strengthening the management of our warehouses.

In response to the 2024 Logistics Issue, we established an internal cross-functional project team for product sales and raw materials and fuel procurement. This team works to achieve both regulatory compliance and minimization of cost increases. In cooperation with our business partners, we are implementing measures such as planning delivery in advance, changing transportation system, and establishing a new inventory base near the consuming area. In addition, we have realized marine joint transportation with other companies, which contributes to reducing GHG emissions compared with trucking.

7) ESG, SDGs and other social demands

We are addressing key environmental issues such as climate change, sustainable forest resources, and biodiversity. Furthermore, we are focusing on social and management issues such as human rights, diversity, and corporate governance. Efforts to address these ESG issues are essential for realizing a sustainable society. If we are slow to address ESG issues or fail to properly disclose the information required by investors and ESG assessment organizations, we could lose understanding and confidence of our stakeholders, which could affect our long-term growth potential and our group's brand value. To respond to this, we continue to engage with ESG assessment organizations, as well as carefully communicate with stakeholders.

Of the major ESG issues, initiatives related to climate-change are listed separately. With regard to human rights, we will encourage suppliers and other business partners, as well as all executives and employees, to support and comply with the the Nippon Paper Group Human Rights Policy formulated in 2022 in line with the United Nations Guiding Principles on Business and Human Rights. Furthermore, within the framework of human rights due diligence introduced in 2021, we list and assess related human rights risks in the value chain in three businesses, such as Paper and Paperboard Business, then identify high-priority human rights risks and implement countermeasures. As forest resources are the business foundation of the Group, we set targets for sustainable forest management that take biodiversity into account in the Nippon Paper Group Environmental Targets 2030. We strive to balance economic use of forests with environmental conservation, such as conducting fixed-point surveys of forest ecosystems and setting reserves and protected forests to conserve biodiversity. Our Group Mission, "Aim to contribute to better living and cultural progress everywhere it does business", is in harmony with SDGs's Mission, which says "no one is left behind." By addressing ESG issues, we aim to achieve Group Mission

while contributing to the achievement of SDGs.

(2) Main Risks Associated with the Business Environment and Business Activities Production

1) Production Facilities

The Group's production activity is based on planned production that takes into account market demand and the capacity of existing facilities. However, if the operating rate of production facilities declines due to equipment breakdowns, fires, or equipment accidents caused by natural disasters, the supply capacity of products may be insufficient, which could affect the Group's operating results and financial position. In response to these risks, we conduct regular facility inspections and maintenance, implement aging countermeasure works to systematically upgrade vulnerable areas, build supply systems at multiple plants, and optimize inventories.

2) Compliance

Related laws and regulations are constantly changing in a wide range of fields, including Paper and Paperboard Business, Daily-Life Products Business, and Energy Business businesses, as well as Wood Products and Construction Related Business that our group deploys, and new compliance-related issues are emerging.

In particular, the risks of non-compliance are becoming increasingly complex due to changes in social conditions, such as digitization, globalization, and the growing interest in environmental protection and respect for human rights. Because the Group conducts business activities with cooperation of our business partners and various subcontractors for operations that are difficult to execute on our own, we emphasize fair and sound business practices in our relationships with our business partners and subcontractors. While we seek fair trade practices that reflect changes in social values as well as compliance with the Antimonopoly Act and the Subcontract Act, if there is a violation, it is expected to be a major risk in management, such as litigation and the loss of social trust.

In order to respond to these requirements, we comply with desirable business practices between parent companies and subcontractors based on the "Declaration on Building Partnerships", and are actively working to rectify business practices that hinder the establishment of partnerships with business partners.

In addition, based on the "Guidelines on Price Negotiations to Appropriately Pass Through Labor Costs" published in November 2023, we are proceeding with risk assessment and implementation of countermeasures on a Group-wide basis.

Furthermore, we conduct compliance training in response to changes in social conditions and surveys on compliance awareness in an effort to raise the awareness of compliance among employees. Through these initiatives, we aim to respond flexibly to changes in social conditions and minimize the risk of non-compliance.

3) Product Liablility

The Group could receive claims for compensation for loss or damage in relation to product liability, but we have not received any significant claims of this sort at present. However, the Group may be liable for the payment of compensation for loss or damage in the future. While we have enrolled in product liability insurance, it may not be enough to cover the amount of compensation for loss or damage for which the Group may be held liable. The Group has established NIPPON PAPER GROUP Product Risk Committee to supervise the product safety risk of its group companies and support efforts to manage and mitigate that risk. Concurrently, Product Risk Committees have been set up at the Group's main manufacturing companies as part of efforts to prevent product safety incidents by promoting the development of product risk management regulations.

4) Environmental Laws and Regulations

The Group is subject to the application of environmental laws and regulations in various businesses. Revisions and amendments to such regulations could limit production activities and result in additional costs incurred to implement countermeasures, etc., affecting the Group's business performance, financial position, and other aspects. In addition to regularly monitoring the status of amendments to environment-related laws and regulations, we collect various information from outside the company to establish a system to respond appropriately to legal revisions.

5) Information Systems

The Group strengthens and rigorously implements security measures for its information systems. We also implement extensive information security measures to address the work-from-home environment, which has been rapidly adopted across society. If there are any problems such as information leakages due to unauthorized access to computers and/or data breaches due to criminal acts, and/or interference with somebody's duties, we may be held liable for the payment of compensation for loss or damage and experience a loss of public trust or suspension of business, etc. Such events could affect the business performance, financial position, and other aspects of the Group. The Group installs defense systems and provides employee training on information security in step with current conditions. As part of our efforts to strengthen

its management structure, we have set force "Personal Information Handling Regulations", made these regulations known to the executives, employees, and business partners, and established communication routes in the event of a security incident. In addition, we conduct regular security audits and vulnerability assessments to detect and correct system vulnerabilities in an effort to prevent security incidents.

6) Intellectual Property Disputes

The Group holds intellectual property rights related to products and technologies, and we may be subject to intellectual property disputes and litigation, which could have an impact on the Group's business performance and financial position.

Specifically, we may be subject to lawsuits alleging that our products and technologies infringe the intellectual property rights of other companies. In addition, there is a possibility that our Group's intellectual property rights may be subject to claims for revocation by other companies or the risk of infringement of intellectual property rights by third parties. The Group is committed to protecting intellectual property rights and educating our employees, while implementing legal measures and risk management measures.

7) Foreign Exchange

The Group is exposed to the risk of foreign exchange fluctuations associated with import, export and other transactions. In terms of the balance of imports and exports, the Group's imports of various raw materials and fuel, etc., such as wood chips, oil, coal, and chemicals, exceed its exports of products and other items. For this reason, the predominant foreign exchange impact is that the depreciation of the yen against the U.S. dollar will have a negative impact on business performance. The Group hedges against this risk through forward contracts and other means in order to mitigate the impact of foreign exchange rate fluctuations on its business performance.

(3) Financial and Accounting Risks

1) Share Prices

The Group holds marketable shares primarily in business partners and affiliated companies. Therefore, the Group is exposed to the risk of share price fluctuations that could affect its business performance, financial position, and other aspects. With this in mind, the Group conducts regular monitoring of the shares it holds, so that it can detect whether the shares could have a significant impact on its financial position.

2) Interest Rates

The Group is exposed to the risk of interest rate fluctuations with respect to interest-bearing debt and other items. Such fluctuations could affect the business performance, financial position, and other aspects of the Group. The Company maintains the ratio of fixed interest rate loans to long-term debt above a certain level. Also, the Company mitigates the risk of interest rate fluctuations through the use of financial instruments such as interest rate swaps, in addition to spreading out repayment periods and diversifying financing methods, among other measures.

3) Credit Risk

The Group takes care to limit its credit risk through measures such as continuously evaluating the financial and related information of its business partners in accordance with credit management rules and establishing credit limits accordingly, but any event that disrupts the collection of receivables, such as a deterioration in the financial condition or bankruptcy of customers, could affect the business performance, financial position, and other aspects of the Group.

4) Impairment of Fixed Assets

The Group owns fixed assets such as production facilities and land. Changes in the operating environment and other factors that result in a significant decline in future cash flow generated through these assets may lead to an incurrence of an impairment loss and affect the business performance, financial position, and other aspects of the Group.

5) Retirement Benefit Obligation

The Group's retirement benefit expenses and obligation are calculated based on actuarial assumptions such as the rate of return and the discount rate on pension assets. However, any circumstances requiring a change in the actuarial assumptions or an impairment to pension assets resulting from stagnation of the stock market and other factors may affect the business performance, financial position, and other aspects of the Group. With this in mind, the Group has diversified its pension plan assets into multiple asset classes and management styles with different risk and return characteristics based on the advice of external consultants. By regularly conducting an analysis of the risk and return of the entire pension plan assets, the Group conducts an evaluation of the effectiveness of the diversification effect.

6) Reversal of Deferred Tax Assets

The Group records deferred tax assets after it judges the recoverability of deductible temporary differences and operating

loss carryforwards based on an estimation of future taxable income. However, changes in the operating environment and other factors that lead to a decline in taxable income, or changes in the tax regulations and other factors that lead to a revision in recoverability, may cause a reversal of deferred tax assets. Such a reversal could affect the business performance, financial position, and other aspects of the Group.

[Notes to consolidated financial statements of Nippon Paper Industries Co., Ltd. ("the Company") and its subsidiaries (collectively, "the Group")]

(Significant Matters Providing the Basis for the Preparation of the Consolidated Financial Statements)

- 1. The scope of consolidation
 - (1) Number of consolidated subsidiaries: 54

The names of major consolidated subsidiaries are omitted.

In the fiscal year ended March 31, 2024, the liquidation of Dyna Wave Holding Asia was completed and it was excluded from the scope of the consolidation.

(2) Names, etc., of major unconsolidated subsidiaries

Major unconsolidated subsidiary: Douoh Kouhatsu Ltd.

(Reason for exclusion from the scope of consolidation)

All unconsolidated subsidiaries are excluded from the scope of consolidation because the scale of their operations is small and their total amounts in terms of total assets, net sales, profit or loss (corresponding to the equity ratio owned by the Company) and retained earnings (corresponding to the equity ratio owned by the Company) do not have a significant effect on the Company's consolidated financial statements.

2. Application of the equity method

- (1) Number of unconsolidated subsidiaries accounted for by the equity method: 0
- (2) Number of affiliates accounted for by the equity method: 12

Names, etc., of major affiliates accounted for by the equity method

DuPont Nippon Paper Papylia Godo Kaisha, Shin Tokai Paper Co., Ltd., Phoenix Pulp & Paper Public Company Limited, Nippon Tokan Package Co., Ltd., and Lintec Corporation

- (3) Unconsolidated subsidiaries (Douoh Kouhatsu Ltd. and 66 other companies) and affiliates (JPT LOGISTICS CO., LTD. and 20 other companies) not accounted for by the equity method are excluded from the scope of the equity method because their total amounts in terms of profit or loss (corresponding to the equity ratio owned by the Company) and retained earnings (corresponding to the equity ratio owned by the Company) are not significant, with insignificant effects on the Company's consolidated financial statements when excluded from the scope of the equity method.
- (4) For the affiliates accounted for by the equity method that close their accounts at different dates than the Company's balance sheet date, the financial statements as of their respective balance sheet dates are used for the preparation of the consolidated financial statements.

3. Accounting period of consolidated subsidiaries

The balance sheet date is December 31 for Jujo Thermal Oy, Siam Nippon Industrial Paper Co., Ltd., Nippon Paper Industries USA Co., Ltd., Opal, Nippon Dynawave Packaging Co., TS Plastics Sdn. Bhd. and its one subsidiary, Amapá Florestal e Celulose S.A. and its two subsidiaries, and Nippon Paper Resources Australia Pty. Ltd.

In preparing the consolidated financial statements, the financial statements as of the said balance sheet date are used for these companies, with necessary adjustments being made for consolidation purposes with regard to material transactions between December 31 and the Company's balance sheet date.

4. Significant accounting policies

- (1) Evaluation basis and methods for significant assets
 - (1) Securities

Other securities:

Securities other than shares, etc. that do not have a market price:

Carried at fair value (Unrealized gains or losses, net of the applicable income taxes, are included directly in net assets. Costs of securities sold are determined by the moving-average method.)

Shares, etc. that do not have a market price:

Carried at cost by the moving-average method

② Derivatives

Fair value method

③ Inventories

Stated at cost, determined principally by the moving-average or periodic-average method. (The balance sheet amount is written down based on any decline in profitability.)

(2) Depreciation methods for significant assets

① Property, plant and equipment (excluding lease assets)

The declining-balance method is used, except that the straight-line method is employed for some assets of the Company and its consolidated subsidiaries.

However, buildings (excluding building fixtures) acquired on or after April 1, 1998, and building fixtures and structures acquired on or after April 1, 2016, are depreciated by the straight-line method.

The useful lives of assets are principally as follows:

Buildings and structures: 10 to 50 years Machinery, equipment and vehicles: 7 to 15 years

② Intangible assets (excluding lease assets)

The straight-line method is used.

Software for internal use is amortized over an estimated useful life of 5 years on a straight-line basis.

③ Leased assets

Depreciation of leased assets under finance-leasing agreements that do not transfer ownership is calculated using the straight-line method assuming a residual value of zero (or the guaranteed residual value when it is set by the agreement) and a useful life equal to the term of the lease.

(3) Basis for significant allowances and provisions

① Allowance for doubtful receivables

To cover a loss from uncollectible receivables, allowances for bad debts are provided at the amount determined based on the historical experience of bad debts for ordinary receivables. For specific doubtful receivables, the collectability is considered on an individual basis.

2 Allowance for environmental costs

To cover future expenditures for disposing of PCB waste in accordance with the Act on Special Measures concerning Promotion of Proper Treatment of PCB Wastes, an allowance is provided at the estimated amount of disposal costs.

(4) Accounting policies for retirement benefits

① Method for allocating projected retirement benefits

In calculating retirement benefit obligations, the benefit formula method is applied to allocate projected retirement benefits to the periods until the end of the fiscal year under review.

② Amortization of actuarial differences and prior service cost

Prior service cost is amortized evenly using the straight-line method over the determined years (7 to 15 years) that are no longer than the average remaining service years of the employees at the time of occurrence.

Actuarial differences are primarily amortized evenly using the straight-line method over the determined years (5 to 15 years) that are no longer than the average remaining service years of employees, beginning from the fiscal year following the time of occurrence.

(5) Standards for recognizing significant revenue and expenses

The Company and its consolidated subsidiaries' main businesses include production and sales of products or sales of goods in the paper and paperboard business, daily-life products business, and wood products and construction-related business as well as wholesale supply and sales of electricity in the energy business. Regarding domestic sales of products and goods in the paper and paperboard business, daily-life products business, and wood products and construction-related business, revenue is mainly recognized upon shipment given the normal period from shipment to delivery upon which control of products and goods is transferred to customers. In export sales, revenue is mainly recognized when the burden of risk is transferred to customers based on trade conditions stipulated by Incoterms, etc.

Regarding wholesale supply and sales of electricity in the energy business, revenue is mainly recognized at an amount for which the Company has the right to claim according to supplied amounts of electricity, as amounts of consideration corresponding directly to supplied amounts of electricity are received from customers over the contract period.

As considerations for transactions are received within one year after satisfying performance obligations, significant financing components are not included.

For transactions related to sales of goods in which the Company acts as an agent in each business, the transaction price is calculated based on the net amount of consideration received from the customer. Also, revenue is measured at an amount of promised consideration in contracts with customers less discounts, etc. There is no estimate of significant variable consideration.

(6) Accounting policies for translation of significant assets and liabilities denominated in foreign currencies into Japanese yen

Receivables and payables denominated in foreign currencies are translated into Japanese yen, using the spot exchange rates on the balance sheet date, and the resulting translation gains and losses are recognized as income and losses. Assets and liabilities of overseas subsidiaries, etc., are translated into Japanese yen at the spot exchange rates on their balance sheet date, whereas income and expenses are translated into Japanese yen at the average exchange rates. The resulting translation gains and losses are recorded as translation adjustments and non-controlling interests under the net assets section.

(7) Significant hedge accounting methods

① Hedge accounting methods

Deferral hedge accounting is principally adopted.

Receivables and payables denominated in foreign currencies hedged by qualified forward foreign exchange contracts are translated at their corresponding contract rates (the allocation method "Furiate-shori").

The exceptional accounting method is adopted for the interest rate swaps that meet special matching criteria ("*Tokureishori*"). The integral accounting method is adopted for currency and interest rate swaps that meet the requirements for integral accounting ("*Ittai-shori*").

- 2 Hedging instruments and hedged items
 - a. Hedging instrument: Forward foreign exchange contracts

Hedged items: Receivables denominated in foreign currencies arisen from exports of products, payables denominated in foreign currencies arisen from imports of raw materials and fuel, and forecast transactions denominated in foreign currencies

b. Hedging instrument: Interest rate swaps

Hedged items: Loans payable

c. Hedging instrument: Interest rate and currency swaps

Hedged items: Loans payable denominated in foreign currencies

d. Hedging instrument: Crude oil swaps

Hedged items: Forecast fuel purchases

e. Hedging instrument: Commodity futures

Hedged items: Forecast power purchases

3 Hedging policy

The Company uses derivative transactions to primarily hedge fluctuation risks of foreign currencies, interest rates and prices.

4 Method for evaluating hedge effectiveness

The Company evaluates hedge effectiveness based on semiannual comparisons of changes in cash flows or the fair value of hedged items and hedging instruments.

For interest rate swaps that meet the requirements for exceptional accounting method and currency and interest rate swaps that meet the requirements of integral accounting method, the Company omits to evaluate hedge effectiveness as of the balance sheet date.

Evaluation of hedge effectiveness as of the balance sheet date is also omitted if forward foreign exchange contracts with the same amount denominated in U.S. dollars, etc., and the same timing are allocated when the contracts are concluded in accordance with the risk management policies, because they guarantee a correlation due to subsequent exchange rate movements.

(5) Hedging relationships that have applied "Treatment of Hedge Accounting for Financial Instruments that Reference LIBOR"

All hedging relationships described above included in the scope of application of "Treatment of Hedge Accounting for Financial Instruments that Reference LIBOR" (ASBJ Practical Solutions No. 40, March 17, 2022) are subject to the exceptional treatment provided in the Practical Solution. The details of the hedging relationships which apply this Practical Solution are as follows.

Hedge accounting methods: Exceptional accounting method for interest rate swaps and integral accounting method for currency and interest rate swaps

Hedging instruments: Interest rate swaps and interest rate and currency swaps

Hedged items: Loans payable and loans payable denominated in foreign currencies

Type of hedge transactions: To fix cash flows

(8) Method and period of amortization of goodwill

Goodwill is amortized by the straight-line method over an appropriate period of within 20 years that is determined based on the actual situations of subsidiaries.

(9) Cash and cash equivalents in the consolidated statements of cash flows

Cash and cash equivalents in the consolidated statements of cash flows include cash on hand, demand deposits at banks and highly liquid short-term investments with negligible risk of fluctuation in value and maturities of not exceeding three months.

(Significant Accounting Estimates)

(Impairment loss on noncurrent assets)

1. Nippon Paper Industries

In the fiscal year ended March 31, 2024, the Group determined that there was an indication of impairment loss for the asset group of ¥122,464 million (¥129,482 million in the fiscal year ended March 31, 2023) related to property, plant and equipment of the paper business, which consists of the Company's printing paper business and other businesses in the paper and paperboard segment, due to a decline in profitability caused by changes in the business environment. However, in determining whether to recognize an impairment loss, no impairment loss was recognized because the total undiscounted future cash flows from the asset group exceeded its book value.

Estimates of future cash flows resulting from the continued use of asset group are based on future business plans. Key assumptions in this plan are raw material and fuel prices, sales volumes, and unit sales prices. With regard to raw material and fuel prices, the price of coal, which is the Group's primary fuel and raw material, the Group assumes, based on forecasts from external institutions, the price will start to gradually decline despite the situation in Ukraine and the prolonged depreciation of the Japanese yen. Sales volumes for the fiscal year ended March 31, 2024 fell below those of the fiscal year ended March 31, 2023 as a result of overall weak demand. We assume that domestic sales volumes will continue to diminish. Further, we have set a unit selling price based on market environment, past trends, etc.

Because these assumptions are subject to uncertainty, if the future cash flows from this asset group were to decrease significantly due to changes in the business environment, an impairment loss may be incurred, which could have a significant impact on the consolidated financial statements for the fiscal year ending March 31, 2025.

2. Opal

Opal, a consolidated subsidiary, recorded property, plant and equipment of \(\frac{\pmathbf{\frac{4}}}{171,986}\) million and intangible assets of \(\frac{\pmathbf{4}}{14,173}\) million at the end of the fiscal year ended March 31, 2024.

Opal applies International Financial Reporting Standards and performs an impairment test when there is an indication of impairment on a cash-generating unit. In addition to that, cash-generating units, including goodwill, are tested for impairment on an annual basis. If the result of impairment testing indicates that the recoverable amount is lower than the carrying amount, the carrying amount is reduced to the recoverable amount, and amortized amount based on Japanese GAAP is deducted from the carrying amount. The Group recognizes this amount as an impairment loss.

The recoverable amount was calculated based on the value in use, and as a result of examination, the recoverable amount exceeded the carrying amount. As a result, no impairment loss was recognized. The key assumptions used in the value-in-use calculation are future cash flow projections based on the business plan approved by Opal's Board of Directors, the discount rate, and the perpetual growth rate after the period covered by the business plan.

Because these assumptions are subject to uncertainty, changes in the business environment may result in decreased cash flows from cash-generating units and impairment loss, which could have a significant impact on the consolidated financial statements for the fiscal year ending March 31, 2025.

(Accounting Standards Issued but Not Yet Applied)

- Accounting Standard for Current Income Taxes (ASBJ Statement No. 27, October 28, 2022)
- Accounting Standard for Presentation of Comprehensive Income (ASBJ Statement No. 25, October 28, 2022)
- Implementation Guidance on Tax Effect Accounting (ASBJ Guidance No. 28, October 28, 2022)
- 1 Overview

Stipulates the classification of income taxes when taxed on other comprehensive income and the treatment of tax effects related to the sale of stocks in subsidiaries, etc. when the corporate group tax system is applied.

- 2. Scheduled date of application
 - Scheduled to be applied from the beginning of the fiscal year ending March 31, 2025.
- 3. Impact of the application of these accounting standards, etc.

The amount of impact is currently evaluated at the time of preparation of the consolidated financial statements.

(Changes in Presentation)

Consolidated balance sheets

"Lease obligations," which was included in "Other" under "Noncurrent liabilities" in the previous fiscal year, is listed as a separate item for the fiscal year ended March 31, 2024 due to its increased materiality. To reflect this change in presentation, the consolidated financial statements for the fiscal year ended March 31, 2023 have been reclassified.

As a result, \(\frac{\pma}{2}\)5,012 million included in "Other" under "Noncurrent liabilities" in the consolidated balance sheets for the

prior fiscal year is reclassified as ¥16,959 million in "Lease obligations" and ¥8,052 million in "Other."

Consolidated statements of operations

"Business preparation expenses," which was listed as a separate item under "Non-operating expenses" in the previous fiscal year, is included in "Other" for the fiscal year ended March 31, 2024 due to its decreased materiality. To reflect this change in presentation, the consolidated financial statements for the fiscal year ended March 31, 2023 have been reclassified.

As a result, ¥1,732 million included in "Business preparation expenses" and ¥3,274 million included in "Other" under "Non-operating expenses" in the consolidated statements of operations for the prior fiscal year is reclassified as ¥5,007 million in "Other".

"Impairment loss" under "Extraordinary loss" were listed as separate items in the previous fiscal year. For the fiscal year ended March 31, 2024, however, their materiality decreased and they are therefore listed under "Other." To reflect this change in presentation, the consolidated financial statements for the fiscal year ended March 31, 2023 have been reclassified.

As a result, \$3,966 million included in "Impairment loss," under "Extraordinary loss" and \$6,554 million included in "Other" in the consolidated statements of operations for the prior fiscal year are reclassified as \$10,521 million in "Other."

Consolidated statements of cash flows

"Impairment loss," "Payments for loss on disaster" and "Payments for loss on business withdrawal" under "Cash flows from operating activities" were listed as separate items in the prior fiscal year. For the fiscal year ended March 31, 2024, however, their materiality decreased and they are therefore included in "Other." To reflect this change in presentation, the consolidated financial statements for the fiscal year ended March 31, 2023 have been reclassified.

As a result, \$3,966 million included in "Impairment loss," \$(1,516) million included in "Payments for loss on disaster," \$(520) million included in "Payments for loss on business withdrawal," and \$10,436 million included in "Other" under "Cash flows from operating activities" in the consolidated statements of cash flows for the prior fiscal year are reclassified as \$12,365 million in "Other."

(Notes to Consolidated Balance Sheets)

1. The amounts receivable arising from contracts with customers of notes and accounts receivable-trade are as follows:

		(Millions of yen)
	As of March 31, 2023	As of March 31, 2024
Notes receivable-trade	28,561	31,488
Accounts receivable-trade	160,566	173,502
Total	189,128	204,990

2. Pledged assets and secured debts

Assets pledged as collateral and secured debts are as follows:

		(Millions of yen)
	As of March 31, 2023	As of March 31, 2024
Land	119	34
	As of March 31, 2023	As of March 31, 2024
Short-term loans payable	490	600
Long-term loans payable (including current portion)	6	-
Total	496	600

3. Accounts related to unconsolidated subsidiaries and affiliates

Major accounts related to unconsolidated subsidiaries and affiliates are as follows:

		(Millions of yen)
	As of March 31, 2023	As of March 31, 2024
Investment securities (equity securities)	125,608	127,639
Other investments in unconsolidated subsidiaries and affiliates	920	209

4. Guarantee obligations

The Company guarantees the following obligations, including loans payable to financial institutions, etc., of companies other than consolidated subsidiaries.

		(Millions of yen)
	As of March 31, 2023	As of March 31, 2024
Nippon Paper Chemicals Europe Zrt.	_	2,856
Employees (housing loans)	1,128	904
Nippon Paper Foodpac Pvt. Ltd.	679	592
Nippon Paper Viet Hoa My JSC	801	592
Other	194	76
Total	2,803	5,023

5. Loan commitment agreements (as lender)

The Company maintains loan commitment contracts with unconsolidated subsidiaries. The unexercised portion of facilities based on these contracts is as follows:

		(Millions of yen)
	As of March 31, 2023	As of March 31, 2024
Amount of loan commitment contracts	8,500	7,210
Amount of lending	7,251	6,337
Net	1,248	872

6. Loan commitment agreements (as borrower)

For efficient procurement of working capital, the Company maintains loan commitment contracts with its banks. The unexercised portion of facilities based on these contracts is as follows:

 As of March 31, 2023
 As of March 31, 2024

 Amount of loan commitment contracts
 65,000
 65,000

 Amount of borrowing
 12,500
 —

 Net
 52,500
 65,000

7. The settlement of trade notes maturing on the last day of fiscal year is accounted on the clearance day.

As the last day of the fiscal year ended March 31, 2024 was a non-business day of financial institutions, the following notes maturing on the year-end date are included in the year-end balance.

		(Millions of yen)
	As of March 31, 2023	As of March 31, 2024
Notes receivable-trade	-	4,783
Notes payable-trade	_	5,362

(Notes to Consolidated Statements of Operations)

1. Revenue from contracts with customers

With regard to net sales, revenue from contracts with customers is not listed separately from other revenue. The amounts of revenue from contracts with customers are listed in "Notes – Segment Information – 3. Net sales, income or loss, assets and other items by reportable segment and disaggregation of revenue."

2. The Company reduced the book value of inventory for which profitability had decreased. Cost of sales includes the following loss on valuation of inventory (Negative values indicate the amount of reversal).

		(Millions of yen)
	Fiscal year ended	Fiscal year ended
	March 31, 2023	March 31, 2024
Loss (gain) on valuation of inventory	1,646	(1,418)

3. Research-and-development costs included in general and administrative expenses and manufacturing costs are as follows:

	(Millions of yen)
Fiscal year ended March 31, 2023	Fiscal year ended March 31, 2024
5,760	5,557

4. Retirement benefit expenses included in general and administrative expenses are as follows:

	(Millions of yen)
Fiscal year ended March 31, 2023	Fiscal year ended March 31, 2024
1,689	777

5. Depreciation expenses included in general and administrative expenses are as follows:

	(Millions of yen)
Fiscal year ended March 31, 2023	Fiscal year ended March 31, 2024
3,983	4,125

6. Gain on sales of noncurrent assets

Fiscal year ended March 31, 2023

¥2,377 million from land, etc. and others.

Fiscal year ended March 31, 2024

¥ 24,208 million from land, etc. and others.

8. Loss on withdrawal from business of subsidiaries

Fiscal year ended March 31, 2023

This is a loss resulting from the withdrawal from the graphic paper business at Opal, a consolidated subsidiary. The principle items of this loss are impairment loss, etc. on noncurrent assets.

Fiscal year ended March 31, 2024

This is a loss resulting from the withdrawal from the graphic paper business at Opal, a consolidated subsidiary. The principle

items of this loss are special retirement allowances due to personnel rationalization, etc.

8. Impairment loss

Fiscal year ended March 31, 2023

The Group recorded the impairment loss of \(\frac{\pma}{22}\),048 million on the following assets.

(Millions of yen)

Application	Location	Impairment loss	Туре	Notes
Assets scheduled to be disposed of, etc.	Victoria state, Australia	18,081	Machinery, equipment and vehicles, etc.	Extraordinary loss "Loss on withdrawal from business of subsidiaries"
Assets scheduled to be disposed of, etc.	Akita-shi, Akita, etc.	3,538	Machinery, equipment and vehicles, etc.	Extraordinary loss "Impairment loss"
Idle assets, etc.	Muroran-shi, Hokkaido, etc.	427	Land, etc.	Extraordinary loss "Impairment loss"
	Total	22,048		

To test indicators of the impairment of noncurrent assets, the Group groups assets mainly on a cash-generating unit basis for business-use assets and on an individual property basis for idle assets and assets to be retired.

The recoverable value of idle assets and assets to be retired was measured based on those assets' net sale value or value in use.

The breakdown of impairment losses of assets scheduled to be disposed of, etc. consists of \(\frac{\pmathbf{\text{\text{84}}}}{84}\) million for buildings and structures, \(\frac{\pmathbf{\text{21}}}{233}\) million for machinery, equipment and vehicles and \(\frac{\pmathbf{\text{302}}}{320}\) million for others. The breakdown of impairment losses of idle assets, etc. consists of \(\frac{\pmathbf{\text{496}}}{496}\) million for buildings and structures, \(\frac{\pmathbf{\text{4132}}}{1320}\) million for machinery, equipment and vehicles and \(\frac{\pmathbf{\text{4198}}}{1980}\) million for land.

The net sale value was estimated based on a third-party appraisal value, in principle, or by any equivalent means. Because the period of estimation for the value in use is less than one year, the future cash flows are not discounted.

In addition, the Group recorded loss on withdrawal from business of subsidiaries (¥19,705 million) for the fiscal year ended March 31, 2023, which was loss due to Opal's withdrawal from the graphic paper business. Of such, ¥18,081 million was impairment loss on noncurrent assets.

Fiscal year ended March 31, 2024

The Group recorded the impairment loss of ¥1,476 million on the following assets.

(Millions of yen)

Application	Location	Impairment loss	Type	Notes
Assets to be retired	Victoria state, Australia	1,251	Machinery, equipment and vehicles, etc.	Extraordinary loss "Loss on withdrawal from business of subsidiaries"
Idle assets, etc.	Muroran-shi, Hokkaido, etc.	41	Land, etc.	Extraordinary loss "Impairment loss"
	Total	1,293		

To test indicators of the impairment of noncurrent assets, the Group groups assets mainly on a cash-generating unit basis for business-use assets and on an individual property basis for idle assets and assets to be retired.

The recoverable value of idle assets and assets to be retired was measured based on those assets' net sale value or value in use.

The breakdown of impairment losses of assets scheduled to be disposed of consists of \$0 million for buildings and structures, \$1,251 million for machinery, equipment and vehicles. The breakdown of impairment losses of idle assets, etc. consists of \$15 million for buildings and structures, \$4 million for machinery, equipment and vehicles, \$21 million for land, and \$0 million for intangible fixed assets.

The net sale value was estimated based on a third-party appraisal value, in principle, or by any equivalent means. Because the period of estimation for the value in use is less than one year, the future cash flows are not discounted.

The Group also recorded loss on withdrawal from business of subsidiaries (¥10,268 million), which was a loss on withdrawal from graphic paper business of Opal. ¥1,251 million in the loss was an impairment loss of noncurrent assets.

		(Millions of yen)
	As of March 31, 2023	As of March 31, 2024
Machinery, equipment and vehicles	480	522
Removal cost	2,715	1,214
Other	208	106
Total	3,404	1,843

(Notes to Consolidated Statements of Comprehensive Income)

Reclassification adjustments and income tax effects on components of other comprehensive income are as follows:

	Fiscal year ended	(Millions of yen) Fiscal year ended
	March 31, 2023	March 31, 2024
Net unrealized holding gain on other securities:		
Amount recognized during the year	4,098	12,493
Reclassification adjustments	(13,298)	(3,907)
Before income tax effect adjustment	(9,199)	8,585
Income tax effect	2,402	(2,723)
Net unrealized holding gain on other securities	(6,796)	5,862
Net deferred gain (loss) on hedges:		
Amount recognized during the year	6,742	12,541
Reclassification adjustments	(2,766)	(1,121)
Before income tax effect adjustment	3,975	11,419
Income tax effect	(1,062)	(2,478)
Net deferred gain (loss) on hedges	2,912	8,941
Translation adjustments:		
Amount recognized during the year	20,834	17,066
Reclassification adjustments	<u> </u>	558
Translation adjustments:	20,834	17,625
Remeasurements of defined benefit plans, net of tax		
Amount recognized during the year	966	27,094
Reclassification adjustments	(1,879)	472
Before income tax effect adjustment	(913)	27,567
Income tax effect	356	(8,416)
Remeasurements of defined benefit plans, net of tax	(556)	19,150
Share of other comprehensive income of affiliates accounted		
for using the equity method:		
Amount recognized during the year	3,180	3,502
Reclassification adjustments	485	(12)
Share of other comprehensive income of affiliates accounted for using the equity method	3,665	3,489
Total other comprehensive income	20,059	55,068

(Notes to Consolidated Statements of Changes in Net Assets)

Fiscal year ended March 31, 2023

1. Matters related to outstanding shares

(Shares)

Type of shares	As of April 1, 2022	Increase	Decrease	As of March 31, 2023
Common stock	116,254,892		_	116,254,892

2. Matters related to treasury stock

(Shares)

Type of shares	As of April 1, 2022	Increase	Decrease	As of March 31, 2023
Common stock	721,288.80	6,211.07	12,005.00	715,494.87

Reasons for the change:

The increase in treasury stock (6,211.07 shares) resulted from the purchase of shares of less than one unit (6,011 shares) and an increase in shares of the Company in the current fiscal year due to changes in equity in affiliates accounted for by the equity method (200.07 shares).

The decrease in treasury stock (12,005 shares) resulted from the delivery of shares of the Company through the Company's Board Benefit Trust (BBT) (11,800 shares) and the sale of shares of less than one unit (205 shares).

The number of shares at the end of the current fiscal year includes 156,300 shares of the Company held through the BBT.

3. Matters related to stock acquisition rights, etc. None applicable.

4. Matters related to dividends

(1) Dividends paid

_ ` / 1					
Resolution	Type of shares	Total amount of dividends (Millions of yen)	Dividend per share (Yen)	Record date	Effective date
Ordinary General Meeting of Shareholders held on June 29, 2022	Common stock	3,476	30	March 31, 2022	June 30, 2022

Note: The total amount of dividends resolved at the Ordinary General Meeting of Shareholders held on June 29, 2022 includes the amount of dividends (¥5 million) on shares of the Company held through the BBT.

(2) Dividends for which the record date falls in the fiscal year ended March 31, 2023, but for which the effective date comes after March 31, 2023

None applicable.

Fiscal year ended March 31, 2024

1. Matters related to outstanding shares

(Shares)

Type of shares	As of April 1, 2023	Increase	Decrease	As of March 31, 2024
Common stock	116,254,892		l	116,254,892

2. Matters related to treasury stock

(Shares)

Type of shares	As of April 1, 2023	Increase	Decrease	As of March 31, 2024
Common stock	715,494.87	176,019.00	39,565.17	851,948.70

Reasons for the change:

The increase in treasury stock (176,019 shares) resulted from the acquisition of shares of the Company through the Company's Board Benefit Trust (BBT) (170,500 shares) and the purchase of shares of less than one unit (5,519 shares). The decrease in treasury stock (39,565.17 shares) resulted from the delivery of shares of the Company through the Company's Board Benefit Trust (BBT) (38,800 shares), the sale of shares of the Company by affiliates accounted for by the equity method (402.12shares), and a decrease in shares of the Company in the current fiscal year due to changes in equity in affiliates accounted for by the equity method (347.05 shares) and the sale of shares of less than one unit (16 shares). The number of shares at the end of the fiscal year includes 288,000 shares of the Company held through the BBT.

3. Matters related to stock acquisition rights, etc. None applicable.

4. Matters related to dividends

(1) Dividends paid None applicable.

(2) Dividends for which the record date falls in the fiscal year ended March 31, 2024, but for which the effective date comes after March 31, 2024

Resolution	Type of shares	Source of funds for dividends	Total amount of dividends (Millions of yen)	Dividend per	Record date	Effective date
Ordinary General Meeting of Shareholders held on June 27, 2024	Common stock	Retained earnings	1,158	10	March 31, 2024	June 28, 2024

Note: The total amount of dividends resolved at the Ordinary General Meeting of Shareholders held on June 27, 2024 includes the amount of dividends (\frac{\pmathbf{Y}}{2}\text{ million}) on shares of the Company held through the BBT.

(Notes to Consolidated Statement of Cash Flows)

Cash and cash equivalents at year-end are reconciled to the amounts reported in the consolidated balance sheets as follows:

		(Millions of yen)
	Fiscal year ended	Fiscal year ended
	March 31, 2023	March 31, 2024
Cash and deposits	144,350	164,858
Term deposits with maturities of more than three months	(3)	_
Cash and cash equivalents	144,346	164,858

(Leases)

Operating lease transactions

As lessee:

Future minimum lease payments for noncancelable operating leases are summarized as follows:

	1 0		(Millions of yen)
		As of March 31, 2023	As of March 31, 2024
Due within one year		2,192	2,205
Due after one year		9,474	7,286
Total		11,667	9,491

Notes: 1. As certain overseas consolidated subsidiaries have applied the IFRS No. 16 "Leases," operating leases related to such subsidiaries are not included.

2. As overseas consolidated subsidiaries that use the US-GAAP have applied the U.S. Financial Accounting Standards Board Accounting Standards Codification (ASC) 842 "Leases", operating leases related to such subsidiaries are not included.

As lessor:

Future minimum lease income for noncancelable operating leases is summarized as follows:

		(Millions of yen)
	As of March 31, 2023	As of March 31, 2024
Due within one year	215	95
Due after one year	428	332
Total	644	428

(Financial Instruments)

1. Status of financial instruments

(1) Policy for financial instruments

Domestically, the Group has implemented a Cash Management System (CMS), which is controlled by the finance department of the Company, to manage funds within the Group. The Group manages temporary cash surpluses through low-risk financial assets.

The Group raises funds it requires through bank borrowings, commercial paper and bond issuances based on projected cash demand according to the Group's capital investment plans. The Group spreads out repayment dates so that it can secure long-term capital continually. Furthermore, the Group diversifies financing resources to maintain liquidity, raising short-term working capital through bank loans, commitment line contracts and securitization of receivables and notes.

The Group adheres to a policy of using derivative transactions for the purpose of reducing interest rate fluctuation risk, foreign currency exchange risk and price fluctuation risk, and it does not enter into speculative transactions.

(2) Types of financial instruments and related risk

Trade receivables—trade notes and accounts receivable—are exposed to credit risk in relation to buyers. The due dates for all receivables and notes should be within one year. In addition, the Group is exposed to foreign currency exchange risk arising from receivables and notes denominated in foreign currencies. In principle, foreign currency exchange risk is hedged by forward foreign exchange contracts while the amounts of such receivables and notes are continually within that of liabilities denominated in foreign currencies.

Investments in securities mainly consist of shares of business partners and affiliates. The Group is exposed to market risk for listed securities.

Trade payables—trade notes and accounts payable—are due within one year. The payables denominated in foreign currencies are exposed to foreign currency exchange risk, which is hedged by foreign currency forward contracts.

The Group raises funds through short-term borrowings for working capital and raises funds through long-term loans payable and bonds mainly for capital investments. Some long-term loans payable bears variable interest rates and therefore is exposed to interest rate fluctuation risk. To reduce and fix interest expense for long-term loans payable bearing interest at variable rates, the Group utilizes interest rate swap and currency and interest rate swap transactions as a hedging instrument on an individual basis.

Regarding derivatives, the Group enters into forward foreign currency contracts to reduce the foreign exchange risk arising from receivables and payables denominated in foreign currencies and forecast transactions denominated in foreign currencies. The Group also enters into interest rate swap transactions to reduce fluctuation risk for interest payable for long-term loans payable bearing interest at variable rates. The Group also enters into currency and interest rate swap transactions to reduce exchange and interest rate fluctuation risk for loans payable denominated in foreign currencies, crude oil swap transactions to reduce price fluctuation risk on certain fuel purchase transactions, and commodities futures transactions to reduce price fluctuation risk on power purchase transactions.

For information regarding the method of hedge accounting, such as hedging instruments, hedged items, hedging policy and the assessment of the effectiveness of hedging activities, please refer to "Notes - Significant Matters Providing the Basis for the Preparation of the Consolidated Financial Statements, 4. Significant accounting policies, (7) Significant hedge accounting methods."

(3) Risk management for financial instruments

① Monitoring of credit risk (the risk that buyers or counterparties may default)

The Group's marketing division and finance division have established a regular screening system to monitor the financial status of clients, which allows them to closely supervise transactions, in accordance with the credit management rules prepared by the Company and its respective consolidated subsidiaries based on the "Group credit management policy." The two divisions give each other frequent and detailed reports on the status of credit collections on a daily basis to minimize risks. The divisions acquire information on clients in financial difficulty to protect related claims.

For all derivative transactions, the Group enters into transactions only with financial institutions that have a sound credit profile to minimize counterparty risk.

② Management of market risks (the risks arising from fluctuations in exchange rates, interest rates, prices, etc.)

To minimize the foreign exchange risk arising from trade receivables and payables denominated in foreign currencies and forecast transactions denominated in foreign currencies, the Group identifies the risk deriving from future export and import transactions for each currency twice each year and enters into forward foreign exchange contracts to hedge such risk.

The Group enters into interest rate swap transactions to minimize interest rate fluctuation risk for loans payable and bonds bearing interest at variable rates, and enters into currency and interest rate swap transactions to minimize exchange and interest rate fluctuation risk for foreign currency denominated loans payable. The Group also regularly monitors the ratio of loans with fixed interest rates and ones with variable interest rates, and optimizes such ratio according to interest rate movements.

The Group uses crude oil swap transactions to reduce the risk of price fluctuations for certain fuel purchases, and commodity futures transactions to reduce the risk of price fluctuations for power purchases.

As to investments in securities, the Group periodically reviews the fair values of such financial instruments and the financial position of the issuers. In addition, the Group periodically evaluates whether to continue to hold certain securities taking into account the relationship with the issuers.

③ Monitoring of liquidity risk (the risk that the Group might not be able to meet its obligations on scheduled due dates) In the Group, to minimize liquidity risk, the finance department of the Company prepares a cash flow plan every half year, which is updated on monthly and daily basis.

The Group obtains funds in consideration of diversification of fund-raising schemes, lengthens loan periods and staggers maturities to minimize refinancing risk. In addition, to diminish liquidity risk, the Group enters into commitment line contracts and overdraft arrangements with financial institutions.

(4) Supplementary explanation of items relating to the fair values of financial instruments

Because various assumptions and factors are reflected in estimating the fair value of financial instruments, different assumptions and factors could result in a different fair value. In addition, the contract amounts of derivatives provided in "Derivatives" in the Notes to Consolidated Financial Statements are not necessarily indicative of the actual market risk involved in derivative transactions.

2. Estimated fair value and other matters related to financial instruments

The book value of financial instruments on the consolidated balance sheets and their estimated fair value, as well as the difference between these values, are shown in the following table.

As of March 31, 2023

(Millions of yen)

	Book value	Fair value	Difference
(1) Notes and accounts receivable-trade	189,128	189,128	_
(2) Investments in securities			
Other securities	36,659	36,659	_
Stocks of subsidiaries and affiliates	60,972	48,295	(12,677)
Golf club membership	89	101	12
Total assets	286,849	274,184	(12,665)
(3) Notes and accounts payable-trade	154,167	154,167	_
(4) Short-term loans payable	214,383	214,605	222
(5) Long-term loans payable	607,850	599,362	(8,487)
Total liabilities	976,400	968,136	(8,264)
(6) Derivatives ³	19,230	19,230	_

- 1. "Cash and deposits" has been omitted because it represents cash and the book value of deposits approximates the fair value as deposits are settled in a short period of time.
- 2. Shares etc., that do not have a market price are not included in "(2) Investments in securities." The book values of the relevant financial instruments are as follows:

Classification	As of March 31, 2023
Unlisted equity securities	68,905

^{3.} Net assets and liabilities arising from derivatives are presented on a net basis, and net liabilities in total are presented in parentheses.

As of March 31, 2024

(Millions of yen)

	Book value	Fair value	Difference
(1) Notes and accounts receivable-trade	204,990	204,990	_
(2) Investments in securities			
Other securities	42,993	42,993	_
Stocks of subsidiaries and affiliates	60,860	67,928	7,068
Golf club membership	105	318	213
Total assets	308,950	316,231	7,281
(3) Notes and accounts payable-trade	157,815	157,815	_
(4) Short-term loans payable	207,176	207,254	77
(5) Long-term loans payable	577,083	565,348	(11,735)
Total liabilities	942,075	930,418	(11,657)
(6) Derivatives ³	30,451	30,451	_

- 1. "Cash and deposits" has been omitted because it represents cash and the book value of deposits approximates the fair value as deposits are settled in a short period of time.
- 2. Shares etc., that do not have a market price are not included in "(2) Investments in securities." The book values of the relevant financial instruments are as follows:

ClassificationAs of March 31, 2024Unlisted equity securities70,766

3. Net assets and liabilities arising from derivatives are presented on a net basis, and net liabilities in total are presented in parentheses.

Notes:

1. Redemption schedule for receivables after the consolidated balance sheet date

As of March 31, 2023

(Millions of yen)

				(1.1111101110 01) 011)
	Within one year	Over 1 but within 5 years	Over 5 but within 10 years	Over 10 years
Cash and deposits (*)	144,277	_	_	_
Notes and accounts receivable-trade	189,128	_	_	_
Total	333,405	_	_	_

^{*&}quot;Cash and deposits" does not include the amount of cash on hand.

As of March 31, 2024

(Millions of yen)

	Within one year	Over 1 but within 5 years	Over 5 but within 10 years	Over 10 years
Cash and deposits (*)	164,774	_		_
Notes and accounts receivable-trade	204,990			_
Total	369,765	1		_

^{*&}quot;Cash and deposits" does not include the amount of cash on hand.

2. Redemption schedule for long-term loans payable and other interest-bearing debt after the consolidated balance sheet date

As of March 31, 2023

(Millions of yen)

	Within one year	Over 1 but within 2 years	Over 2 but within 3 years	Over 3 but within 4 years	Over 4 but within 5 years	Over 5 years
Short-term loans payable	148,288	_	_	_	_	_
Long-term loans payable	66,094	89,346	103,687	64,411	47,435	302,969
Total	214,383	89,346	103,687	64,411	47,435	302,969

As of March 31, 2024

(Millions of yen)

	Within one year	Over 1 but within 2 years	Over 2 but within 3 years	Over 3 but within 4 years	Over 4 but within 5 years	Over 5 years
Short-term loans payable	117,022	_	_	_	_	_
Long-term loans payable	90,154	104,939	65,560	48,295	69,031	289,257
Total	207,176	104,939	65,560	48,295	69,031	289,257

3. Fair value information by level within the fair value hierarchy

The fair value of financial instruments is classified into the following three levels according to the observability and materiality of inputs used to measure fair value.

Level 1 fair value: Fair value measured using observable inputs, i.e. quoted prices in active markets for assets or liabilities that are the subject of the measurement.

Level 2 fair value: Fair value measured using observable inputs other than Level 1 inputs.

Level 3 fair value: Fair value measured using unobservable inputs.

If multiple inputs are used that are significant to the fair value measurement, the fair value measurement is categorized in its entirety in the level of the lowest level input that is significant to the entire measurement.

(1) Financial instruments measured at fair value

As of March 31, 2023

	Millions of yen)			
Category	Level 1	Level 2	Level 3	Total
Investments in securities Other securities Derivatives	36,659	19,230		36,659 19,230

Catagory		Fair value (1	Millions of yen)	
Category	Level 1	Level 2	Level 3	Total
Investments in securities Other securities Derivatives	42,993	30,451	_	42,993 30,451

(2) Financial instruments other than those measured at fair value

As of March 31, 2023

Catalana	Fair value (Millions of yen)				
Category	Level 1	Level 2	Level 3	Total	
Notes and accounts receivable-trade	_	189,128	_	189,128	
Notes and accounts payable-trade	_	154,167	_	154,167	
Short-term loans payable	_	214,605	_	214,605	
Long-term loans payable	_	599,362	_	599,362	
Investments in securities					
Stocks of subsidiaries and affiliates	48,295	_	_	48,295	
Golf club membership	_	101	_	101	

As of March 31, 2024

Catagory	Fair value (Millions of yen)				
Category	Level 1	Level 2	Level 3	Total	
Notes and accounts receivable-trade	_	204,990	_	204,990	
Notes and accounts payable-trade	_	157,815	_	157,815	
Short-term loans payable	_	207,254	_	207,254	
Long-term loans payable	_	565,348	_	565,348	
Investments in securities					
Stocks of subsidiaries and affiliates	67,928	_	_	67,928	
Golf club membership	_	318		318	

Note: A description of the valuation technique(s) and inputs used in the fair value measurement Investments in securities

Listed shares are valued using quoted prices. As listed shares are traded in active markets, their fair value is classified as Level 1. For information on other securities, please refer to "Securities" in the Notes to Consolidated Financial Statements.

Derivatives

Currency, interest rates and commodities subject to principle accounting are measured using prices quoted by counterparty financial institutions regarding the relevant transactions, and are classified as Level 2.

Since those, to which the exceptional accounting for interest rate swap and the integrated accounting for interest rate and currency swap were applied, are treated as a part of the hedged long-term loan payable, the fair value of them are included in the fair value of relevant long-term loan payable (see "Long-term loan payable" below).

Since those, to which the appropriation method was applied, such as the forward exchange contracts, etc., were treated as a part of hedged accounts receivable-trade, notes payable and accounts payable-trade, their fair values are included in the fair values of accounts receivable-trade, notes payable, and accounts payable-trade.

For information on derivatives, please refer to "Derivatives" in the Notes to Consolidated Financial Statements.

Notes and accounts receivable-trade

The fair value of these items is measured using the discounted cash flow method based on the amount of receivables, period to maturity and an interest rate reflecting credit risk, for each receivable categorized by a specified period, and is classified as Level 2.

Notes and accounts payable-trade and short-term loans payable

The fair value of these items is measured using the discounted cash flow method based on future cash flows, period to repayment and an interest rate reflecting credit risk, for each liability categorized by a specified period, and is classified

as Level 2.

Long-term loans payable

The fair value of long-term loans payable is calculated by classifying the total amount of principal and interest by a specified period and discounting its future cash flow at a rate determined based on the risk-free rate and the credit spread. It is therefore classified as Level 2.

Long-term loans payable with variable interest rates are covered by interest rate swap transactions that meet special accounting criteria and currency and interest rate swaps that meet integral accounting criteria (see the Derivatives section above) and are accounted for together with the corresponding interest rate swaps and currency and interest rate swaps. The fair value of such loans is calculated by discounting the total amount of principal and interest of the loans thus accounted for at a rate determined as stated above.

Golf club membership

Golf club membership is assessed using prices quoted by shops handling golf club memberships. However, they are not deemed to be quoted prices in active markets and accordingly, the fair value is classified as Level 2.

(Securities)

1. Other securities

As of March 31, 2023

(Millions of yen)

	Book value	Cost	Valuation difference
Securities for which the book value exceeds their			
cost:			
Equity securities	30,471	13,517	16,954
Subtotal	30,471	13,517	16,954
Securities for which the book value does not			
exceed their cost:			
Equity securities	6,187	7,838	(1,651)
Subtotal	6,187	7,838	(1,651)
Total	36,659	21,356	15,302

Note: With regard to the fair value of unlisted equity securities as of March 31, 2023 (¥4,359 million on the consolidated balance sheet), given that those securities do not have market prices, they are not included in "other securities" above.

As of March 31, 2024

(Millions of yen)

	Book value	Cost	Valuation difference
Securities for which the book value exceeds their			
cost:			
Equity securities	42,728	18,852	23,875
Subtotal	42,728	18,852	23,875
Securities for which the book value does not			
exceed their cost:			
Equity securities	265	293	(28)
Subtotal	265	293	(28)
Total	42,993	19,146	23,846

Note: Because the fair value of unlisted equity securities as of March 31, 2024 (¥3,987 million on the consolidated balance sheet) is extremely difficult to determine, given that those securities do not have market prices, they are not included in "other securities" above.

2. Sales of other securities

Fiscal year ended March 31, 2023

(Millions of ven)

			(ivilinous of jeil)
	Sales	Aggregate gain	Aggregate loss
Equity securities	19,894	13,385	87

Fiscal year ended March 31, 2024

(Millions of ven)

			(William of year)
	Sales	Aggregate gain	Aggregate loss
Equity securities	6,523	3,919	11

3. Impairment of securities

For the fiscal year ended March 31, 2023, the Company recorded a loss on impairment of securities in the amount of \(\frac{\pm}{178}\) million (including \(\frac{\pm}{178}\) million of equity securities that do not have a market price). For the fiscal year ended March 31, 2024, the Company recorded a loss on impairment of securities in the amount of \(\frac{\pm}{7}\) million (including \(\frac{\pm}{7}\) million of equity securities that do not have a market price).

Loss on impairment of securities are recorded for all securities for which the fair values at year-end have declined by 50% or more, compared with their acquisition costs. The impairment of securities for which the rate of decline in fair value is between 30% and 50% depends on how significant the amount of the decline is, how the decline is recoverable and other factors.

(Derivatives)

- 1. Derivative instruments not subject to hedge accounting
 - (1) Currency-related transactions

As of March 31, 2023

(Millions of yen)

					\
	Hedging instrument	Contract amount	More than 1 year	Fair value	Valuation gain/loss
Off-market transactions	Foreign exchange forward contracts Sell U.S. dollars	95		8	8

As of March 31, 2024

	Hedging instrument	Contract amount	More than 1 year	Fair value	Valuation gain/loss
Off-market transactions	Foreign exchange forward contracts Sell Australian dollars U.S. dollars Euros	2,859 1,072 518		(44) (57) 1	(44) (57) 1

(2) Interest-related transactions

As of March 31, 2023

(Millions of ven)

					(IVIIIIIIIIIIIIIIIIIIIIIIIIIIIIIIIIIII
	Hedging instrument	Contract amount	More than 1 year	Fair value	Valuation gain/loss
Off-market transactions	Interest rate swap transactions Pay/fixed and receive/floating	277		(2)	(2)

As of March 31, 2024

(Millions of yen)

					(Williams of yell)
	Hedging instrument	Contract amount	More than 1 year	Fair value	Valuation gain/loss
Off-market	Interest rate swap transactions				
transactions	Pay/fixed and receive/floating Receive/fixed and pay/floating	3,134 3,134		(101) 101	(101) 101

2. Derivative instruments subject to hedge accounting

(1) Currency-related transactions

As of March 31, 2023

						(Millions of yen)
Hedge accomethod	counting	Hedging instrumen	Principal hedged items	Contract amount	More than 1 year	Fair value
Deferral method	hedge	Foreign excha forward contracts Sell U.S. dollars Other	Accounts receivable-trade	6,080 4,675		(30) (18)
		Buy U.S. dollars Other	Notes and account payable-trade	106,467 17,267	77,712 4,587	12,751 583

					(Intilifolis of join)
Hedge accounting method	Hedging instrument	Principal hedged items	Contract amount	More than 1 year	Fair value
Allocation method	Foreign exchange				
(Furiate-shori)	forward contracts				
	Sell	Accounts			
	U.S. dollars	receivable-trade	134	_	
	Other		81	_	
					(Note)
	Buy				, , ,
	U.S. dollars	Notes and accounts	516	_	
	Other	payable-trade	_	_	

(Millions of yen)

Note: Foreign exchange forward contracts subject to the allocation method are recognized together with hedged items (i.e., accounts receivable-trade, notes and accounts payable-trade). The fair values of such transactions are included in those of the relevant hedged items.

As of March 31, 2024

				((Millions of yen)
Hedge accounting	Hedging instrument	Principal hedged	Contract	More than	Fair value
method	Treaging instrument	items	amount	1 year	(Note)
Deferral hedge	Foreign exchange				
method	forward contracts				
	Sell	Accounts			
	U.S. dollars	receivable-trade	7,174	_	235
	Other		4,402	_	(3)
			·		` ,
	Buy	NT (
	U.S. dollars	Notes and accounts	107,028	77,102	24,146
	Other	payable-trade	10,441	3,549	1,290

(Millions of yen) Hedge accounting Principal hedged More than Contract Hedging instrument Fair value method items amount 1 year Allocation method Foreign exchange (Furiate-shori) forward contracts Sell Accounts receivable-trade U.S. dollars 754 Other 87 Notes and accounts Buy (Note) U.S. dollars payable-trade

Note: Foreign exchange forward contracts subject to the allocation method are recognized together with hedged items (i.e., accounts receivable-trade, notes and accounts payable-trade). The fair values of such transactions are included in those of the relevant hedged items.

(2) Interest rate-related transactions

As of March 31, 2023

(Millions of yen)

Hedge accounting method	Hedging instrument	Principal hedged items	Contract amount	More than 1 year	Fair value
Deferral hedge method	Interest rate swap transaction Pay/fixed and receive/floating	Long-term loans payable	33,987	28,806	190
Exceptional accounting method (Tokurei-shori)	Interest rate swap transaction Pay/fixed and receive/floating	Long-term loans payable	165,200	165,200	(Note)

Note: Interest-rate swaps that qualify for the exceptional accounting method are recognized together with the corresponding long-term loans payable. The fair values of such transactions are included in those of the loans.

As of March 31, 2024

(Millions of ven)

					(minimons of join)
Hedge accounting method	Hedging instrument	Principal hedged items	Contract amount	More than 1 year	Fair value
Deferral hedge method	Interest rate swap transaction Pay/fixed and receive/floating	Long-term loans payable	27,576	24,500	217
Exceptional accounting method (Tokurei-shori)	Interest rate swap transaction Pay/fixed and receive/floating	Long-term loans payable	164,200	144,200	(Note)

Note: Interest-rate swaps that qualify for the exceptional accounting method are recognized together with the corresponding long-term loans payable. The fair values of such transactions are included in those of the loans.

(3) Currency and interest rate-related transactions

As of March 31, 2023

(Millions of yen)

Hedge accounting method	Hedging instrument	Principal hedged items	Contract amount	More than 1 year	Fair value
Integral accounting method (Ittai-shori)	Currency and interest rate swap transaction Pay/fixed and receive/floating Pay/JPY and receive/USD	Long-term loans payable	10,122	10,122	(Note)

Note: Currency and interest rate swaps that qualify for the integral accounting method are recognized together with the corresponding long-term loans payable. The fair values of such transactions are included in those of the loans.

As of March 31, 2024

(Millions of yen)

Hedge accounting method	Hedging instrument	Principal hedged items	Contract amount	More than 1 year	Fair value
Integral accounting method (Ittai-shori)	Currency and interest rate swap transaction Pay/fixed and receive/floating Pay/JPY and receive/USD	Long-term loans payable	7,122	7,122	(Note)

Note: Currency and interest rate swaps that qualify for the integral accounting method are recognized together with the corresponding long-term loans payable. The fair values of such transactions are included in those of the loans.

(4) Commodities-related transactions

As of March 31, 2023

(Millions of yen)

Hedge acco	unting	Hedging instrument	Principal hedged items	Contract amount	More than 1 year	Fair value
Deferral method	hedge	Commodity swaps Pay/fixed and receive/floating	Marine fuel	3,305	389	(242)
Deferral method	hedge	Commodity swaps Pay/fixed and receive/floating	Brent crude	8,369	5,600	2,583
Deferral method	hedge	Commodity futures transactions	Power	6,666	5,333	3,413

As of March 31, 2024

(Millions of yen)

Hedge acco	ounting	Hedging instrument	Principal hedged items	Contract amount	More than 1 year	Fair value
Deferral method	hedge	Commodity swaps Pay/fixed and receive/floating	Marine fuel	2,609	593	125
Deferral method	hedge	Commodity swaps Pay/fixed and receive/floating	Brent crude	5,969	5,969	1,534
Deferral method	hedge	Commodity futures transactions	Power	5,772	4,326	3,004

(Retirement Benefits)

1. Overview of retirement benefit plans

The Company and its consolidated subsidiaries adopt funded and unfunded types of defined-benefit plans and defined-contribution plans.

Defined-benefit corporate pension plans offer lump-sum or pension payments mainly according to the employee's salary and period of service.

Employee retirement benefit trusts are set up for some defined-benefit corporate pension plans. Lump-sum payment plans – which are basically unfunded, although the creation of retirement benefit trusts has resulted in some plans becoming funded – offer lump-sum payments as retirement benefits according to the employee's salary and period of service.

Defined-benefit corporate pension plans and lump-sum payment plans adopted by some consolidated subsidiaries use a simplified method to calculate net defined benefit liability and retirement benefit expenses.

In conjunction with the extension of the retirement age (raised from 60 to 65) for some employees introduced in April 2024, the Company froze the existing defined-benefit pension plan and replaced it with a plan consisting of a defined-contribution pension plan and a lump-sum retirement payment. As a result of this change, \(\frac{4}{2}\)452 million of prior service cost (reduction of retirement benefit obligation) was incurred.

2. Defined-benefit plans

(1) Reconciliation between the beginning and ending balances of retirement benefit obligations (excluding plans using a simplified method)

(Millions of ven)

	(Millions of yen)
Fiscal year ended	Fiscal year ended
March 31, 2023	March 31, 2024
116,494	109,907
3,719	3,471
734	813
(877)	(842)
_	(452)
(10,978)	(9,688)
815	386
109,907	103,596
	March 31, 2023 116,494 3,719 734 (877) — (10,978) 815

(2) Reconciliation between the beginning and ending balances of plan assets (excluding plans using a simplified method)

		(Millions of yen)
	Fiscal year ended	Fiscal year ended
	March 31, 2023	March 31, 2024
Plan assets at the beginning of year	125,991	115,651
Expected return on plan assets	2,563	2,584
Actuarial differences generated	(3,670)	25,799
Contribution from employers	491	1,300
Retirement benefits paid	(10,202)	(9,412)
Other	479	(303)
Plan assets at the end of year	115,651	135,621

(3) Reconciliation between the beginning and ending balances of net defined benefit liability for plans using a simplified method

(Millions of yen)

	(Millions of yen
Fiscal year ended	Fiscal year ended
March 31, 2023	March 31, 2024
2,037	1,927
613	555
(459)	(352)
(277)	(266)
13	45
1,927	1,911
	March 31, 2023 2,037 613 (459) (277) 13

(4) Reconciliation between the ending balances of retirement benefit obligations and plan assets and the net defined benefit liability and net defined benefit asset reported on the consolidated balance sheets

		(Millions of yen)
	As of March 31, 2023	As of March 31, 2024
Retirement benefit obligations for funded plans	112,488	106,350
Plan assets	(120,055)	(140,216)
	(7,567)	(33,865)
Retirement benefit obligations for unfunded plans	3,750	3,762
Net asset or liability reported on the consolidated balance sheets	(3,816)	(30,102)
Net defined benefit liability	11,669	10,984
Net defined benefit asset	(15,486)	(41,087)
Net asset or liability reported on the consolidated balance sheets	(3,816)	(30,102)

Note: Plans using a simplified method are included.

(5) Breakdown of retirement benefit expenses

		(Millions of yen)
	Fiscal year ended	Fiscal year ended
	March 31, 2023	March 31, 2024
Service cost	3,719	3,471
Interest cost	734	813
Expected return on plan assets	(2,563)	(2,584)
Amortization of unrecognized actuarial differences	2,328	712
Amortization of unrecognized prior service cost	(246)	(239)
Retirement benefit expenses calculated by a simplified method	613	555
Retirement benefit expenses for defined benefit plans	4,584	2,729
Special retirement benefits (Note)	1,049	6,853

Note: Special retirement benefits are included in "Loss on business withdrawal" and "Other" under "Extraordinary loss."

(6) Remeasurements of defined benefit plans

Remeasurements of defined benefit plans in other comprehensive income consist of the following (before tax effect).

 Fiscal year ended March 31, 2023
 Fiscal year ended March 31, 2024

 Past service costs
 246
 (213)

 Actuarial differences
 666
 (27,354)

 Total
 913
 (27,567)

(7) Remeasurements of defined benefit plans

Remeasurements of defined benefit plans in accumulated other comprehensive income consist of the following (before tax effect).

		(Millions of yen)
	As of March 31, 2023	As of March 31, 2024
Unrecognized past service costs	(3,028)	(3,241)
Unrecognized net actuarial differences	(8,730)	(36,084)
Total	(11,759)	(39,326)

(8) Matters regarding plan assets

Major components of plan assetsPlan assets mainly consist of the following:

	As of March 31, 2023	As of March 31, 2024
Stocks	54%	56%
Bonds	22%	19%
General account	14%	7%
Cash and deposits	9%	16%
Other	1%	2%
Total	100%	100%

Note: Total plan assets for the fiscal years ended March 31, 2023 and March 31, 2024 include securities contributed to the retirement benefit trust (27% and 32%) created for corporate pension plans, respectively.

② Method for determining the long-term expected rate of return on plan assets To determine the long-term expected rate of return on plan assets, the current and expected portfolio of plan assets and the current and future expected long-term profitability of the various plan assets are considered.

(9) Assumptions used in actuarial calculations

Major assumptions used in actuarial calculations are as follows:

	Fiscal year ended March 31, 2023	Fiscal year ended March 31, 2024
Discount rates	Mainly 0.5%	Mainly 0.5%
Long-term expected rates of return on plan assets	Mainly 2.0%	Mainly 2.0%

Note: Expected rate of salary increase is not presented because the Company and its consolidated subsidiaries do not generally use it in actuarial calculations for their retirement benefit plans.

3. Defined-contribution plans

The required amount of contribution to the defined-contribution plans was \(\frac{1}{4}\)1,823 million for the fiscal year ended March 31, 2023 and ¥1,840 million for the fiscal year ended March 31, 2024.

(Tax-effect Accounting)

1. Significant components of deferred tax assets and liabilities

(Millions of ven)

		(Millions of yell)
	As of March 31, 2023	As of March 31, 2024
Deferred tax assets:		
Accrued enterprise taxes	468	842
Accrued bonuses	2,216	2,450
Net defined benefit liability	5,693	3,637
Impairment loss	29,451	26,541
Loss on valuation of investment securities	2,476	2,381
Provision for environmental measures	2,845	2,437
Unrealized profit eliminated in consolidation	875	1,532
Tax loss carryforwards (Note 2)	48,985	59,604
Loss on revaluation of land	12,239	12,231
Other	13,865	15,326
Gross deferred tax assets	119,117	126,985
Valuation allowance relating to tax loss carryforwards (Note 2)	(43,408)	(53,870)
Valuation allowance for total deductible temporary differences	(58,671)	(49,249)
Valuation allowance subtotal (Note 1)	(102,079)	(103,120)
Total deferred tax assets	17,037	23,864
Deferred tax liabilities:		
Reserve for advanced depreciation of noncurrent assets	(2,081)	(2,059)
Unrealized holding gain on other securities	(4,112)	(7,048)
Net Deferred gain (loss) on hedges	(4,966)	(7,315)
Assets Related to Retirement Benefits	(521)	(11,832)
Gain on revaluation of land, etc.	(27,080)	(27,078)
Other	(9,955)	(10,431)
Total deferred tax liabilities	(48,715)	(65,766)
Net deferred tax liabilities	(31,678)	(41,901)

(Changes in presentation)

Assets Related to Retirement Benefits, which was included in "Other" under "Deferred tax liabilities" in the previous fiscal year, is listed separately as "Assets Related to Retirement Benefits" for the fiscal year ended March 31, 2024 due to its increased materiality. To reflect this change in presentation, the notes for the fiscal year ended March 31, 2023 have been reclassified. As a result, \(\frac{10,476}{20}\) million included in "Other" under deferred tax liabilities for the prior fiscal year are reclassified as \(\frac{4}{521}\) million in "Assets Related to Retirement Benefits" and \(\frac{4}{9}\),955) million in "Other."

Notes:

- 1. The primary reason for the Increase in valuation allowance for net operating loss carryforwards of overseas subsidiaries for tax purposes and decrease in valuation allowance for the total amount of deductible temporary differences.
- 2. Tax loss carryforwards and deferred tax assets amounts by carryforward periods.

(Millions of yen)

	Within one year	Over 1 but within 2 years	Over 2 but within 3 years	Over 3 but within 4 years	Over 4 but within 5 years	Over 5 years	Total
Tax loss carryforwards (a)	64	36	4,488	513	_	43,881	48,985
Valuation allowance	(64)	(36)	(4,488)	(513)	_	(38,304)	(43,408)
Deferred tax assets	_	_	_	_	_	5,576	5,576

⁽a) Tax loss carryforwards are calculated based on the statutory tax rate.

As of March 31, 2024

(Millions of yen)

	Within one year	Over 1 but within 2 years	Over 2 but within 3 years	Over 3 but within 4 years	Over 4 but within 5 years	Over 5 years	Total
Tax loss carryforwards (a)	36	4,067	524	_	246	54,728	59,604
Valuation allowance	(36)	(3,547)	(524)	_	(246)	(49,514)	(53,870)
Deferred tax assets	_	520	_	_	_	5,213	5,733

- (b) Tax loss carryforwards are calculated based on the statutory tax rate.
- (c) No valuation allowance is recognized for the portion of net operating loss carryforwards for tax purposes that are determined to be recoverable based on estimates of future taxable income and other factors.

2. Reconciliation of the effective tax rate and the statutory tax rate

	As of March 31, 2023	As of March 31, 2024
Statutory tax rate	<u> </u>	30.6%
(Adjustments)		
Entertainment expenses not qualifying for deduction	_	0.7
Dividend income excluded from gross revenue	_	(3.8)
Inhabitant tax per capita, etc.	_	0.7
Increase or decrease in valuation allowance	_	(22.0)
Amortization of goodwill	_	5.8
Equity in gain and loss of affiliates	_	(5.4)
Difference in tax rates of consolidated subsidiaries		2.1
Other		4.6
Effective tax rate after adoption of tax-effect accounting		13.3

Notes have been omitted because the Company recorded a loss before income taxes and minority interests in the fiscal year ended March 31, 2023.

3. Accounting treatment of corporate and local income taxes or tax effect accounting related thereto

The Company and certain domestic subsidiaries adopted the group tax sharing system. The Company follows the "Practical Solution on the Accounting and Disclosure Under the Group Tax Sharing System" (PITF No. 42; August 12, 2021) for accounting treatment and disclosure of corporate income taxes, local corporate income taxes, and tax effect accounting related thereto.

(Asset Retirement Obligations)

Due to its low significance, detailed information regarding asset retirement obligations is not provided, although the Group reports asset retirement obligations.

(Investment and Rental Property)

Due to its low significance, detailed information regarding investment and rental property is not provided, although the Group has rental property and idle land and buildings.

(Revenue Recognition)

- 1. Disaggregation of revenue from contracts with customers

 The disaggregation of revenue from contracts with customers is as presented in "Notes Segment Information."
- 2. Useful information in understanding revenue from contracts with customers
 Useful information in understanding revenue is as presented in "Notes Significant Matters Providing the Basis for the
 Preparation of the Consolidated Financial Statements 4. Significant accounting policies (5) Standards for recognizing
 significant revenue and expenses."
- 3. Useful information on the relationship between the satisfaction of performance obligations according to contracts with customers and cash flows generated from such contracts, and on the amounts and timing of revenue from contracts with existing customers as of the end of the current fiscal year that is expected to be recognized during or after the following fiscal year
 - (1) Balance, etc. of contract assets and contract liabilities

(Millions of yen)

	As of March 31, 2023	As of March 31, 2024
Receivables from contracts with customers (Beginning balance)	245,205	189,128
Receivables from contracts with customers (Ending balance)	189,128	204,990

The balances of contract assets and contract liabilities of the Group are not significant and have not undergone any major fluctuations, and thus statement thereof is omitted. Additionally, there are no significant amounts of revenue recognized in the current fiscal year and the previous fiscal year as a result of performance obligations satisfied (or partially satisfied) in prior periods.

(2) Transaction price allocated to remaining performance obligations

For the current fiscal year and the previous fiscal year, in the sales of finished goods and merchandise in the paper and paperboard business, the daily-life products business and the wood products and construction-related business, there are no significant transactions with an expected term of contract exceeding one year, and in the wholesale, supply, and sales of electrical power in the energy business, revenue is recognized in accordance with Paragraph 19 of the "Implementation Guidance on Accounting Standard for Revenue Recognition," and therefore, statement thereof is omitted.

(Segment Information)

[Segment information]

- 1. Overview of reportable segments
- (1) Method of determining reportable segments

The reportable segments of the Company are defined as individual units, for which independent financial information is available and which are subject to regular review to evaluate their results and decide the allocation of management resources by the Board of Directors of the Company.

The Company recognizes its consolidated subsidiaries as the units that define its business segments because those are used as the main basis to evaluate results. The reportable segments are defined by integrating business segments that exhibit similarities in terms of economic characteristics, markets for products and services, or customers.

(2) Types of products and services of each reportable segment

The principal products and services of each reportable segment are as follows:

Paper and paperboard segment:

Manufacturing and marketing of paper, paperboard, pulp and materials for paper making

Daily-life products segment:

Manufacturing and marketing of household paper, processed paper goods and chemical products

Energy segment:

Generating and marketing of electric power

Wood products and construction-related segment:

Stocking, manufacturing and marketing of lumber and building materials, as well as civil engineering and construction

2. Method used to calculate net sales, income or loss, assets and other items by reportable segments

Accounting methods applied for the reportable segments are the same as those described under "Significant Matters Providing the Basis for the Preparation of the Consolidated Financial Statements."

Income for each reportable segment denotes operating income, and intersegment sales and transfers are based on market prices in general.

3. Net sales, income or loss, assets and other items by reportable segment, and disaggregation of revenue

Fiscal year ended March 31, 2023

(Millions of yen)

		Rej	portable segn	nents					
	Paper and paperboard	Daily-life products	Energy	Wood products and construction- related	Subtotal	Other ¹	Total	Adjustment	Consolidated 4
Net sales Goods transferred at a point in time	563,246	440,059	8,213	62,400	1,073,919	14,739	1,088,659	_	1,088,659
Goods and services transferred over time	_		41,695	6,496	48,192	15,001	63,193	_	63,193
Revenue from contracts with customers	563,246	440,059	49,908	68,896	1,122,111	29,741	1,151,853	_	1,151,853
Revenue from other sources	_	l		_		792	792	_	792
Sales to third parties Intersegment sales an transfers	563,246 11,705	440,059 6,854	49,908 —	68,896 55,148	1,122,111 73,708	30,534 46,887	1,152,645 120,596	— (120,596)	1,152,645 —
Total	574,952	446,913	49,908	124,045	1,195,820	77,421	1,273,242	(120,596)	1,152,645
Segment income (loss)	(29,221)	(7,818)	(1,734)	8,894	(29,880)	2,488	(27,391)		(26,855)
Segment assets	651,570	524,007	109,336	75,821	1,360,734	34,085	1,394,819	271,723	1,666,542
Other items: Depreciation Amortization goodwill	30,105	30,148 1,049	3,870	819 —	64,943 1,049	1,336	66,279 1,049	_	66,279 1,049
Increase in property, plant and equipment and intangible assets	27,263	32,776	24,096	817	84,955	1,016	85,972	_	85,972

Notes: 1. The "Other" category is a business segment that includes the logistics, leisure and other businesses, and is not a reportable segment.

- 2. The segment income (loss) adjustments are due to intersegment elimination, etc.
- 4. Adjustments are made to reconcile segment income (loss) with operating income in the consolidated statements of operations.

(Millions of yen)

								(1711)	mons or yen)
		Rej	oortable segn	nents				,	
	Paper and paperboard	Daily-life products	Energy	Wood products and construction- related	Subtotal	Other ¹	Total	Adjustment	Consolidated 4
Net sales Goods transferred at a point in time	570,174	436,762	2,908	69,039	1,078,885	15,100	1,093,986	_	1,093,986
Goods and services transferred over time	_		50,808	6,471	57,280	15,257	72,537	_	72,537
Revenue from contracts with customers	570,174	436,762	53,717	75,510	1,136,166	30,357	1,166,524	_	1,166,524
Revenue from other sources	_	-	_	_	_	790	790	_	790
Sales to third parties Intersegment sales an transfers	570,174 17,345	436,762 6,983	53,717 —	75,510 66,416	1,136,166 90,745	31,148 45,035	1,167,314 135,780	— (135,780)	1,167,314 —
Total	587,520	443,746	53,717	141,927	1,226,911	76,183	1,303,094	(135,780)	1,167,314
Segment income (loss)	11,685	(8,062)	1,599	9,796	15,018	2,794	17,812	(546)	17,266
Segment assets	663,703	549,893	118,495	82,641	1,414,734	34,471	1,449,206	282,039	1,731,245
Other items: Depreciation	27,296	29,659	4,991	899	62,848	1,336	64,184	_	64,184
Amortization of goodwill	_	1,075	_	_	1,075	_	1,075	_	1,075
Increase in property, plant and equipment and intangible assets		36,305	2,669	1,087	59,665	1,031	60,696	_	60,696

Notes: 1. The "Other" category is a business segment that includes the logistics, leisure and other businesses, and is not a reportable segment.

- 2. The segment income (loss) adjustments are due to intersegment elimination, etc.
- 3. The segment assets adjustment of \(\frac{1}{2}\) 282,039 million includes \(\frac{1}{2}\)(45,826) million of intersegment eliminations for receivables and payables and \(\frac{1}{2}\) 327,865 million of corporate assets that are not allocated to reportable segments. The corporate assets mainly consist of "cash and deposits" for the management of surplus funds, "investments in securities" for long-term investment and "deferred tax assets," which are not allocatable to reportable segments.
- 4. Adjustments are made to reconcile segment income (loss) with operating income in the consolidated statements of operations.

[Related information]

Fiscal year ended March 31, 2023

1. Information by product and service

Information by product and service approximates the information provided in "Segment Information" and is therefore not provided here.

2. Information by geographical area

(1) Net sales

(Millions of yen)

Japan	Oceania	Asia	North America	Others	Total
814,389	163,613	94,598	46,062	33,982	1,152,645

Note: Net sales information is based on the geographical location of customers and categorized by country or region.

(2) Property, plant and equipment

(Millions of yen)

Japan	Oceania	Asia	North America	Others	Total
580,672	157,007	5,724	38,610	14,804	796,820

3. Information by customer

Information by customer is omitted because no single external customer accounts for 10% or more of net sales in the consolidated statements of operations.

Fiscal year ended March 31, 2024

1. Information by product and service

Information by product and service approximates the information provided in "Segment Information" and is therefore not provided here.

2. Information by geographical area

(1) Net sales

(Millions of yen)

Japan	Oceania	Asia	North America	Others	Total
855,226	147,381	86,528	48,247	29,931	1,167,314

Note: 1 Net sales information is based on the geographical location of customers and categorized by country or region.

(2) Property, plant and equipment

(Millions of yen)

Japan	Oceania	Asia	North America	Others	Total
570,241	172,755	5,928	38,272	18,133	805,331

Note: Oceania includes ¥154,512 million for Australia.

3. Information by customer

Information by customer is omitted because no single external customer accounts for 10% or more of net sales in the consolidated statements of operations.

² Oceania includes ¥117,703 million for Australia.

[Impairment loss by reportable segment]

Fiscal year ended March 31, 2023

(Millions of yen)

		Rep	ortable segm	ents					
	Paper and paperboard	Daily-life products	Energy	Wood products and construction -related	Subtotal	Other	Total	Adjustment	Consolidated
Impairment loss on noncurrent assets	3,966	18,081			22,048	_	22,048	_	22,048

Fiscal year ended March 31, 2024

(Millions of ven)

		Reportable segments						Ì	
	Paper and paperboard	Daily-life products	Energy	Wood products and construction -related	Subtotal	Other	Total	Adjustment	Consolidated
Impairment loss on noncurrent assets	26	1,251	_	15	1,293	_	1,293	_	1,293

[Amortization of goodwill and balance of unamortized goodwill by reportable segment]

Fiscal year ended March 31, 2023

(Millions of ven)

		Rep	ortable segm	ents			Total	Adjustment	Total
	Paper and paperboard	Daily-life products	Hnerov	Wood products and construction -related	Subtotal	Other			
Amortization of goodwill	_	1,049			1,049		1,049	_	1,049
Balance of unamortized goodwill at year-end	_	8,259	_	_	8,259	_	8,259	_	8,259

Fiscal year ended March 31, 2024

(Millions of ven)

								(1711)	mons of yen)
		Rep	ortable segm	ents				Adjustment	Total
	Paper and paperboard	Daily-life products	Energy	Wood products and construction -related	Subtotal	Other	Total		
Amortization of goodwill	_	1,075	_		1,075	_	1,075	_	1,075
Balance of unamortized goodwill at year-end	_	7,821	_	_	7,821	_	7,821	_	7,821

[Gain on negative goodwill by reportable segment]

Fiscal year ended March 31, 2023 None applicable.

Fiscal year ended March 31, 2024 None applicable.

[Related party transactions]

- 1. Transactions with related parties
 - (1) Transactions of the Company with related parties

The Company's unconsolidated subsidiaries and affiliates, etc.

Fiscal year ended March 31, 2023 None applicable.

Fiscal year ended March 31, 2024 None applicable.

- (2) Transactions of the Company's consolidated subsidiaries with related parties None applicable.
- 2. Information on the parent company and significant affiliates
 - (1) Information on the parent company None applicable.
 - (2) Financial statements of significant affiliates

Fiscal year ended March 31, 2023

The significant affiliates in the fiscal year ended March 31, 2023 are Lintec Corporation, Phoenix Pulp & Paper Public Company Limited. and DuPont Nippon Paper Papylia Godo Kaisha Summarized aggregate financial statement data of the companies are as follows. Further, the total figures are presented.

	(Millions of yen)
Total current assets	135,413
Total noncurrent assets	218,467
Total current liabilities	54,611
Total long-term liabilities	22,638
Total net assets	276,631
Net sales	240,051
Profit before income taxes	23,917
Profit	19.645

Fiscal year ended March 31, 2024

The significant affiliate in the fiscal year ended March 31, 2024 is Lintec Corporation. Summarized aggregate financial statement data of the company is as follows.

	(Millions of yen)
Total current assets	117,354
Total noncurrent assets	161,052
Total current liabilities	62,797
Total long-term liabilities	24,496
Total net assets	191,113
Net sales	151,637
Profit before income taxes	14,124
Profit	12,025

(Per Share Information)

		(Yen)
	Fiscal year ended	Fiscal year ended
	March 31, 2023	March 31, 2024
Net assets per share	3,415.75	4,062.19
Profit (loss) per share	(436.28)	197.09

- Notes: 1. Diluted profit per share for the fiscal year ended March 31, 2023 is not stated because a loss per share was reported and no potentially dilutive securities were outstanding. Diluted profit per share for the fiscal year ended March 31, 2024 is not stated because no potentially dilutive securities were outstanding.
 - 2. For the purpose of calculating net assets per share and profit (loss) per share, shares of the Company held through the Board Benefit Trust (BBT) are included in the number of treasury stock deducted when calculating the total number of shares outstanding at the end of the fiscal year and the weighted-average number of common shares outstanding during the fiscal year. The number of treasury stock deducted when calculating the total number of shares outstanding at the end of the fiscal year was 156,300 shares as of March 31, 2023 and 288,000 shares as of March 31, 2024. The weighted-average number of treasury stock deducted when calculating the weighted-average number of common shares outstanding during the fiscal year was 159,759 shares in the fiscal year ended March 31, 2023 and 277,914 shares in the fiscal year ended March 31, 2024.
 - 3. The basis for calculation of profit (loss) per share is as follows.

	(Millions of yen unless otherwise stated)		
Item	Fiscal year ended March 31, 2023	Fiscal year ended March 31, 2024	
Profit (loss) attributable to owners of parent	(50,406)	22,747	
Profit (loss) attributable to owners of parent related to common shares	(50,406)	22,747	
Weighted-average number of common shares outstanding (shares)	115,538,852.34	115,415,096.94	