

Priority Issues (materiality) [Climate Change and the Natural Environment] Decarbonization

Under the Group Policy, the Group will promote the reduction of total CO2 emissions throughout the supply chain by promoting energy saving, low-carbon business, utilization of renewable energy in the buildings that we develop in order to resolve issues related to climate change.

# Climate Change and the Natural Environment

# **Group Policy**

Through urban development and providing products and services that leverage property development and property-related services, the Company will contribute to reducing  $CO_2$  emissions to address climate change as a shared international concern. As such, we have identified decarbonization, biodiversity, and circular design as our three priority issues (materiality) and will promote them Company-wide. In addition, the Group has to date been actively participating in international initiatives, from obtaining SBT certification (35% reduction compared to fiscal 2019) and endorsing the TCFD to joining the RE100, and we intend to continue playing an active role in such initiatives.

# **Targets**

Climate Change and natural environment		Contribution to the urgent global issue of reducing $CO_2$ emissions, biodiversity preservation and realization of a circular society that contributes to $CO_2$ reduction
	Decarbonization	Initiatives in "energy saving," "low-carbon business," and "utilization of renewable energy"  SBT: 35% reduction in Scope 1, 2, and 3 by 2031/3 compared to 2020/03
	Biodiversity	By restoring the forest cycle in Japan, contribute to ${\rm CO_2}$ absorption and to the natural environment through urban afforestation and forest preservation, thus enabling rich biodiversity
	Circular design	Contribute to a decarbonized society and a circular economy through urban development and service provision that incorporate longer lives of properties, recycling, and sharing

# Key Performance Indicators (KPIs)

- Reduce CO<sub>2</sub> emissions by 35% compared to 2020/03
- Energy conservation performance indicators in new buildings: Maintain ZEH/ZEB-oriented standards
- Develop timber-based buildings: Carbon storage 10,000 t-CO<sub>2</sub> per year
- Obtain biodiversity certification
- ●Initiatives to promote building longevity: Full implementation of the Group's voluntary standards
- Promote waste reduction and increase recycling rate: Reduction of industrial wastes by 20%

# Management

We are taking measures to improve Group-wide environmental management under the leadership of Nomura Real Estate Holdings president and Group CEO.

The Sustainability Committee, which comprises Nomura Real Estate Holdings and Group company directors and others and is chaired by the Nomura Real Estate Holdings president and Group CEO, deliberates on and decides related policies and action plans. The Sustainability Committee also sets targets and monitors progress for the Group's priority issues: decarbonization, biodiversity, and circular design.

An environmental subcommittee has been established as the Sustainability Committee's subordinate organization under the supervision of the officer responsible for quality management and architectural design. Furthermore, we have signed the UN Global Compact in May 2019. Based on the principles of the UN initiative, we will support a precautionary approach, such as climate change mitigation, to environmental problems, and proactively fulfill our responsibility to address environmental problems.

#### **Environmental Subcommittee**

Consists of members from the architecture and product design-related departments at Nomura Real Estate Development, the environmental technology-related departments at Nomura Real Estate Partners, and the Sustainability Management Department and meets as needed. In fiscal 2021, the group met twice to mainly discuss reducing CO<sub>2</sub> emissions and using renewable energy.

# Decarbonization Approach and Policies Management Targets and Results Initiatives Circular Design Approach and Policies Management Targets and Results Initiatives

# Decarbonization

# Approach and Policies

# **Group Policy (Environment)**

Under the Group Policy, the Group will promote the reduction of total  $CO_2$  emissions throughout the supply chain by promoting energy saving, low-carbon business, utilization of renewable energy in the buildings that we develop in order to resolve issues related to climate change.

# Management

# Management (Environment)

# Targets and Results

#### **Targets**

The Group has set the following three targets to address climate change.

# Target 1. Reduce CO<sub>2</sub> emissions

Long-term target

Achieving carbon neutrality in <u>Scopes 1 and 2 and Scope 3 \*1 across the Group</u>, by 2050

Mid- to long-term target

35% reduction in the Group's total  $CO_2$  emissions in Scopes 1 and 2, and Scope 3 (Categories 1 and 11) \*2 by 2030 from the fiscal 2019 baseline (approved by the Science Based Targets initiative (SBTi) in November 2020)

#### Short-term target

15% reduction in the Group's total  $CO_2$  emissions in <u>Scopes 1 and 2</u>, and <u>Scope 3 (Categories 1 and 11)</u> by 2025 from the fiscal 2019 baseline.

- \*1 Scope 1: Direct emissions from fuel combustion, etc., Scope 2: Indirect emissions associated with use of electricity and heat purchased by the Company, Scope 3: Indirect emissions other than those in Scopes 1 and 2
- %2 In Scope 3, Category 1 (emissions from construction of buildings, etc.) and Category 11 (emissions from use of sold products, etc.) are targeted, which cover approximately 88.45% of the Scope 3 emissions recorded in fiscal 2020.
- ☐ Key performance indicators (KPIs) for priority issues (materiality) up to 2030

#### **Target 2. Reduce Energy Use**

Mid- to long-term target

The power consumption in the Group will be 100% renewable electricity by 2050. (joined RE100 in January 2022)

Short-term target

Switching electricity consumed by all leasing properties\* owned by Nomura Real Estate Development to renewable electricity by fiscal 2023.

Excludes leasing properties (including the portion used by tenants) for which Nomura Real Estate Development has
concluded direct electricity supply contracts with power companies, properties that Nomura Real Estate Development
owns units in or are jointly owned with other parties, and properties planned to be sold or demolished, as well as the
common use areas of some rental housing.

#### **Target 3. Promote Solar Power Generation**

#### **Results**

# Result 1. Reduce CO<sub>2</sub> emissions

Scopes 1 and 2 (Nomura Real Estate Group)

(Unit: t-CO<sub>2</sub>)

	FY2018	FY2019	FY2020	FY2021
Scope1	24,018	23,627	20,119	21,542
Scope2	136,569	126,960	112,087	107,514
Scope1+2	160,586	150,588	132,206	129,056
Scope1+2 Intensity(kg- CO <sub>2</sub> /m² per year)	80.70	74.06	63.56	61.93

<sup>FY2018 data covers 190 facilities with a gross floor area of 1,989,974 m²; for FY2019, FY2020, and FY2021 data, refer to Scopes 1 and 2 Gross Floor Area by Use and Number of facilities aggregated for Scopes 1 and 2.</sup> 

# Scopes 1 and 2 Gross Floor Area by Use

	FY2019	FY2020	FY2021
Total (m²)	2,033,422	2,079,952	2,058,781
O ces	1,423,113	1,447,598	1,456,228
Fitness facilities	127,295	130,130	130,130
Commercial facilities	347,445	362,504	361,993
Hotels	64,469	68,620	41,109
Logistics facilities	49,547	49,547	49,547
Parking lots	17,141	17,141	15,422
Training centers	654	654	654
Heating and cooling center	3,758	3,758	3,758

# Number of facilities aggregated for Scopes 1 and 2

	FY2019	FY2020	FY2021
Total (buildings)	183	191	181
O ces	104	110	101
Fitness facilities	45	48	48
Commercial facilities	15	13	16
Hotels	12	13	10
Logistics facilities	1	1	1
Parking lots	4	4	1
Training centers	1	1	1
Heating and cooling center	1	1	1

# Scope 3 (Nomura Real Estate Group)

(Unit∶t-CO<sub>2</sub>)

Cat	egory	FY2019	FY2020	FY2021
1	Products and services purchased	969,704	453,707	702,271
2	Capital goods	71,164	97,862	159,373
3	Fuel- and energy-related activities that are not included in Scopes 1 and 2	27,473	24,854	24,358
4	Transportation and delivery (upstream)	4,081	3,164	4,465
5	Waste generated by businesses	6,858	5,317	7,503

6	Business trips	1,421	936	963
7	Employers' commuting	2,395	2,409	1,917
8	Lease assets (upstream)	-	-	-
9	Transportation and delivery (downstream)	-	-	-
10	Processing of products sold	-	-	-
11	Use of products sold	2,203,005	834,184	1,214,723
12	Disposal of products sold	62,603	19,605	38,859
13	Lease assets (downstream)	19,011	14,025	13,539
14	Franchise	-	-	-
15	Investments	-	-	-
Tota	al	3,367,714	1,456,063	2,167,970

 $<sup>\,\,</sup>$  Calculation for Category 8 is included in Scopes 1 and 2.

# **Result 2. Reduce Energy Use**

Energy Consumption Performance (Nomura Real Estate Group)

	FY2018	FY2019	FY2020	FY2021
Energy consumption (MWh/year)	445,772	422,490	381,817	379,428
Energy consumption intensity (MWh/m² per year)	0.224	0.208	0.184	0.182

# **Energy Consumption by Facility Type**

	FY2019	FY2020	FY2021
Total (m²)	-	-	379,428
O ces	-	-	189,086
Fitness facilities	-	-	74,705
Commercial facilities	-	-	74,607
Hotels	-	-	9,904
Logistics facilities	-	-	2,360
Parking lots	-	-	198
Training centers	-	-	52
Heating and cooling center	-	-	28,516

<sup>\*</sup> Categories with no figures indicate that emission sources do not exist.

 $<sup>\,\,</sup>$  The change in energy consumption in 2021 from the previous year was -0.63%.

	FY2019	FY2020	FY2021
Purchased electricity	255,089	228,825	220,740
City gas	116,068	108,034	116,840
LPG	507	183	436
Class A heavy oil	2,546	1,401	1,303
Gasoline	2,156	0	0
Light oil	0	0	4
Kerosene	5,089	3,544	2,779
Heat			-
Steam	16,552	18,555	18,119
Cold water	24,482	21,275	19,208
Renewable energy (in-house power generation)	1,000	1,818	7,882

# Renewable Energy Consumption

	FY2019	FY2020	FY2021
Total (MWh)	1,000	1,818	7,882
O ces	1,000	1,000	6,230
Fitness facilities	-	-	-
Commercial facilities	-	406	975
Hotels	-	413	677
Logistics facilities	-	-	-
Parking lots	-	-	-
Training centers	-	-	-
Heating and cooling center	-	-	-

<sup>\*</sup> For FY2019, FY2020, and FY2021 data, refer to Scopes 1 and 2 gross floor area by use and number of facilities aggregated for Scopes 1 and 2.

#### **Result 3. Promote Solar Power Generation**

Solar Power Generating Facility Installation Rate and Electric Power Generated at Landport Logistics Facilities

	FY2018	FY2019	FY2020	FY2021
Solar power generating facility installation rate at Landport logistics facilities (%)	92.9	94.7	90.0	76.0
Electric power generated at Landport logistics facilities (million kWh/year)	12,081	15,194	21,926	22,801

# **Initiatives**

# Joining RE100

Nomura Real Estate Holdings, Inc. joined RE100, a global initiative leading the transition to 100% renewable electricity in January 2022.

# Approved by Science Based Targets initiative (SBTi)

Nomura Real Estate Holdings, Inc.'s CO₂ emissions reduction targets were approved by the SBTi on November 24, 2020.



# Agreed to Recommendations Made by the Task Force on Climate related Financial Disclosures (TCFD)

Nomura Real Estate Holdings, Inc. and Nomura Real Estate
Asset Management Co., Ltd. are fully aware that the
substantial impact of climate change on their business
continuity is a major management issue, and they
therefore agreed to recommendations made by the Task
Force on Climate-related Financial Disclosures (TCFD) in
order to further promote their initiatives.



# Business Strategies for Decarbonization

To achieve its <u>Scope 1, 2, and 3 reduction targets</u>, the Group is promoting energy saving, low-carbon business, utilization of renewable energy.

Group's Initiatives to Reduce CO<sub>2</sub> Emissions

	Initiatives
Emissions in own business operations (Scope 1, 2)	Use of electricity with non-fossil certificates, use of renewable energy in owned assets, initiate/consider renewable energy projects such as in-house renewable power generation
Emissions in the construction stage (Scope 3, category 1)	Use of timber, which is regarded as low-carbon building material
Emissions from customers (Scope 3, category 11)	Establishment of energy conservation performance standards for new buildings completed before FY2029 (based on energy conservation performance (BEI) indicators)

# Net Zero Energy House Initiatives

The Group is developing net zero energy house (ZEH)\* in condominiums from the perspective of comprehensive environment impact reduction. In fiscal 2021, PROUD Musashi-Shinjo Station Marks was selected as a Super High-Rise ZEH-M Demonstration Project of the Ministry of the Environment, Trade and Industry. Also, in fiscal 2022, the Aobadai 2-Chome Project (tentative name) was selected as a

Ministry of the Environment High-Rise ZEH-M Support Project. Looking ahead, we plan to adopt ZEH- and ZEB-oriented standards for all new buildings by 2030. We will also launch initiatives for adopting the same standards to detached housing from fiscal 2022.

# Net Zero Energy House\*: Dissemination Result and Future Target

Result for FY2020/FY2021	Result for FY2022	Target for FY2025
0%	25%	50% or more in all detached houses

<sup>\*\*</sup> Housing designed to achieve a net zero annual primary energy consumption by greatly improving the insulation performance of the building envelope by installing highly efficient facilities and equipment to maintain the quality of the indoor environment while substantially reducing energy consumption and then introducing renewable energy.

#### ☐ ZEH Condominium Initiatives (Japanese only)

# "Yukai-full" Enables Condominiums to Reduce CO<sub>2</sub> Emissions

Nomura Real Estate Development developed an air-conditioning system, "Yukai-full", that makes it possible to reduce  $CO_2$  emissions and realize a healthy and comfortable life, and has installed it in more than 1,000 units.

Yukai full was selected as one of the best 100 products in the 2020 Good Design Awards in recognition of its simple air conditioning system and technology that combines temperature control with standardized comfort.

☐ News Release (Japanese only)

#### Environmental Performance Assessments During Product Planning and Design

The Group provides products and services that address climate change in accordance with the Design and Construction Standards and the Quality Manual. Thermal insulation performance rating of level 4 (the highest level)\*, double-glazed windows (end panel eco-glass), LED lighting fixtures, and other features are set as standard specifications for PROUD condominiums, and Environmental and Product Planning Sheets are used to improve the environmental performance.

\* Thermal insulation performance rating: A housing performance evaluation system pursuant to the Housing Quality Assurance Act. Levels indicate performance in the thermal environment.

☐ Assessment of Environmental Performance in Condominiums

#### Helping Customers to Save Energy

The Group not only strives to reduce CO₂ emissions from buildings, but also helps condominium residents and tenant companies to save energy.

Specifically, the Group provides a system that calculates total energy consumption and a system that makes it possible to visualize the amount of energy used, realizes energy savings using the enecoQ system, and provides eco-information via a member newsletter.

#### **Smart Community Collaboration and Cooperation**

Nomura Real Estate Development has entered into an agreement regarding smart community collaboration on Proud City Hiyoshi with Kanden Realty & Development, Panasonic Homes, Kansai Electric Power and Tokyo Gas. In this project, we are able to reduce CO<sub>2</sub> emissions and supply electric power during disasters by implementing the energy management in the entire area.



Proud City Hiyoshi (rendered image)

# Reduction of Chlorofluorocarbons

To reduce the usage of ozone layer depleting chlorofluorocarbons, the Group established a quality manual that requires the use of chlorofluorocarbon-free insulation and air conditioner refrigerants. Construction partners are also required to submit a Quality Control Check Sheet during construction to confirm that only chlorofluorocarbon-free materials are used.

#### Use of Renewable Energy in Logistics Facilities

The Group is promoting renewable energy utilization through the solar power generation business. As of March 2022, solar panels were installed on a total of 19 buildings at Landport logistics facilities, with annual output of 22,801 MWh per year for the entire portfolio.

In addition, each hotel of the Nomura Real Estate Group (NOHGA HOTEL UENO TOKYO, NOHGA HOTEL AKIHABARA TOKYO, and HOTEL NIWA TOKYO) has acquired the Eco Mark certification from the Eco Mark Office and is promoting the use of green power by procuring all of its electricity from renewable energy sources.

Global Environmental Initiatives of NOHGA HOTEL UENO TOKYO







NOHGA HOTEL UENO TOKYO

# Solar Power Generation in Detached Housing in the Tokyo Metropolitan Area

Nomura Real Estate Development, in collaboration with TEPCO Energy Partner, has decided to launch a Virtual Mega Solar project in May 2022 to install solar power generation capability at the same scale as mega solar power generation (total output 1,000 kW) in the PROUD SEASON (detached housing). This is the first initiative in Japan to introduce solar power generation with a total output of 1 MWh to detached houses for sale in the Tokyo metropolitan area (300 houses per year on the roof of PROUD SEASON houses), and the two companies will promote this as an initiative for localized generation and consumption of electric power, to conserve and generate energy in the Tokyo metropolitan area, where there are few areas of fallow land to be utilized.



Conceptual image of Virtual Mega Solar

#### Participation in Initiatives Related to Climate Change

The Group has taken part in international initiatives related to climate change and frameworks of industry associations, and is actively working to address climate change.

# The UN Global Compact

The Group signed the UN Global Compact in May 2019. Based on the principles of the UN Global Compact initiative, we will support a precautionary approach, such as climate change mitigation, to environmental problems, and proactively fulfill our responsibility to address environmental problems.

# Endorsement of the Voluntary Action Plan on the Environment for the Real Estate Industry, formulated by the Real Estate Companies Association of Japan

In accordance with the voluntary action plan on the environment established by the Real Estate Companies Association of Japan, the Group endorsed the environmental targets in the real estate industry, and it promotes measures to respond to climate change by working to achieve CO<sub>2</sub> emissions reductions that exceed the statutory required standards.

# Independent Third-Party Assurance Report

We have asked Lloyd's Register Quality Assurance Ltd. (hereinafter LRQA) to provide assurance on the environmental data.

Please refer to the following Independent Assurance Statement for detail.