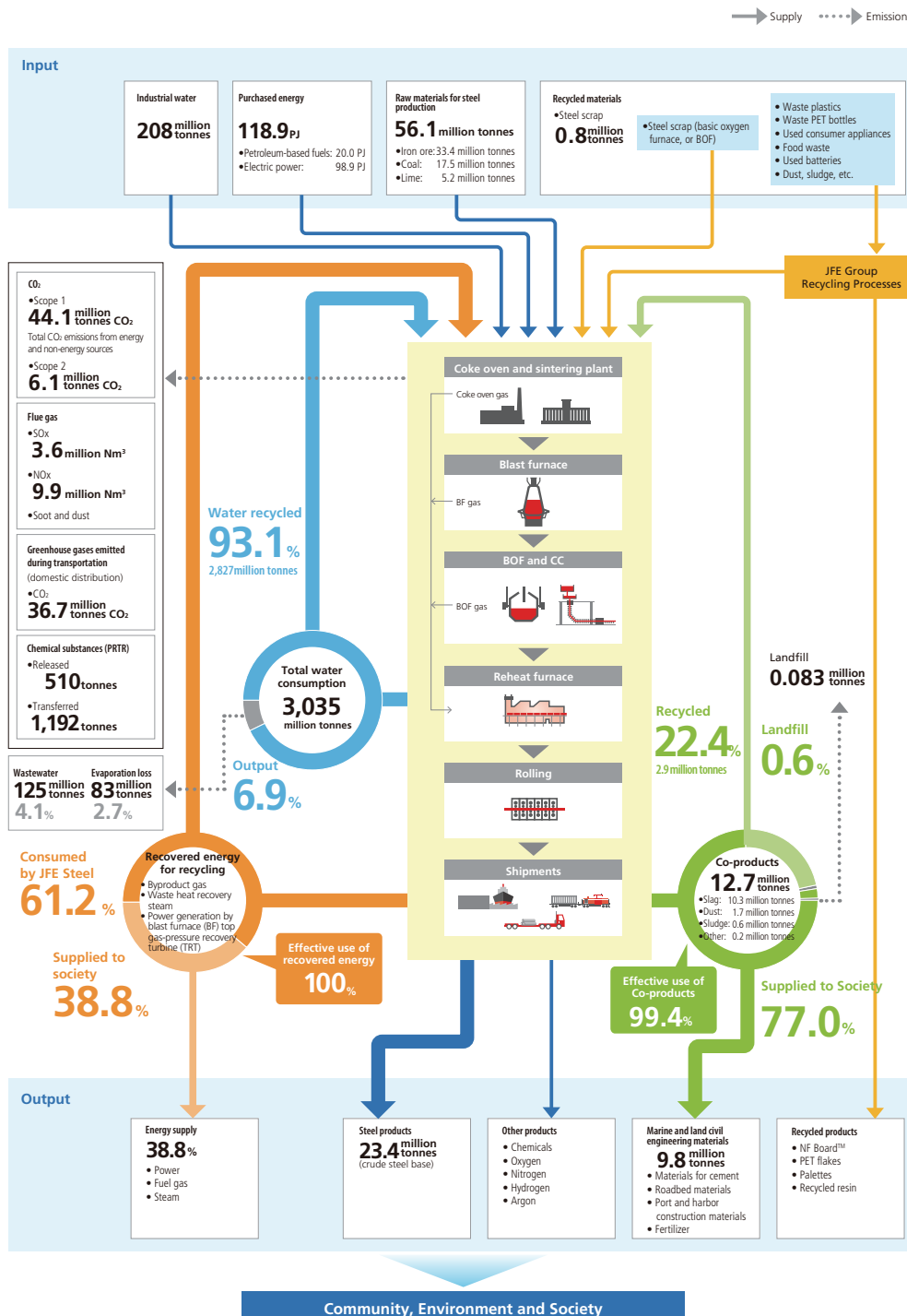


# Environmental Data

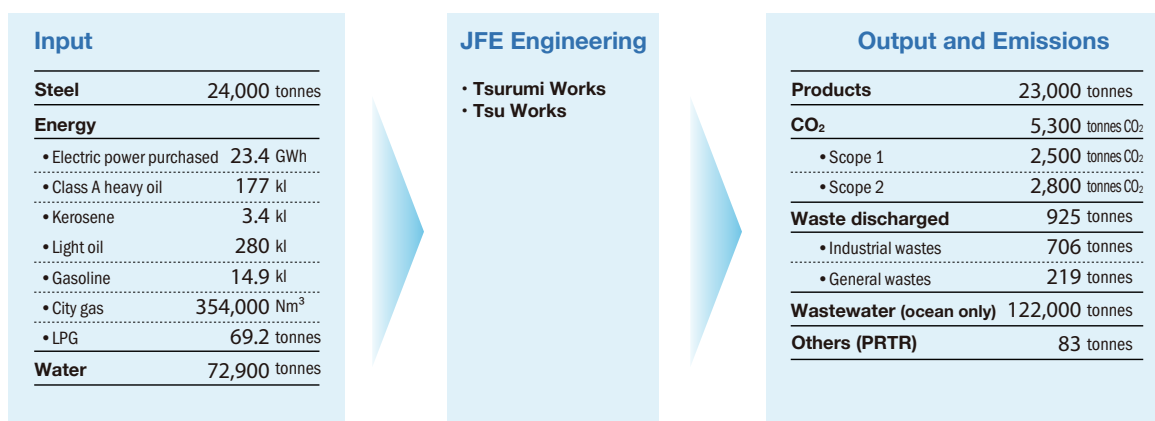
## Material Flow

JFE Steel works to reduce the environmental impact of its iron and steelmaking processes, including through the effective use of resources. The company recycles 93.1% of the water it uses for production and uses 99.4% of its co-products, such as iron and steelmaking slag. In addition, 100% of co-product gas generated during production is reused as fuel for reheating slabs, generating power for internal use and supplying power to the public.

### JFE Steel's Material Flow (Non-Consolidated)



### JFE Engineering's Material Flow (Head Office and Works)



Abbreviations indicated under "scope" represent the following group or company:  
 JFE Group [All]; JFE Steel Group [ST Gr]; JFE Steel [ST]; JFE Engineering Group [EN Gr];  
 JFE Engineering [EN]; JFE Shoji Group [SH Gr]; JFE Shoji [SH]

## Environmental Indicators

Area	Operating company	Target	FY2023 results and related pages
Greenhouse Gas and Energy	ST	<ul style="list-style-type: none"> <li>Reduce CO<sub>2</sub> emissions by 18% from FY2013 levels by the end of FY2024</li> </ul>	PP.237-238
	EN	<ul style="list-style-type: none"> <li>Reduce CO<sub>2</sub> emissions in its own plants and offices FY2024: 40% reduction from FY2013 levels</li> <li>Contribute to reduction in CO<sub>2</sub> emissions (FY2023): 11.5 million tons per year</li> </ul>	PP.237-238,240
	SH	<ul style="list-style-type: none"> <li>Reduce CO<sub>2</sub> emissions through the procurement of electricity derived from renewable energy</li> <li>FY2022 domestic CO<sub>2</sub> emissions: Reduce by 10% from FY2019 levels (reduce by 5% per year from FY2019 levels from FY2021 to FY2024)</li> </ul>	P.237-238
Chemical Substances	ST	<ul style="list-style-type: none"> <li>VOC emissions: -30% from FY2000 (1,078 t or less)</li> <li>Benzene emissions: -80% from FY1999 (46 t or less)</li> <li>Dichloromethane emissions: -40% from FY1999 (46 t or less)</li> </ul>	P.244
Resource Use	ST	<ul style="list-style-type: none"> <li>Recycling rate of co-products: 99% or higher</li> </ul>	P.246
	EN	Recycling rate at construction sites <ul style="list-style-type: none"> <li>Recycling rate of rubble: 99.5% or higher</li> <li>Recycling rate of sludge: 95.0% or higher</li> <li>Recycling rate of industrial waste: 85.0% or higher</li> <li>Recycling rate of office recyclable waste</li> <li>Yokohama head office: 98.0% or higher</li> </ul>	PP.247-248
	SH	Global recycling of steel scrap <ul style="list-style-type: none"> <li>Exceed FY2020 scrap trade volume (FY2024 target: +5% from FY2020)</li> </ul>	P.246
Water Use	ST	<ul style="list-style-type: none"> <li>Maintain efficient use of water</li> <li>Recirculated water usage rate: 90% or higher</li> </ul>	P.249

## Greenhouse Gas and Energy

### CO<sub>2</sub> Emissions by Scope

Items	Scope	Unit	FY2019	FY2020	FY2021	FY2022	FY2023	
Scopes 1 and 2 total*1*2	All	million t-CO <sub>2</sub>	60.4	53.1	59.0	56.1	54.7	
	ST Gr	million t-CO <sub>2</sub>	60.0	52.6	58.6	55.7	54.2	
	ST	million t-CO <sub>2</sub>	56.0	49.1	54.7	52.3	50.1	
	ST subsidiaries	million t-CO <sub>2</sub>	3.9	3.5	3.9	3.4	4.1	
	EN Gr	million t-CO <sub>2</sub>	0.403	0.484	0.387	0.422	0.482	
	EN	million t-CO <sub>2</sub>	0.0168	0.0141	0.0103	0.0081	0.0081	
	EN subsidiaries	million t-CO <sub>2</sub>	0.386	0.470	0.377	0.414	0.474	
	SH Gr	million t-CO <sub>2</sub>	0.0353	0.0296	0.0319	0.0316	0.0311	
	SH	million t-CO <sub>2</sub>	0.0005	0.0004	0.0004	0.0004	0.0004	
	SH subsidiaries	million t-CO <sub>2</sub>	0.0348	0.0292	0.0315	0.0311	0.0307	
	Scope1*3*4	All	million t-CO <sub>2</sub>	52.9	46.6	51.9	49.0	47.4
		ST Gr	million t-CO <sub>2</sub>	52.5	46.2	51.5	48.6	47.0
ST		million t-CO <sub>2</sub>	49.8	43.8	48.8	46.4	44.1	
ST subsidiaries		million t-CO <sub>2</sub>	2.7	2.4	2.7	2.2	2.9	
EN Gr		million t-CO <sub>2</sub>	0.361	0.442	0.345	0.395	0.459	
EN		million t-CO <sub>2</sub>	0.0038	0.0024	0.0024	0.0029	0.0038	
EN subsidiaries		million t-CO <sub>2</sub>	0.357	0.439	0.343	0.393	0.455	

Items	Scope	Unit	FY2019	FY2020	FY2021	FY2022	FY2023
Scope2*6	All	million t-CO <sub>2</sub>	7.6	6.4	7.1	7.1	7.3
	ST Gr	million t-CO <sub>2</sub>	7.5	6.4	7.0	7.1* <sup>5</sup>	7.3
	ST	million t-CO <sub>2</sub>	6.3	5.3	5.8	5.9	6.1
	ST subsidiaries	million t-CO <sub>2</sub>	1.2	1.1	1.2	1.1* <sup>5</sup>	1.2
	EN Gr	million t-CO <sub>2</sub>	0.0422	0.0424	0.0418	0.0263	0.0232
	EN	million t-CO <sub>2</sub>	0.0129	0.0116	0.0079	0.0052	0.0043
	EN subsidiaries	million t-CO <sub>2</sub>	0.0293	0.0308	0.0339	0.0211	0.0189
	SH Gr	million t-CO <sub>2</sub>	0.0353	0.0296	0.0319	0.0316	0.0311
	SH	million t-CO <sub>2</sub>	0.0005	0.0004	0.0004	0.0004	0.0004
	SH subsidiaries	million t-CO <sub>2</sub>	0.0348	0.0292	0.0315	0.0311	0.0307
Unit CO <sub>2</sub> emissions (numerator: Scopes 1 and 2 total; denominator: sales)	All	t-CO <sub>2</sub> /billion yen	1,619	1,644	1,352	1,057	1,057
Scope3*7*8	All	thousand t-CO <sub>2</sub> e	16,382	14,369	20,778	23,184	22,701
Category 1 Purchased goods and services	All	thousand t-CO <sub>2</sub> e	12,557	11,026	17,244	19,750	19,118
Category 2 Capital goods	All	thousand t-CO <sub>2</sub> e	1,401	1,226	1,221	1,166	1,239
Category 3 Fuel and energy related activities not included in Scopes 1 or 2	All	thousand t-CO <sub>2</sub> e	728	671	717	736	760
Category 4 Upstream transportation and delivery	All	thousand t-CO <sub>2</sub> e	489	419	454	450	440
Category 5 Waste generated in operations	All	thousand t-CO <sub>2</sub> e	57	45	58	62	133
Category 6 Business travel	All	thousand t-CO <sub>2</sub> e	4	4	5	4	5
Category 7 Employee commuting	All	thousand t-CO <sub>2</sub> e	49	51	59	49	14
Category 15 Investments	All	thousand t-CO <sub>2</sub> e	1,097	927	1,022	967	993

- \*1 Data cover 75 companies
  - JFE Steel and 26 major domestic and overseas subsidiaries
  - JFE Engineering and 11 major domestic and overseas subsidiaries
  - JFE Shoji and 35 major domestic and overseas subsidiaries.
- \*2 Starting with FY2021, figure includes data for an expanded list of JFE Steel, JFE Engineering, and JFE Shoji subsidiaries.
- \*3 Data for JFE Steel include CO<sub>2</sub> emissions from non-energy sources.
- \*4 Data for 3 JFE Steel major domestic subsidiary and a JFE Engineering major domestic subsidiary include CO<sub>2</sub> emissions from non-energy sources.
- \*5 Emission factors for overseas subsidiaries have been revised.
- \*6 CO<sub>2</sub> emission factors for purchased electricity in FY2023:
  - JFE Steel uses the emission factors of the Carbon Neutrality Action Plan of the Japan Iron and Steel Federation for energy purchased in FY2022.
  - JFE Steel's domestic consolidated subsidiaries, the JFE Engineering Group, and the JFE Shoji Group apply the adjusted emission factors of each electric power company for each fiscal year.
  - Overseas: Latest IEA emission factors
- \*7 Coverage:
  - (Categories 1, 2, 3, 4, 5) JFE Steel, 21 JFE Steel major domestic subsidiaries, JFE Engineering, 1 JFE Engineering major domestic subsidiary, and JFE Shoji
  - (Category 6, 7) JFE Steel, 21 JFE Steel major domestic subsidiaries, JFE Engineering, 12 JFE Engineering major domestic and overseas subsidiaries, and JFE Shoji
  - (Category 15) Japan Marine United, and 10 JFE Steel equity-method affiliates (7 domestic and 3 overseas)
- \*8 Sources: Green Value Chain Platform (Ministry of the Environment) and others

**Other Greenhouse Gas**

Items		Scope	Unit	FY2019	FY2020	FY2021	FY2022	FY2023
CO <sub>2</sub> emissions from energy sources	CO <sub>2</sub> emissions (Scopes 1 and 2 total)	ST Gr	million t-CO <sub>2</sub>	57.4	50.2	55.8	53.1	51.7
		ST	million t-CO <sub>2</sub>	54.2	47.3	52.6	50.4	48.3
		ST subsidiaries	million t-CO <sub>2</sub>	3.2	2.9	3.2	2.7	3.4
		EN Gr*1*2	thousand t-CO <sub>2</sub>	67.5	62.5	61.4	45.2	36.3
	Scope1	ST	million t-CO <sub>2</sub>	47.9	41.9	46.8	44.5	42.3
	Unit: CO <sub>2</sub> emissions (denominator: crude steel production)	ST	t-CO <sub>2</sub> /t-steel	2.03	2.08	2.03	2.09	2.06
CO <sub>2</sub> emissions from non-energy sources		ST Gr*3	million t-CO <sub>2</sub>	2.65	2.40	2.74	2.59	2.48
		ST	million t-CO <sub>2</sub>	1.89	1.82	2.05	1.93	1.79
		ST subsidiaries	million t-CO <sub>2</sub>	0.76	0.58	0.69	0.66	0.69
		EN subsidiaries*4	million t-CO <sub>2</sub>	0.34	0.42	0.33	0.38	0.45

Items	Scope	Unit	FY2019	FY2020	FY2021	FY2022	FY2023	
GHG emissions other than CO <sub>2</sub>	All	thousand t-CO <sub>2</sub> e	103.3	96.1	103.0	55.2	117.9	
	Methane (CH <sub>4</sub> )	ST Gr	thousand t-CO <sub>2</sub> e	72.9	68.3	74.6	35.4	78.5
		ST	thousand t-CO <sub>2</sub> e	72.9	68.3	74.6	35.4	78.5
		ST subsidiaries	thousand t-CO <sub>2</sub> e	—	—	0.005	0.005	0.005
	N <sub>2</sub> O	All	thousand t-CO <sub>2</sub> e	30.4	27.9	28.5	19.8	39.4
		ST Gr	thousand t-CO <sub>2</sub> e	20.0	15.5	17.7	7.8	37.1
		ST	thousand t-CO <sub>2</sub> e	20.0	15.5	17.7	7.8	37.1
		ST subsidiaries	thousand t-CO <sub>2</sub> e	—	—	0.004	0.004	0.004
		EN subsidiaries* <sup>4</sup>	thousand t-CO <sub>2</sub> e	10.4	12.4	10.8	12.0	2.3
	GHG emitted during transportation* <sup>5</sup>	ST Gr	million t-CO <sub>2</sub>	0.65	0.57	0.63	0.61	0.59
ST		million t-CO <sub>2</sub>	0.40	0.34	0.38	0.37	0.37	
ST subsidiaries		million t-CO <sub>2</sub>	0.25	0.23	0.25	0.24	0.22	
Contribution to CO <sub>2</sub> emission reductions* <sup>6</sup>	EN Gr	million t-CO <sub>2</sub> /year	4.13	9.65	10.57	11.14	11.53	
	Biomass power generation	million t-CO <sub>2</sub> /year	2.12	2,74	2.86	2.94	2.95	
	Waste power generation	million t-CO <sub>2</sub> /year	1.53	3.37	3.40	3.72	3.80	
	Others* <sup>7</sup>	million t-CO <sub>2</sub> /year	0.48	3.54	3.57	3.59	3.84	
	Recycling (Includes fluorocarbon recovery and energy creation)	million t-CO <sub>2</sub> /year	—	—	0.74	0.89	0.94	

\*1 Data cover JFE Engineering and 11 major domestic and overseas subsidiaries.

\*2 Starting with FY2021, expanded coverage of major subsidiaries for JFE Engineering.

\*3 Data cover JFE Steel and 3 major domestic subsidiaries.

\*4 J&T Recycling Co. is a domestic subsidiary of JFE Engineering.

\*5 Data cover JFE Steel and 9 major domestic subsidiaries, which are specified consigners designated under the Japanese Energy Saving Act.

\*6 Coverage:

- Up to FY2019, only JFE Engineering's domestic business is covered

- FY2020 data cover JFE Engineering's domestic and overseas businesses and its German subsidiary Standardkessel Baumgarte GmbH (SBG)

- From FY2021, JFE Engineering's domestic and overseas businesses, J&T Recycling Corporation, JFE Urban Recycle Corporation, and German subsidiary Standardkessel Baumgarte GmbH (SBG) are covered

\*7 Coverage: Others (digestion gas, geothermal, solar power, wind, waste heat recovery, fuel conversion, energy services, logistics products)

### Energy Consumption

Items		Scope	Unit	FY2019	FY2020	FY2021	FY2022	FY2023
Energy consumption and unit energy consumption	Energy consumption	All	PJ	670	592	654	627	612
		ST Gr	PJ	669	591	652	625	611
		ST	PJ	620	545	602	581	557
		ST subsidiaries	PJ	48.8	45.2	49.6	43.9	53.9
		EN Gr	PJ	1.3	1.2	1.3	1.2	1.2
		SH Gr	PJ	0.6	0.6	0.7	0.7	0.7
	Unit energy consumption (crude steel production)	ST	GJ/t-steel	23.2	24.0	23.3	24.1	23.7
	Energy consumption (Crude petroleum equivalent)	EN	kl	8,788	8,000	7,636	7,772	7,756
	YOY ratio of unit energy consumption	EN	%	80.7	91.0	95.5	107.9	94.3
	Recovered energy for recycling	Supplied to society	ST	%	39	38	38	37
Consumed internally		ST	%	61	62	62	63	61

### Modal Shift

Items		Scope	Unit	FY2019	FY2020	FY2021	FY2022	FY2023
All transportation	Ship and rail	ST	%	59.6	58.4	58.3	59.0	57.9
	Truck	ST	%	40.4	41.6	41.7	41.0	42.1
Transportation of a distance of 500 km or more	Ship and rail	ST	%	90.9	91.6	90.0	92.1	93.6
	Truck	ST	%	9.1	8.4	10.0	7.9	6.4

Scope of calculation: All products and half-finished products transported in Japan

## Greenhouse Gas and Energy (Supplementary Data)

### ■ CO<sub>2</sub> Emissions and Energy Consumption of JFE Steel Group Subsidiaries (FY2023)

Company name	CO <sub>2</sub> emissions (unit: thousand t-CO <sub>2</sub> )	Energy consumption (unit: PJ)
JFE Mineral & Alloy Company, Ltd.*	1,724.7	9.83
JFE Bars & Shapes Corporation	533.3	9.39
JFE Chemical Corp.	224.8	4.15
JFE LOGISTICS CORPORATION	151.3	2.26
JFE Galvanizing & Coating Co., Ltd.	48.3	1.01
JFE Plastic Resource Corporation	20.0	0.37
MIZUSHIMA RIVERMENT CORP.	8.1	0.11
JFE Container Co., Ltd.	9.6	0.19
J-Logitech Co., Ltd.	7.6	0.11
Galvatex Corporation	3.7	0.08
JFE Metal Products & Engineering Inc.	8.6	0.16
JFE Welded Pipe Manufacturing Co., Ltd.	8.3	0.15
JFE Techno-wire Corporation	3.7	0.08
JFE PRECISION CORPORATION	3.5	0.07
K-PLASHEET CORPORATION	4.7	0.07
JFE LIFE CORPORATION	5.6	0.10
CHIBA RIVERMENT AND CEMENT CORP.	6.0	0.12
JFE Steel Pipe Co., Ltd.	2.7	0.06
GECOSS CORPORATION	3.2	0.06
JFE Kozai Corporation	3.1	0.06
JFE Ferrite Corporation	3.6	0.05
5 overseas companies	1,288.0	16.38
Total	4,072.5	44.86

\* Data for Mineral & Alloy Company, Ltd. since FY2021 has included CO<sub>2</sub> emissions from Mizushima Ferroalloy Co., Ltd. and JFE Material Co., Ltd., which merged into JFE Mineral & Alloy Company in April 2022.



**CO<sub>2</sub> Emissions from Energy Sources and Energy Consumption of JFE Engineering Group Subsidiaries (FY2023)**

Company name	CO <sub>2</sub> emissions (unit: thousand t-CO <sub>2</sub> )	Energy consumption (unit: PJ)
J&T Recycling Corporation	38.5	0.8
Fujikako, Inc.	1.7	0.030
NORTHERN JAPAN MACHINERY Corporation	0.9	0.015
TOHOKU DOCK TEKKO CO., LTD.	0.8	0.014
Asuka Soken Co., Ltd.	0.8	0.012
JFE Pipeline Engineering Corporation	0.5	0.007
JFE Technos Corporation	0.1	0.002
JFE Project One Co., Ltd.	0.1	0.002
J&M Steel Solutions Company Limited	0.4	0.008
Total	43.9	0.893

\* CO<sub>2</sub> emissions data of J Farm Corporation has been included in the data of JFE Engineering Corporation from the FY2023 results.

\* CO<sub>2</sub> emissions data of JFE Environmental Service Corporation has been included in the data of J&T Recycling Corporation from the FY2023 results.

**Chemical substances**

**Air Emissions**

Items	Scope	Unit	FY2019	FY2020	FY2021	FY2022	FY2023
SOx emissions* <sup>1</sup>	ST Gr	million Nm <sup>3</sup>	4.3	3.3	3.5	3.3	3.6
	ST	million Nm <sup>3</sup>	4.3	3.3	3.5	3.3	3.6
	ST subsidiaries	million Nm <sup>3</sup>	0.04	0.03	0.03	0.04	0.04
NOx emissions* <sup>2</sup>	ST Gr	million Nm <sup>3</sup>	11.3	10.4	11.4	10.2	10.1
	ST	million Nm <sup>3</sup>	11.1	10.3	11.2	10.1	9.9
	ST subsidiaries	million Nm <sup>3</sup>	0.17	0.14	0.18	0.15	0.16

\*1 11 JFE Steel consolidated subsidiaries in Japan.

\*2 11 JFE Steel consolidated subsidiaries in Japan.

**Release to Waterways**

Items	Scope	Unit	FY2019	FY2020	FY2021	FY2022	FY2023
COD (chemical oxygen demand)	All* <sup>1</sup>	t/day	3.4	3.1	3.1	3.1	2.6
	ST	t/day	3.2	2.9	2.9	2.8	2.3
	ST subsidiaries	t/day	0.15	0.17	0.23	0.25	0.27
	EN* <sup>2</sup>	kg/day	8.4	8.7	8.4	6.6	4.8

\*1 Coverage:

- JFE Steel and 10 consolidated subsidiaries in Japan.
- JFE Engineering

\*2 This report uses the maximum value of each year.

**PRTR-Registered Substances**

Items	Scope	Unit	FY2019	FY2020	FY2021	FY2022	FY2023	
PRTR-registered substances* <sup>1*2</sup>	Amount released	All* <sup>3</sup>	t	918	754	827	750	917
		ST Gr	t	766	596	672	609	790
		ST	t	481	341	380	366	510
		ST subsidiaries	t	285	255	292	243	280
		EN Gr	t	152	158	155	141	126
		EN	t	107	121	116	103	101
		EN subsidiaries	t	45.4	36.7	39.3	37.8	25.1
	Amount transferred	All* <sup>3</sup>	t	7,866	5,949	9,845	12,809	11,217
		ST Gr	t	7,832	5,910	9,811	12,779	11,193
		ST	t	1,865	1,694	1,378	1,278	1,192
		ST subsidiaries	t	5,967	4,216	8,433	11,501	10,001
		EN Gr	t	34	39	34	30	23
		EN	t	29	26	30	26	19
		EN subsidiaries	t	5.4	12.5	4.4	4.4	3.9

\*1 Coverage:

- JFE Steel and 15 consolidated subsidiaries in Japan.
- JFE Engineering and 4 consolidated subsidiaries in Japan.

\*2 Excluding dioxins

\*3 JFE Shoji is not included in the scope of the report as the company is not subject to PRTR registration.

## Chemical Substances (Supplementary Data)

### ■ SOx and NOx Emissions of JFE Steel Group Subsidiaries (FY2023)

Company name	SOx emissions (unit: Nm <sup>3</sup> )	NOx emissions (unit: Nm <sup>3</sup> )
JFE Mineral & Alloy Company, Ltd.	15,880	95,960
CHIBA RIVERMENT AND CEMENT CORP.	85	695
MIZUSHIMA RIVERMENT CORP.	0	647
JFE PRECISION CORPORATION	746	186
JFE Plastic Resource Corporation	24	14
JFE Bars & Shapes Corporation	9,534	11,324
JFE Metal Products & Engineering Inc.	29	2,062
JFE KENZAI FENCE CO., LTD.	0	0
JFE Galvanizing & Coating Co., Ltd.	1,354	12,890
JFE Container Co., Ltd.	93	0
JFE Welded Pipe Manufacturing Co., Ltd.	0	0
JFE Steel Pipe Co., Ltd.	0	0
Galvatex Corporation	0	454
JFE Techno-wire Corporation	0	0
JFE Kozai Corporation	0	0
GECOSS CORPORATION	0	0
JFE LOGISTICS CORPORATION	0	0
J-Logitec Co., Ltd.	0	0
JFE Chemical Corp.	9,471	31,113
K-PLASHEET CORPORATION	168	0
JFE LIFE CORPORATION	0	0
Total	37,383	155,345

## Use of Natural Resources

### Input and Products supplied

Items		Scope	Unit	FY2019	FY2020	FY2021	FY2022	FY2023
Input	Raw materials for steel production*	ST	million t	64.3	56.2	63.4	60.4	56.1
	Iron ore*	ST	million t	38.7	32.9	37.6	35.7	33.4
	Coal	ST	million t	20.3	18.1	19.9	19.1	17.5
	Lime	ST	million t	5.3	5.2	5.9	5.6	5.2
	Recycled materials (steel scrap)	ST	million t	1.1	0.8	1.2	0.9	0.8
	Raw materials	EN	thousand t	39.4	36.9	38.6	27.9	24.0
Products supplied	Steel products	ST	million t	26.7	22.8	25.9	24.1	23.4
	Engineering products	EN	thousand t	36.6	34.7	37.4	27.0	23.0

\*Data for FY2019 though FY2022 was revised to increase accuracy.

### Co-Products and Wastes

Items		Scope	Unit	FY2019	FY2020	FY2021	FY2022	FY2023
Co-products	Amount generated* <sup>1</sup>	ST Gr	million t	15.6	13.9	14.4	14.1	13.3
		ST* <sup>2</sup>	million t	15.1	13.4	13.9	13.5	12.7
		ST subsidiaries	million t	0.5	0.5	0.5	0.6	0.6
	Amount recycled internally	ST	million t	5.0	3.3	3.3	2.9	2.9
	Internal recycle rate	ST	%	32.9	24.9	24.0	21.7	22.4
	Emissions* <sup>1</sup>	ST Gr	million t	10.3	10.2	10.8	10.8	10.1
		ST	million t	10.2	10.1	10.6	10.6	9.9
		ST subsidiaries	million t	0.1	0.1	0.2	0.2	0.2
	Used by local communities	ST	million t	10.1	10.0	10.5	10.5	9.8
	Rate of local communities use	ST	%	66.8	74.8	75.7	77.8	77
	Landfill amount* <sup>1</sup>	ST Gr	million t	0.074	0.060	0.094	0.167	0.180
		ST	million t	0.043	0.037	0.042	0.073	0.083
		ST subsidiaries	million t	0.031	0.023	0.052	0.094	0.097
	Recycling rate	ST	%	99.7	99.7	99.7	99.5	99.4

Items		Scope	Unit	FY2019	FY2020	FY2021	FY2022	FY2023
Wastes	Emissions*3*4	EN Gr	thousand t	211.0	159.1	249.2	223.7	193.1
	Offices	EN	t	367.1	329.2	235.3	259.4	219.4
		Yokohama HO	t	299.0	256.9	156.7	195.0	157.2
		Tsu works	t	68.2	72.3	78.6	64.4	62.2
	Productions	EN	t	1,340.5	1,072.3	803.0	821.4	705.8
		Tsurumi works	t	653.8	519.8	364.7	461.6	338.3
		Tsu works	t	686.7	552.5	438.3	359.8	367.5
	Constructions	EN	t	145,397.7	97,387.9	190,242.3	162,747.2	134,157.5
	Subsidiaries	EN subsidiaries	t	63,876.7	60,296.7	57,960.3	59,841.4	57,990.0
	Recycling rate (offices)	EN	%	97.3	96.8	96.1	96.4	92.1
		Yokohama HO	%	98.8	99.1	98.5	98.4	97.7
		Tsu works	%	85.2	87.2	88.4	85.7	87.1
	Recycling rate (production)	EN	%	68.0	48.8	46.8	54.0	50.4
		Tsurumi works	%	79.4	72.0	68.3	75.9	60.9
		Tsu works	%	60.9	33.8	28.0	25.0	42.3
	Recycling rate (construction)	EN	%	97.1	98.3	98.6	99.3	97.5
	Landfill	EN	t	4,489.3	2,011.6	3,035.6	1,456.7	3,497.5
	Offices	EN	t	8.5	9.1	7.4	7.7	7.4
		Yokohama HO	t	3.3	2.1	2.2	2.9	3.0
		Tsu works	t	5.2	7.0	5.2	4.8	4.4
	Productions	EN	t	312.6	351.2	322.6	287.7	235.2
Tsurumi works		t	77.3	75.2	89.4	85.9	80.5	
Tsu works		t	235.3	276.0	233.2	201.8	154.7	
Constructions	EN	t	4,168.2	1,651.3	2,705.6	1,161.3	3,254.8	
Recycling rate	EN	%	95.8	95.9	96.5	97.4	96.1	

\*1 Data cover JFE Steel and 22 consolidated subsidiaries in Japan.

\*2 Byproducts generated by JFE Steel are mostly reused as offshore, land, or construction materials.

\*3 Data cover JFE Engineering and 9 consolidated subsidiaries in Japan.

\*4 Data from FY2019 includes wastes generated at offices and productions of JFE Engineering.

■ Wastes at JFE Engineering Construction Sites

Items		Scope	Unit	FY2019	FY2020	FY2021	FY2022	FY2023
Rubble	Amount generated	EN	t	113,637	78,100	159,309	141,888	119,708
	Recycle rate	EN	%	98.6	99.4	99.4	99.9	97.8
	Landfill amount	EN	t	1,533	484	940	173	2,632
Sludge	Amount generated	EN	t	17,225	12,399	24,350	14,806	9,679
	Recycle rate	EN	%	98.8	98.9	96.9	99.0	99.3
	Landfill amount	EN	t	205	135	683	130	56
Industrial waste excluding rubble and sludge	Amount generated	EN	t	13,788	6,678	6,583	6,054	4,771
	Recycle rate	EN	%	85.0	85.4	81.6	84.4	87.1
	Landfill amount	EN	t	1,923	868	1,083	858	566

■ Paper Consumption at JFE Shoji

Items	Scope	Unit	FY2019	FY2020	FY2021	FY2022	FY2023
Consumption of copier papers	SH	boxes	4,675	3,021	3,033	2,860	2,934
	Tokyo	boxes	2,516	1,333	1,471	1,376	1,396
	Osaka	boxes	399	310	337	351	391
	Nagoya	boxes	293	157	154	177	162
	Branch	boxes	1,467	1,221	1,071	956	985

## Water Use

### Water Withdrawal and Discharge

Items	Scope	Unit	FY2019	FY2020	FY2021	FY2022	FY2023
Amount of water accepted*1	All	million t	242	237	246	240	226
	ST Gr	million t	241	236	245	239	224
	ST	million t	221	215	226	220	208
	ST subsidiaries	million t	19.8	20.9	18.7	18.2	16.1
	EN Gr	million t	1.410	1.296	1.141	1.35	1.24
	EN	million t	0.106	0.072	0.063	0.064	0.073
	EN subsidiaries	million t	1.304	1.223	1.078	1.28	1.17
	SH Gr	million t	0.149	0.160	0.154	0.154	0.145
	SH	million t	—	—	—	—	—
	SH subsidiaries	million t	0.149	0.160	0.154	0.154	0.145
Amount of water released*2	ST Gr	million t	143	141	144	143	139
	ST	million t	126	123	128	128	125
	ST subsidiaries	million t	17.0	18.3	15.6	15.4	13.9
	EN	million t	0.126	0.157	0.132	0.122	0.122
Amount of water consumption*2	ST Gr	million t	3,616	3,331	3,442	3,475	3,242
	ST	million t	3,323	3,066	3,207	3,242	3,035
	ST subsidiaries	million t	293	265	235	233	207
Amount evaporated	ST	million t	95	92	98	92	83
Ratio of amount released and evaporated	ST	%	6.6	7.0	7.0	6.8	6.9
Amount recycled*2	ST Gr	million t	3,375	3,096	3,197	3,237*4	3,017
	ST	million t	3,102	2,851	2,981	3,022*4	2,826
	ST subsidiaries	million t	273	245	216	215	191
Recycling rate*2*3	ST	%	93.4	93.0	93.0	93.2	93.1
	ST subsidiaries	%	93	92	92	92	92

\*1 Coverage:

- JFE Steel and 22 consolidated subsidiaries in Japan.
- JFE Engineering and 6 consolidated subsidiaries in Japan.
- 33 JFE Shoji domestic and overseas consolidated subsidiaries.

\*2 Data cover JFE Steel and 22 JFE Steel consolidated subsidiaries in Japan.

\*3 Industrial water circulated (%) = (Total amount – industrial water accepted)/total amount used × 100

\*4 Revised the prior year data to increase accuracy.

**Breakdown of Water Intake and Discharge Areas**

Items	Scope	Unit	FY2019	FY2020	FY2021	FY2022	FY2023
Total amount accepted	All*	million t	221.0	214.8	226.1	220.4	208.4
River/lake		million t	0	0	0	0	0
Groundwater		million t	0	0	0	0	0
Industrial water/waterworks		million t	221.0	214.8	226.1	220.4	208.4
Ocean		million t	0	0	0	0	0
Rainwater		million t	0	0	0	0	0
Other intake source		million t	0	0	0	0	0
Total amount released	All*	million t	126.8	123.6	128.8	128.5	125.8
Ocean		million t	126.3	123.1	128.3	128.1	125.4
Surface water		million t	0	0	0	0	0
Underground/well		million t	0	0	0	0	0
Off-site water processing		million t	0.4502	0.4796	0.4709	0.4300	0.4158
Beneficial use/other use		million t	0	0	0	0	0
Other discharge source		million t	0	0	0	0	0

\* Data cover JFE Steel and JFE Engineering.

**Water Use (Supplementary Data)**

**Amount of Water Accepted and Released at JFE Steel Group Subsidiaries (FY2023)**

Company name	Amount accepted (unit: thousand tonnes)	Amount released (unit: thousand tonnes)
JFE Mineral & Alloy Company, Ltd.	5,566	5,530
CHIBA RIVERMENT AND CEMENT CORP.	12	12
MIZUSHIMA RIVERMENT CORP.	10	10
JFE PRECISION CORPORATION	140	140
JFE Plastic Resource Corporation	21	21
JFE Bars & Shapes Corporation	4,583	2,808
JFE Metal Products & Engineering Inc.	150	147
JFE KENZAI FENCE CO., LTD.	21	21
JFE Galvanizing & Coating Co., Ltd.	525	525
JFE Container Co., Ltd.	251	251
JFE Welded Pipe Manufacturing Co., Ltd.	38	38
JFE Steel Pipe Co., Ltd.	2	2
Galvatex Corporation	528	528
JFE Techno-wire Corporation	108	108



Company name	Amount accepted (unit: thousand tonnes)	Amount released (unit: thousand tonnes)
JFE Kozai Corporation	13	13
GECOSS CORPORATION	66	66
JFE LOGISTICS CORPORATION	106	106
J-Logitec Co., Ltd.	3	3
JFE Chemical Corp.	3,432	3,073
K-PLASHEET CORPORATION	34	29
JFE LIFE CORPORATION	502	489
Total	16,108	13,919

**Amount of Water Accepted at JFE Engineering Group Subsidiaries (FY2023)**

Company name	Amount accepted (unit: thousand tonnes)
J&T Recycling Corporation	1,170
NORTHERN JAPAN MACHINERY Corporation	0.006
TOHOKU DOCK TEKKO CO., LTD.	0.02
Fujikako, Inc.	0.02
Total	1,170

\* Water intake data of J Farm Corporation has been included in the data of JFE Engineering Corporation from the FY2023 results.  
 \* Water intake data of JFE Environmental Service Corporation has been included in the data of J&T Recycling Corporation from the FY2023 results.

## Environmental Management

**Environmental Management System**

Items		Scope	Unit	FY2019	FY2020	FY2021	FY2022	FY2023
% covered by ISO 14001 certification	Base	All	%	58	58	54	52	52
		ST Gr	%	21	21	18	44	44
		EN Gr	%	9	9	8	44	43
		SH Gr	%	28	28	27	64	64
	Employee	All	%	74	70	68	67	72
		ST Gr	%	75	74	72	70	72
		EN Gr	%	60	51	50	50	47
		SH Gr	%	92	89	83	81	80
Environmental audit (number of sites)	ST Gr	sites	32	24	29	28	27	
	EN Gr	sites	48	28	52	50	52	
Environmental education conducted (total participants)	EN Gr	people	1,063	731	1,131	889	897	

## ■ Environmental Accounting

Breakdown of environmental protection cost		FY2022		FY2023	
		Investment (billion yen)	Cost (billion yen)	Investment (billion yen)	Cost (billion yen)
Management	Impact monitoring and measurement, and EMS expenses and education	14	27	12	24
Global warming countermeasures	Saving and efficiently using energy	55	359	195	365
	Recycling industrial water	32	216	49	257
Conservation of natural resources	Recycling and waste management of internally generated materials, etc.	14	62	0	57
Environmental protection	Air pollution countermeasures	159	312	69	307
	Water pollution countermeasures	43	107	18	115
	Prevention of soil contamination, noise, vibration, and subsidence	0	5	0	5
Other	Charges, etc.	—	14	—	14
R&D	Technologies for protecting the environment, saving energy, and preventing global warming	10	105	10	94
Societal activities	Support for nature preservation and forestation, information disclosure, exhibitions, and public relations	—	7	—	7
Total		327	1,215	352	1,244

Note: Data cover all investment activities of JFE Steel Corporation and R&D activities of JFE Engineering Corporation.

## ■ Environmental Accounting (Accumulated)

Items	Scope	Unit	FY2019	FY2020	FY2021	FY2022	FY2023
Energy-saving investment (accumulated)	All	billion yen	5,321	5,465	5,654	5,708	5,903
Environmental protection investment (accumulated)	All	billion yen	7,276	7,421	7,709	7,971	8,119

## Social Data

### Provide Quality Products and Enhance Customer Satisfaction

#### Customer Training (FY2023)

Training type	Scope	Unit	Participants
Technical presentation by overseas Group companies (number of participating companies* <sup>1</sup> )	JFE Shoji	People (companies)	93(15)
National staff training (NS training* <sup>2</sup> )	JFE Shoji	People (companies)	23

\*1 Participants from nine countries, with training conducted online (face-to-face session planned for 2024).

\*2 Participants from 12 countries (Thailand, Vietnam, India, Malaysia, Mexico, Indonesia, Philippines, South Korea, Taiwan, Canada, U.S.A., Germany).

### Human Capital

#### Lost-Work Injuries and Accidents

Items		Scope* <sup>1</sup>	Unit	2019	2020	2021	2022	2023
Lost-work Injuries and Severity (Rates)	Lost-work injuries* <sup>2</sup>	JFE Steel	—	0.28	0.23	0.10	0.18	0.06
	Severity* <sup>3</sup>		—	0.30	0.08	0.08	0.00	
	Lost-work injuries* <sup>2</sup>	JFE Engineering	—	0.45	0.35	0.56	0.26	0.28
	Severity* <sup>3</sup>		—	0.62	0.01	0.40	0.01	0.42
	Lost-work injuries* <sup>2</sup>	JFE Shoji Group	—	1.00	0.76	0.60	0.25	0.12
	Severity* <sup>3</sup>		—	0.02	0.04	0.05	0.02	0.03
	Lost-work injuries* <sup>2</sup>	Manufacturing industry average	—	1.20	1.21	1.31	1.25	1.29
	Severity* <sup>3</sup>		—	0.10	0.07	0.06	0.08	0.08
Number of lost-work injuries	Lost-work injuries	JFE Group	Cases	49	36	26	25	12
	Fatal injuries		Cases	6	1	2	1	1
	Lost-work injuries	JFE Steel	Cases	30	23	10	18	6
	Fatal injuries		Cases	4	1	1	1	0
	Lost-work injuries	JFE Engineering	Cases	11	7	11	5	5
	Fatal injuries		Cases	2	0	1	0	1
	Lost-work injuries	JFE Shoji Group	Cases	8	6	5	2	1
	Fatal injuries		Cases	0	0	0	0	0

Items		Scope*1	Unit	2019	2020	2021	2022	2023
Lost-work injuries involving employees	Lost-work injuries	JFE Group	Cases	18	15	10	13	6
	Fatal injuries		Cases	1	0	0	1	0
	Lost-work injuries	JFE Steel	Cases	10	9	5	11	4
	Fatal injuries		Cases	1	0	0	1	0
	Lost-work injuries	JFE Engineering	Cases	2	2	1	0	1
	Fatal injuries		Cases	0	0	0	0	0
	Lost-work injuries	JFE Shoji Group	Cases	6	4	4	2	1
	Fatal injuries		Cases	0	0	0	0	0
Lost-work injuries involving employees of contractors	Lost-work injuries	JFE Group	Cases	31	21	16	12	6
	Fatal injuries		Cases	5	1	2	0	1
	Lost-work injuries	JFE Steel	Cases	20	14	5	7	2
	Fatal injuries		Cases	3	1	1	0	0
	Lost-work injuries	JFE Engineering	Cases	9	5	10	5	4
	Fatal injuries		Cases	2	0	1	0	1
	Lost-work injuries	JFE Shoji Group	Cases	2	2	1	0	0
	Fatal injuries		Cases	0	0	0	0	0

\*1 Scope of data:

- JFE Steel and JFE Engineering: parent company, business associates and contractors in Japan
- JFE Shoji : parent and consolidated subsidiaries, business associates and contractors in Japan

\*2 Lost-work injuries (rate) = number of employees with lost-work injuries/total working hours × 1,000,000

\*3 Severity = number of lost working days/total working hours × 1,000

■ Health and Safety Training (FY2023)

Items	Unit	Participants*
Training for managers and supervisors	People	400
Mental healthcare education for new hires and at rank-based training	People	1,600

\* Total of 3 operating companies.

■ Occupational Health and Safety

Item	Scope	Unit	FY2021	FY2022	FY2023
Ratio of ISO 45001-certified sites	JFE Steel	%	33	100	100

■ Health

Item	Scope	Unit	FY2019	FY2020	FY2021	FY2022	FY2023
Provision rate of health guidance* <sup>1</sup>	JFE Steel	%	64.2	53.0	72.2	71.1	—
	JFE Engineering	%	39.6	39.1	39.4* <sup>3</sup>	42.7	—
	JFE Shoji	%	36.0	41.6	52.1* <sup>3</sup>	35.0	—
Smoking rates	JFE Steel* <sup>2</sup>	%	31.8	29.0	27.3	26.6	25.8
	JFE Engineering	%	26.4	23.3	22.9	22.3	21.8
	JFE Shoji	%	24.9	24.9	21.5	21.9	20.6
Metabolic syndrome rates	Insured by the JFE Group's health insurance union (age 40 and above)	%	35.6	36.5	36.3	36.0	36.3
Rate of health examination for dependents	Age 40 and above	%	51.5	46.3	51.3	52.3* <sup>3</sup>	53.8

\*1 Figures for FY2023 will be added once they are finalized.

\*2 Smoking rate for JFE Steel is managed based on calendar year.

\*3 Revised the prior year data to increase accuracy.

■ Health and Safety Training (FY2023\*1)

Category	Consolidated/ non- Consolidated	Unit	JFE Steel	JFE Engineering	JFE Shoji	
Employees	Consolidated*2	people	43,081	10,466	8,618	
Male		people	37,419	9,019	4,970	
Female		people	5,662	1,447	2,194	
Management positions*3		people	11,596	3,616	1,712	
Male		people	10,712	3,373	1,363	
Female		people	884	243	216	
Ratio of women in management positions		%	7.6	6.7	13.7	
Employees	Non- consolidated	people	14,599	3,646	1,051	
Male		people	13,351	3,094	618	
Female		people	1,248	552	433	
Management positions (manager or higher)*3		people	1,659	1,685	617	
Male		people	1,625	1,627	555	
Female		people	34	58	62	
Ratio of women in management positions			%	2.0	3.4	10.0
Recruits		people	455	162	66	
Male		people	392	131	40	
Female		people	63	31	26	
New graduates		people	328	91	43	
Mid-career professionals		people	127	71	23	
Years of continuous employment (average)	year	17.1	15.8	12.9		
Male	year	16.8	15.8	12.8		
Female	year	20.3	15.4	12.9		
Job turnover rate*4 (total2.7%)		%	2.6	3.0	2.8	
Elderly employees*5	people	862	50	26		
Ratio of elderly employees*5		%	5.9	1.4	2.5	
Average annual leave taken	day/year	18.4	19.4	16.1		
Average overtime	hours/ month	24.9	26.0	30.2		
Employees working shorter hours for childcare (aggregated)	people	82	70	67		
Ratio of male employees taking childcare leave*6		%	91	94	93	
Wage gap between men and women*7 (all workers)		%	79.5	65.1	66.2	
Full-time employees		%	80.0	65.1	66.4	
Part-time workers and fixed-term employees		%	71.1	57.8	58.1	
Temporary staffs	people	146	670	27		

- \*1 Personnel composition (excluding managers and temporary staff) is as of March 31, 2024. Number of managers and temporary staff is as of April 1, 2024, and other personnel as of FY2023.
- \*2 Scope of data: Operating companies and other consolidated subsidiaries, JFE Steel: 133, JFE Engineering: 81, and JFE Shoji: 88. JFE Shoji's America region is excluded from the gender breakdown since no survey has been conducted on the number of employees and managers by gender.
- \*3 Management positions at JFE Shoji include employees on loan.
- \*4 Percentage of employees who voluntarily choose to resign from the organization.
- \*5 Figures for JFE Steel and JFE Engineering include active employees who are age 60 and above (the companies' mandatory retirement age has been raised to 65).
- \*6 Rate of male employees taking childcare leave or time off related to child rearing = (Number of male employees who took childcare leave + Number of male employees who used the childcare leave program for pre-elementary school children) / Number of male employees whose spouses have given birth.
- \*7 Calculated in accordance with the provisions of the Act on the Promotion of Women's Active Engagement in Professional Life.

■ Recruiting for New Graduates (FY2024) and Mid-Career Professionals (FY2023) (Three Operating Companies, Excluding their Subsidiaries)

Items	Unit	Career-track Positions			On-site positions at steelworks	Total
		White-collar	Technical	Total		
Male	people	117	227	344	219	563
Female	people	71	33	104	16	120
Total	people	188	260	448	235	683
Ratio of women	%	37.8	12.7	23.2	6.8	17.6

■ Employment of People with Disabilities (as of June 1 of each year)

Items	Scope	Unit	2019	2020	2021	2022	2023
Employment of People with Disabilities	JFE Steel	%	2.48	2.51	2.51	2.57	2.52
	JFE Engineering	%	2.23	2.37	2.53	2.58	2.83
	JFE Shoji	%	2.50	2.39	2.39	2.66	2.74

■ Human Resource Development

Items	Scope	Unit	2022	2023
Training hours per employee	JFE Steel	Hours per year	45.2	44.9
	JFE Engineering	Hours per year	20.9	23.4
	JFE Shoji	Hours per year	20.1	22.1
DX human resource development (accumulated)	JFE Steel	Persons	—	610
	JFE Engineering	Persons	—	179

## Community

### ■ Social Contributions (FY2023)

Activities		Scope	Unit	Achievements
Internships		JFE Group	People	1,707
		JFE Steel	People	659
		JFE Engineering	People	688
		JFE Shoji	People	360
Supporting elementary schools in Ghana and Nigeria	Desks and chairs	JFE Shoji	Sets	435
	Notebooks		Books	17,000
	Canned foods		Cans	12,500

### ■ JFE 21st Century Foundation (FY2023)

Grants		Projects	Value (million yen)
Technology research (accumulated)		738	148,380
Technology research for FY2023	Iron and steel technology research	13	2,600
	Global environment and global warming prevention technology research	15	3,000
Asian history studies (accumulated)		174	26,100
Asian history studies for FY2023		12	1,800
Activities		Sets donated	
Supporting the Japan Overseas Educational Services Writing Contest and anthology donation (to elementary and middle schools and also public libraries in the regions related to steel*)		2,200	

\* Donated to 650 elementary schools and middle schools, 70 libraries, etc.



## Governance Data

### Corporate Governance

#### ■ Corporate Governance System

As of July 1, 2024

Items	Overview of the system
Organizational design type	Company with an Audit and Supervisory Board
Number of Directors (members)	8
The number of Independent Outside Directors (members)	3
The number of female Directors (member)	1
Number of Audit & Supervisory Board Members (members)	5
The number of Independent Outside Audit & Supervisory Board Members (members)	3
The number of female Audit & Supervisory Board Members (members)	1
Term for Directors (years)	1
Term for Outside Directors (years)	1
Corporate Officer System	Adopted
Voluntary advisory committees of the Board of Directors	Nomination Committee and Remuneration Committee

## ■ Directors and Audit & Supervisory Board Members

As of July 1, 2024

Position		Name	Significant concurrent post	Independent executive	Number of meetings of the Board of Directors attended in FY2023	Number of meetings of the Audit & Supervisory Board attended in FY2023
Director	Inside	Yoshihisa Kitano	Chairman of the Board of Directors of JFE 21st Century Foundation (Public Interest Incorporated Foundation)	—	16/16 (100%)	—
		Masayuki Hirose	Representative Director, President and CEO of JFE Steel Corporation	—	—	—
		Masashi Terahata	Director of JFE Steel Corporation, Representative Director of JFE 21st Century Foundation (Public Interest Incorporated Foundation)	—	16/16 (100%)	—
		Toshinori Kobayashi	Representative Director, President and CEO of JFE Shoji Corporation	—	13/16 (81%)	—
		Kazuyoshi Fukuda	Representative Director, President and CEO of JFE Engineering Corporation	—	—	—
	Outside	Masami Yamamoto	—	○	16/16 (100%)	—
		Yoshiko Ando	Outside Director of Kirin Holding Company, Limited Outside Director of Sansei Technologies, Inc.	○	16/16 (100%)	—
		Keiichi Kobayashi	Chairman of the Board, Furukawa Electric Co., Ltd. Outside Director, NTT DATA Group Corporation	○	—	—
Audit & Supervisory Board Member	Inside	Nobuya Hara	Audit & Supervisory Board Member of JFE Steel Corporation	—	16/16 (100%)	19/19 (100%)
		Nakaba Akimoto	Audit & Supervisory Board Member of JFE Engineering Corporation Audit & Supervisory Board Member of JFE Shoji Corporation	—	16/16 (100%)	19/19 (100%)
	Outside	Isao Saiki	Partner Lawyer of Abe, Ikubo & Katayama Law Firm	○	16/16 (100%)	19/19 (100%)
		Tsuyoshi Numagami	Professor, Institute for Business and Finance, Waseda University Outside Director of Tokyo Century Corporation Outside Director of EBARA Corporation	○	16/16 (100%)	19/19 (100%)
		Takuya Shimamura	Director and Chairman of AGC Inc. Outside Director of EBARA Corporation	○	16/16 (100%)	19/19 (100%)

\*Mr. Masayuki Hirose, Mr. Kazuyoshi Fukuda, and Mr. Keiichi Kobayashi were elected for the first time as Directors at the previous year's Ordinary General Meeting of Shareholders, on June 25, 2024.

**■ Nomination Committee and Remuneration Committee**

As of July 1, 2024

Items	Members	Chairperson	Number of meetings held during FY2023
Nomination Committee	6	Masami Yamamoto (Outside Director)	6
Inside Director	2		
Outside Director	2		
Outside Audit & Supervisory Board Member	2		
Remuneration Committee	6	Keiichi Kobayashi (Outside Director)	3
Inside Director	2		
Outside Director	2		
Outside Audit & Supervisory Board Member	2		

**■ Operating System**

Committee	Company	Chairperson	Attendees
Group Management Strategy Committee	JFE Holdings	President	Inside Directors (including 3 operating company Presidents), Corporate Officers and full-time Audit & Supervisory Board Members
Management Committee	JFE Holdings	President	Inside Directors (excluding 3 operating company Presidents), Corporate Officers and full-time Audit & Supervisory Board Members
	Each operating company	President	Directors, major Corporate Officers and Audit & Supervisory Board Members

**Executive Remuneration**

FY2023

Executive remuneration						
Position Type	Total remuneration, etc. (million yen)	Total amount by remuneration type (million yen)* <sup>1</sup>				Number of Executives (members)
		Basic remuneration	Bonus	Stock remuneration* <sup>2</sup>		
				Linked to performance	Linked to service length	
Directors (excluding Outside Directors)	320.247	217.415	61.840	27.328	13.664	5
Audit & Supervisory Board Members (excluding Outside Audit & Supervisory Board Members)* <sup>1</sup>	78.335	78.335	—	—	—	2
Outside Directors/ Audit & Supervisory Board Members	106.697	106.697	—	—	—	6

\*1 Directors' (excluding outside directors) performance-linked remuneration is composed of bonus and stock remuneration. Total amount of performance-linked remuneration for the current fiscal year is 89.168 million yen.

\*2 Only directors (excluding outside directors) are included in the scope of the above-mentioned stock remuneration, and the entire amount is non-monetary remuneration. Total amount of stock remuneration expensed for the current fiscal year as non-monetary remuneration is 40.992 million yen.

Officers whose consolidated remuneration exceeded 100 million yen								
Name	Position	Company	Total (consolidated basis) (million yen)	Per company (consolidated basis) (million yen)	Total amount by remuneration type (million yen)			
					Basic remuneration	Bonus	Stock remuneration	
							Linked to performance	Linked to service length
Yoshihisa Kitano	Director	JFE Holdings	185.813	12.000	12.000	—	—	—
	Director	JFE Steel		173.813	108.043	36.490	19.520	9.760
Masashi Terahata	Director	JFE Holdings	102.979	102.979	68.567	22.700	7.808	3.904
Koji Kakigi	Director	JFE Holdings	188.467	188.467	120.047	39.140	19.520	9.760
Hajime Oshita	Director	JFE Holdings	103.244	8.400	8.400	—	—	—
	Director	JFE Engineering		94.844	60.764	19.440	9.760	4.880
Toshinori Kobayashi	Director	JFE Holdings	106.750	8.400	8.400	—	—	—
	Director	JFE Shoji		98.350	55.800	27.910	9.760	4.880

Ratio of remuneration for each		
Basic remuneration: fixed (%)	Annual bonus: linked to short-term performance (%)	Stock remuneration: linked to medium- to long-term performance (%)
60	20	20

Note: The ratios above are applicable only when the company's president has attained the performance target goals.

**Internal Control System**

As of April 1, 2024

Internal control system			
Items		Number of companies (companies)	Number of people assigned (members)
Internal audit	Internal audit organization	60	168
Audit & Supervisory Board	Full-time Audit & Supervisory Board Members	29	34
	Dispatched Audit & Supervisory Board Members (part-time Audit & Supervisory Board member)	25	7
Cooperation of Audit & Supervisory Board members			
Items		Number of meeting held during FY2023	
Accounting auditor		10	
Internal Audit Department		8	

**Compliance**

**Whistleblowing**

Items	Scope	Unit	FY2021	FY2022	FY2023
Cases handled by the Corporate Ethics Hotline	JFE Holdings and operating companies	Cases	133	127	134

## Independent Assurance Statement



Sustainability Accounting Co., Ltd.

### Independent Assurance Statement

September 24, 2024

Mr. Yoshihisa Kitano  
Representative Director, President and CEO of JFE Holdings, Inc.

#### 1. Purpose

We, Sustainability Accounting Co., Ltd., have been engaged by JFE Holdings, Inc., ("the Company") to provide limited assurance on Company's following data during the fiscal year 2023, that were 47.4 million t-CO<sub>2</sub> of CO<sub>2</sub> emissions for Scope1, 7.3 million t-CO<sub>2</sub> of CO<sub>2</sub> emissions for Scope2 and 22.7 million t-CO<sub>2</sub>e of CO<sub>2</sub> emissions for Scope3 (categories 1, 2, 3, 4, 5, 6, 7, 15), 612 PJ of energy consumption, 226 million tonnes of water accepted, 10.1 million tonnes of co-products emissions of JFE Steel Group, and 0.19 million tonnes of wastes emissions of JFE Engineering Corporation (collectively, "the Environmental performance indicators"). The purpose of this process is to express our conclusion on whether the Environmental performance indicators were calculated in accordance with the Company's standards. The Company's management is responsible for calculating the Environmental performance indicators. Our responsibility is to independently carry out a limited assurance engagement and to express our assurance conclusion.

#### 2. Procedures Performed

We conducted our assurance engagement in accordance with International Standard on Assurance Engagement 3000 (ISAE 3000) and International Standard on Assurance Engagement 3410 (ISAE 3410). The key procedures we carried out included:

- Interviewing the Company's responsible personnel to understand the Company's standards and reviewing the Company's standards
- Performing cross-checks on a sample basis and performing a recalculation to determine whether the Environmental performance indicators were calculated in accordance with the Company's standards

#### 3. Conclusion

Based on the procedures performed, nothing has come to our attention that causes us to believe that the Environmental performance indicators have not been calculated in all material respects in accordance with the Company's standards.

We have no conflict of interest relationships with the Company.

Takashi Fukushima  
Representative Director  
Sustainability Accounting Co., Ltd.  
2-4, Kojimachi, Chiyoda-ku,  
Tokyo, Japan