

# 6-Year Financial Data

For data on performance trends and financial information in graph form, please refer to the J-POWER website.  
<https://www.jpowers.co.jp/english/ir/financial/>

(Millions of yen)

	2018/3	2019/3	2020/3	2021/3	2022/3	2023/3
<b>Consolidated: Operating Revenue/ Expenses Comparison</b>						
Operating Revenue (Net Sales)	856,252	897,366	913,775	909,144	1,084,621	1,841,922
Operating Profit	104,336	78,844	83,638	77,775	86,979	183,867
Ordinary Profit	102,476	68,539	78,085	60,903	72,846	170,792
Profit Attributable to Owners of Parent	68,448	46,252	42,277	22,304	69,687	113,689
<b>Consolidated: Electricity Sales Volume</b>						
	(Million kWh)					
Electric Power Business	67,090	69,356	73,131	74,558	74,792	68,467
Hydroelectric	9,247	9,709	9,196	8,905	9,291	8,888
Thermal	56,782	54,946	52,053	52,140	47,994	45,673
Wind	824	815	865	1,211	1,190	1,047
Other*1	235	3,886	11,016	12,301	16,316	12,857
Overseas Business*2	15,871	10,927	15,640	11,097	11,061	14,271
Domestic Hydroelectric: Water Supply Rate	105%	106%	101%	96%	99%	94%
Domestic Thermal: Load Factor (non-consolidated)	80%	79%	77%	75%	67%	65%

\*1 Electric power sales volume of electricity procured from wholesale electricity market, etc.

\*2 Electric power sales volume of overseas consolidated subsidiaries (Electric power sales volume of equity method affiliates is not included.)

(Millions of yen)

	2018/3	2019/3	2020/3	2021/3	2022/3	2023/3
<b>Consolidated: Balance Sheet Items</b>						
Total Assets	2,647,054	2,766,179	2,805,390	2,841,960	3,066,176	3,362,685
Total Liabilities	1,810,929	1,920,597	1,948,003	1,988,274	2,102,071	2,169,942
Total Net Assets	836,124	845,582	857,387	853,685	964,105	1,192,743
<b>Consolidated: Cash Flow Items</b>						
Net Cash Provided by (Used in) Operating Activities	160,310	148,423	159,245	167,959	128,380	155,832
Net Cash Provided by (Used in) Investing Activities	(109,635)	(170,432)	(161,711)	(143,274)	(178,846)	(150,839)
Free Cash Flow	50,674	(22,008)	(2,466)	24,684	(50,466)	4,993
<b>Consolidated: Financial Indicators</b>						
Return on Assets (ROA)	3.9%	2.5%	2.8%	2.2%	2.5%	5.3%
ROA (after excluding construction in progress from tangible fixed assets)	4.8%	3.2%	3.6%	2.8%	3.1%	6.6%
Return on Equity (ROE)	9.1%	5.8%	5.3%	2.8%	8.1%	11.4%
Net Income per Share (EPS) (Yen)	373.93	252.68	230.96	121.85	380.70	621.50
Net Assets per Share (BPS) (Yen)	4,300.98	4,356.54	4,412.84	4,420.39	5,004.39	5,931.68
Equity Ratio	29.7%	28.8%	28.8%	28.5%	29.9%	32.3%
Debt-Equity Ratio	2.0	2.1	2.0	2.1	2.0	1.7
Number of Common Shares Issued at the End of the Period (excluding treasury stock) (Thousands)	183,049	183,048	183,048	183,048	183,048	182,861

(Millions of yen)

	2018/3	2019/3	2020/3	2021/3	2022/3	2023/3
<b>Non-Consolidated: Operating Revenue/ Expenses</b>						
Operating Revenue (Net Sales)	614,591	646,958	571,291	589,915	790,055	1,370,724
Electric Utility Operating Revenue	601,475	633,617	563,813	583,812	781,056	1,353,379
Electric Power Cost	—	—	—	—	606	1,168
Sold Power to Other Suppliers	545,659	580,652	510,429	566,068	767,205	1,337,307
Other*3	55,816	52,964	53,383	17,744	13,245	14,904
Incidental Business Operating Expenses	13,115	13,340	7,478	6,102	8,998	17,344
Operating Expenses	571,519	628,279	546,405	512,060	772,155	1,324,162
Electric Utility Operating Expenses	559,300	615,712	539,708	506,536	763,745	1,307,562
Personnel Expenses	34,205	32,494	35,861	31,875	20,136	20,621
Fuel Cost	257,308	289,024	233,234	193,776	298,588	762,152
Repair Expenses	63,458	69,715	66,652	44,133	51,540	41,937
Consignment Cost	41,284	41,951	42,578	47,182	51,961	51,389
Depreciation and Amortization Cost	53,469	51,050	52,702	55,277	55,930	58,963
Other	109,574	131,475	108,678	134,290	285,588	372,497
Incidental Business Operating Expenses	12,219	12,567	6,697	5,524	8,410	16,600
Operating Profit	43,071	18,678	24,886	77,854	17,899	46,561

\*3 Transmission revenue and miscellaneous Electric Power Business revenue; due to the split-off of the Power Transmission Business in April 2020, only miscellaneous Electric Power Business revenue will be recorded from FY2020 onward.

## Segment Information

(Millions of yen)

	2018/3	2019/3	2020/3	2021/3	2022/3	2023/3
<b>Sales to External Customers</b>						
Electric Power Business	631,923	693,790	684,155	731,302	876,431	1,417,902
Electric Power-Related Business	36,934	35,518	31,988	24,784	44,659	119,203
Overseas Business	163,084	141,024	179,094	138,087	145,106	277,555
Other Businesses	24,309	27,032	18,537	14,970	18,424	27,260
Consolidated	856,252	897,366	913,775	909,144	1,084,621	1,841,922
<b>Ordinary Profit</b>						
Electric Power Business	39,561	14,995	27,466	19,082	26,685	54,591
Electric Power-Related Business	23,098	26,468	18,507	12,292	25,834	92,831
Overseas Business	40,528	29,284	33,965	30,883	22,017	22,692
Other Business	1,258	1,388	569	1,049	1,234	1,805
Adjustments	(1,970)	(3,597)	(2,423)	(2,405)	(2,925)	(1,128)
Consolidated	102,476	68,539	78,085	60,903	72,846	170,792
<b>Assets</b>						
Electric Power Business	1,895,862	2,006,157	2,040,598	2,100,359	2,199,238	2,299,090
Electric Power-Related Business	265,830	275,549	244,503	240,308	252,821	308,661
Overseas Business	637,741	657,109	680,942	679,102	773,037	918,385
Other Business	17,979	18,244	15,627	16,810	17,946	15,853
Adjustments	(170,359)	(190,881)	(176,281)	(194,621)	(176,868)	(179,304)
Consolidated	2,647,054	2,766,179	2,805,390	2,841,960	3,066,176	3,362,685

# Consolidated Financial Statements

## Consolidated Balance Sheet

(Millions of yen)

	2022/3	2023/3
<b>Assets</b>		
Non-Current Assets	2,594,819	2,701,385
Electric Utility Plant and Equipment	1,076,948	1,065,522
Hydroelectric Power Production Facilities	360,084	374,454
Thermal Power Production Facilities	401,071	379,750
Internal Combustion Engine Power Production Facilities	1,198	—
Renewable Power Production Facilities	76,556	77,783
Transmission Facilities	144,458	140,248
Transformation Facilities	30,236	32,954
Communication Facilities	6,600	6,303
General Facilities	56,742	54,028
Overseas Business Facilities	271,356	447,201
Other Non-Current Assets	92,297	89,219
Construction in Progress	676,596	572,165
Construction in Progress	676,596	572,165
Nuclear Fuel	75,806	76,226
Nuclear Fuel in Processing	75,806	76,226
Investments and Other Assets	401,813	451,048
Long-Term Investments	323,770	371,914
Net Defined Benefit Asset	241	1,473
Deferred Tax Assets	64,277	56,896
Other	13,642	20,867
Allowance for Doubtful Accounts	(118)	(102)
Current Assets	471,357	661,300
Cash and Deposits	223,072	342,018
Notes and Accounts Receivable—Trade and Contract Assets	80,439	129,901
Inventories	62,173	110,315
Other	105,674	79,067
Allowance for Doubtful Accounts	(3)	(3)
<b>Total Assets</b>	<b>3,066,176</b>	<b>3,362,685</b>

(Millions of yen)

	2022/3	2023/3
<b>Liabilities</b>		
Non-Current Liabilities	1,686,575	1,797,923
Bonds Payable	706,484	774,085
Long-Term Loans Payable	839,645	893,363
Lease Obligations	2,239	1,695
Other Provisions	20	11
Net Defined Benefit Liability	37,976	33,301
Asset Retirement Obligations	35,240	34,087
Deferred Tax Liabilities	16,808	25,098
Other	48,158	36,279
Current Liabilities	415,496	372,019
Current Portion of Non-Current Liabilities	145,467	207,374
Short-Term Loans Payable	8,149	10,715
Commercial Paper	90,016	—
Notes and Accounts Payable—Trade	44,651	53,774
Accrued Taxes	18,276	27,884
Other Provisions	691	698
Asset Retirement Obligations	426	476
Others	107,817	71,096
<b>Total Liabilities</b>	<b>2,102,071</b>	<b>2,169,942</b>
<b>Net Assets</b>		
Shareholders' Equity	870,826	977,800
Capital Stock	180,502	180,502
Capital Surplus	119,881	128,178
Retained Earnings	570,452	669,498
Treasury Shares	(9)	(378)
Accumulated Other Comprehensive Income	45,203	106,878
Valuation Difference on Available-for-Sale Securities	14,014	14,372
Deferred Gains or Losses on Hedges	(9,359)	7,948
Foreign Currency Translation Adjustment	32,136	78,928
Remeasurements of Defined Benefit Plans	8,411	5,629
Non-Controlling Interests	48,075	108,064
<b>Total Net Assets</b>	<b>964,105</b>	<b>1,192,743</b>
<b>Total Liabilities and Net Assets</b>	<b>3,066,176</b>	<b>3,362,685</b>

## Consolidated Financial Statements

### Consolidated Statement of Income

(Millions of yen)

	2022/3	2023/3
<b>Operating Revenue (Net Sales)</b>	1,084,621	1,841,922
Electric Utility Operating Revenue	876,431	1,417,902
Overseas Business Operating Revenue	145,106	277,555
Other Business Operating Revenue	63,083	146,464
<b>Operating Expenses</b>	997,642	1,658,055
Electric Utility Operating Expenses	824,491	1,340,611
Overseas Business Operating Expenses	118,290	248,592
Other Business Operating Expenses	54,860	68,850
<b>Operating Profit</b>	86,979	183,867
<b>Non-Operating Income</b>	22,508	24,764
Dividends Income	1,862	1,927
Interest Income	1,811	3,472
Share of Profit of Entities Accounted for Using Equity Method	14,228	9,128
Gain on Sales of Non-Current Assets	63	3,936
Other	4,543	6,299
<b>Non-Operating Expenses</b>	36,641	37,839
Interest Expenses	22,442	27,368
Loss on Disposal of Non-Current Assets	1,780	4,667
Other	12,418	5,803
<b>Total Ordinary Revenue</b>	1,107,130	1,866,686
<b>Total Ordinary Expenses</b>	1,034,283	1,695,894
<b>Ordinary Profit</b>	72,846	170,792
<b>Profit before Income Taxes</b>	72,846	170,792
<b>Income Taxes—Current</b>	14,581	37,935
<b>Income Taxes—Deferred</b>	(16,519)	13,864
<b>Total Income Taxes</b>	(1,938)	51,799
<b>Profit</b>	74,784	118,993
<b>Profit Attributable to Non-Controlling Interests</b>	5,097	5,303
<b>Profit Attributable to Owners of Parent</b>	69,687	113,689

Note: Under each item, there are cases of fiscal years in which the monetary importance has been minor being included and represented under another item.

### Consolidated Statement of Cash Flows

(Millions of yen)

	2022/3	2023/3
<b>Cash Flows from Operating Activities</b>		
Profit before Income Taxes	72,846	170,792
Depreciation and Amortization	96,997	107,642
Loss on Retirement of Non-Current Assets	4,828	6,821
Increase (Decrease) in Net Defined Benefit Liability	(7,372)	(9,685)
Interest and Dividend Income	(3,673)	(5,400)
Interest Expenses	22,442	27,368
Decrease (Increase) in Notes and Accounts Receivable—Trade	(10,283)	(47,335)
Decrease (Increase) in Inventories	(15,958)	(44,357)
Increase (Decrease) in Notes and Accounts Payable—Trade	12,182	18,316
Share of (Profit) Loss of Entities Accounted for Using Equity Method	(14,228)	(9,128)
(Gain) Loss on Sales of Non-Current assets	23	(3,251)
Other, Net	21,889	(27,055)
Subtotal	179,694	184,727
Interest and Dividend Income Received	15,576	18,989
Interest Expenses Paid	(21,537)	(26,220)
Income Taxes Paid	(45,353)	(21,663)
<b>Net Cash Provided by (Used in) Operating Activities</b>	128,380	155,832
<b>Cash Flows from Investing Activities</b>		
Purchase of Non-Current Assets	(135,282)	(144,862)
Proceeds from Sales of Non-Current Assets	392	5,008
Payments of Investments and Loans Receivable	(49,740)	(7,828)
Collections of Investments and Receivable	4,744	3,140
Proceeds from Sales of Investments in Subsidiaries Resulting in Change in Scope of Consolidation	—	156
Other, Net	1,039	(6,454)
<b>Net Cash Provided by (Used in) Investing Activities</b>	(178,846)	(150,839)
<b>Cash Flows from Financing Activities</b>		
Proceeds from Issuance of Bonds	71,242	137,192
Redemption of Bonds	(20,000)	(20,000)
Proceeds from Long-Term Loans Payable	49,155	157,684
Repayment of Long-Term Loans Payable	(65,311)	(126,468)
Increase in Short-Term Loans Payable	37,154	122,626
Decrease in Short-Term Loans Payable	(37,924)	(120,061)
Proceeds from Issuance of Commercial Paper	140,033	219,999
Redemption of Commercial Paper	(70,000)	(310,000)
Proceeds from Sales of Investments in Subsidiaries without Change in Scope of Consolidation	—	55,821
Cash Dividends Paid	(13,725)	(14,647)
Dividends Paid to Non-Controlling Interests	(5,918)	(4,673)
Other, Net	(636)	(1,453)
<b>Net Cash Provided by (Used in) Financing Activities</b>	84,070	96,021
<b>Effect of Exchange Rate Change on Cash and Cash Equivalents</b>	3,686	10,729
<b>Net Increase (Decrease) in Cash and Cash Equivalents</b>	37,290	111,743
<b>Cash and Cash Equivalents at Beginning of the Period</b>	185,260	222,551
<b>Cash and Cash Equivalents at the End of the Period</b>	222,551	334,294

Note: Under each item, there are cases of fiscal years in which the monetary importance has been minor being included and represented under another item.

# ESG Data

## SASB INDEX

Relevant performance is organized in accordance with the Electric Utilities & Power Generators industry standards set by the US-based Sustainability Accounting Standards Board (SASB). SASB Standards were created primarily with companies and markets in North America in mind and incorporate some items that do not apply to our business. However, we have attempted to disclose as much information as possible.

Topic	Accounting Metric	Code	Unit	Result
<b>Greenhouse Gas Emissions &amp; Energy Resource Planning*</b>	(1) Gross global Scope 1 emissions	IF-EU-110a.1.	t-CO <sub>2</sub>	48,910,000
	(2) Percentage of Scope 1 emissions under emissions-limiting regulations		%	Not applicable
	(3) Percentage of Scope 1 under emissions-reporting regulations		%	100%
	Greenhouse gas (GHG) emissions associated with power deliveries	IF-EU-110a.2.	t-CO <sub>2</sub>	48,730,000
	Discussion of long-term and short-term strategy or plan to manage Scope 1 Emissions	IF-EU-110a.3.		Aim for net-zero emissions (carbon neutrality) by 2050. Concerning coal-fired power in Japan as we head toward 2030, we will phase out power plants that have become obsolete, starting with the oldest, and upcycle remaining power plants to highly efficient power systems that use hydrogen by adding gasification facilities, thereby reducing emissions. We will also introduce mixed combustion of biomass and ammonia, further reducing emissions.
	Emissions reduction targets			2050 Net-zero emissions 2030 Reduce CO <sub>2</sub> emissions from the J-POWER Group's domestic power generation business: 46% (22.5 million t-CO <sub>2</sub> )* <sup>3</sup> FY2025 Reduce CO <sub>2</sub> emissions from the J-POWER Group's domestic power generation business: 9.2 million t-CO <sub>2</sub> * <sup>3</sup>
	Analysis of performance against the above targets			In order to cut FY2030 CO <sub>2</sub> emissions from the J-POWER Group's domestic power generation business 46% (22.5 million t-CO <sub>2</sub> )* <sup>3</sup> , we added 9.2 million t reduction by FY2025 as an interim target and are moving forward with plans to implement the above reductions.
	(1) Number of customers served in markets subject to renewable portfolio standards (RPS)	IF-EU-110a.4	Cases	Not applicable (The RPS law which established RPS regulations in Japan was abolished in 2012 and has shifted to a feed-in tariff system.)
	(2) Percentage fulfillment of RPS target by market		%	
<b>Air Quality**</b>	(1) NOx	IF-EU-120a.1.	t, %	24,500 tons, [100%] The percentage value indicates emission rate in densely populated areas.
	(2) SOx		t, %	9,300 tons, [100%] The percentage value indicates emission rate in densely populated areas.
	(3) Particulate matter (PM <sub>10</sub> )		t, %	Undisclosed, as we have not adopted measurement methods recommended by the SASB Standards.
	(4) Lead (Pb)		t, %	Undisclosed, as we have not adopted measurement methods recommended by the SASB Standards.
	(5) Mercury (Hg)		t, %	Undisclosed, as we have not adopted measurement methods recommended by the SASB Standards.
<b>Water Management**</b>	(1) Total water withdrawn	IF-EU-140a.1.	thousand m <sup>3</sup> , %	60,736,000 thousand m <sup>3</sup> , [0%] The percentage value indicates the proportion of areas with high/extremely high water stress.
	(2) Total water consumed		thousand m <sup>3</sup> , %	14,900 thousand m <sup>3</sup> , [45%] The percentage value indicates the proportion of areas with high/extremely high water stress.
	Number of incidents of non-compliance associated with water quantity and/or quality permits, standards, and regulations	IF-EU-140a.2.	Cases	0
	Description of water management risks and discussion of strategies and practices to mitigate those risks	IF-EU-140a.3.		The Company manages the following risks related to the use of water resources, which are essential to its power generation business. In the hydroelectric power generation business, the amount of water withdrawal permitted by law is observed, and as shown in* <sup>4</sup> , the river environment is maintained by discharging water from rivers exceeding a certain size. In the thermal power generation business, we are working to reduce water intake by recovering and reusing water for power generation. In addition, seawater is used as indirect cooling water for power generation facilities, and we comply with the levels stipulated in environmental conservation agreements. WRI Aqueduct (3.0) is used to locate water risks for the hydroelectric and thermal power plants of consolidated subsidiaries that use large amounts of water resources. As a result, while no power plants operate in places with high water stress in Japan, there are many thermal power plants located in regions with high water stress overseas. In such overseas areas, we are reducing water intake/consumption and operational risk by reusing water discharges after treatment and constructing reservoirs by taking each site's environment into account.
<b>Coal Ash Management**</b>	Amount of coal combustion residuals (CCR) generated and percentage recycled	IF-EU-150a.1.	t, %	1,643,000 tons (95.8%)
	Number of CCR impoundments	IF-EU-150a.2.	Cases	3

\*1 The figure is calculated for J-POWER and its domestic and overseas consolidated subsidiaries and equity method affiliates (Electric Power Business, Overseas Business, Electric Power Related Business, etc.).

\*2 The figure is calculated for J-POWER and its domestic and overseas consolidated subsidiaries (Electric Power Business, Overseas Business, Electric Power Related Business, etc.), without taking into account the ratio of capital contribution.

\*3 All of these reductions are compared to FY2013.

\*4 The length of the section of the river where water intake for hydroelectric power generation reduces water flow is 10 km or more and the catchment area is 200 km<sup>2</sup> or more, etc.

## ESG Data

### SASB INDEX

Topic	Accounting Metric	Code	Unit	Result
<b>Energy Affordability</b>	(1) Retail electric rate for residential customers	IF-EU-240a.1.		Not disclosed for competitive reasons due to deregulation of the electric power industry
	(2) Retail electric rate for commercial customers			
	(3) Average retail electric rate for industrial customers			
	Typical monthly electric bill for residential customers for (1) 500 kWh of electricity delivered per month	IF-EU-240a.2.		
	Typical monthly electric bill for residential customers for (2) 1,000 kWh of electricity delivered per month			
	(1) Number of residential customer electric disconnections for non-payment	IF-EU-240a.3.		
(2) Percentage reconnected within 30 days				
<b>Workforce Health &amp; Safety</b>	(1) Total recordable incident rate (statistic count × 200,000 / hours worked)	IF-EU-320a.1.		0.18 (Employees: 0.10.; Outsourcing & other contractors: 0.21) (Calculations are for J-POWER, five major J-POWER Group companies,* and cooperating companies.)
	(2) Fatality rate (number of cases)		Cases	0
	(3) Near miss frequency rate (statistic count × 200,000 / hours worked)			Undisclosed, as we have not adopted measurement methods recommended by the SASB Standards
<b>End-Use Efficiency &amp; Demand</b>	Decoupled percentage	IF-EU-420a.1.	%	Not applicable (Not applicable as no customers in Japan have adopted the decoupling and LRAM)
	Lost revenue adjustment mechanism (LRAM) percentage		%	
	Percentage of electric load (MWh) served by smart grid technology	IF-EU-420a.2.		Not disclosed for competitive reasons due to deregulation of the electric power industry
	Customer electricity savings from efficiency measures, by market	IF-EU-420a.3.	MWh	Not applicable
<b>Nuclear Safety &amp; Emergency Management</b>	Total number of nuclear power units	IF-EU-540a.1.	Number of units	1 (Ohma Nuclear Power Plant) (The starting operation date is undetermined since the Ohma Nuclear Power Plant is currently under construction and review by the Nuclear Regulation Authority of its compliance with the New Safety Standards for Nuclear Power Stations.)
	Description of efforts to manage nuclear safety and emergency preparedness	IF-EU-540a.2.		We will work to improve safety by aptly implementing safety activities based on the quality management system for nuclear safety led by our president, and by steadily undertaking continuous improvement through the Corrective Action Program (CAP). Furthermore, with "safety first" as our organizational culture and with awareness among all of us of the roles and the importance of our work duties, we engage in activities to foster and maintain a culture of nuclear safety by which we continuously improve ourselves.
<b>Grid Resiliency</b>	Number of incidents of non-compliance with physical and/or cybersecurity standards or regulations	IF-EU-550a.1.		Not disclosed due to risks associated with disclosure
	(1) System Average Interruption Duration Index (SAIDI)	IF-EU-550a.2.		Not applicable (J-POWER Transmission Network Co., Ltd., a consolidated subsidiary of the Company, owns electric power transmission and substation facilities and engages in electricity transmission as stipulated in the Electricity Business Act, but does not own distribution facilities and does not engage in the business of supplying electricity to end users. This is currently placed under the roles of individual transmission system operators (TSOs) that engage in grid operations in specific areas.)
	(2) System Average Interruption Frequency Index (SAIFI)			
(3) Customer Average Interruption Duration Index (CAIDI)				


\* Major consolidated subsidiaries to which J-POWER outsources electric power facilities maintenance. J-POWER Business Service Corporation, J-POWER HYTEC Co., Ltd., J-POWER Generation Service Co., Ltd., J-POWER Telecommunication Service Co., Ltd., J-POWER Design Co., Ltd.

### Activity Metrics

Business metrics	Unit	Result
Number of: (1) residential, (2) commercial, and (3) industrial customers served	Cases	Not disclosed for competitive reasons due to deregulation of the electric power industry
Total electricity delivered to: (1) residential, (2) commercial, (3) industrial, (4) all other retail customers, and (5) wholesale customers	MWh	Not disclosed for competitive reasons due to deregulation of the electric power industry
Length of transmission and distribution lines	km	2,410.2 km
Total electricity generated, percentage by major energy source, percentage in regulated markets	MWh,%	(1) 69,880,969 MWh (2) Hydroelectric: 12.7% Thermal: 85.8% Wind: 1.5% (3) Not applicable (Marked "Not applicable" as there are no "regulated markets" in Japan)
Total wholesale electricity purchased	MWh	Not disclosed for competitive reasons due to deregulation of the electric power industry

## ESG Data

### Other ESG data



**Translation**

The following is an English translation of an independent assurance report prepared in Japanese and is for information and reference purposes only. In the event of a discrepancy between the Japanese and English versions, the Japanese version will prevail.

August 4, 2023

**Independent Assurance Report**

TO:  
Mr. Hitoshi Kanno  
Representative Director President and Chief Executive Officer  
Electric Power Development Co., Ltd.

Engagement Partner-Takefumi Kawasaki  
Engagement Partner-Yasuo Maeda  
Ernst & Young ShinNihon LLC  
Tokyo, Japan

We, Ernst & Young ShinNihon LLC, have been commissioned by Electric Power Development Co., Ltd. (hereafter the "Company") and have carried out a limited assurance engagement on the Key Environmental Performance Indicators (hereafter the "Indicators") of the Company and its major subsidiaries for the year ended March 31, 2023 as included in J-POWER Group Integrated Report 2023 (hereafter the "Report"). The scope of our assurance procedures was limited to the Indicators marked with the symbol "★" in the Report.

1. **The Company's Responsibilities**  
The Company is responsible for preparing the Indicators in accordance with the Company's own criteria, which it determined with consideration of Japanese environmental regulations as presented in the Investor Relations, IR Library, Integrated Reports, Supplementary Material: Environment of the Company's website. Greenhouse gas (GHG) emissions are estimated using emissions factors, which are subject to scientific and estimation uncertainties, given instruments for measuring GHG emissions may vary in characteristics, in terms of functions and assumed parameters.
2. **Our Independence and Quality Control**  
We have met the independence requirements of the Code of Ethics for Professional Accountants issued by the International Ethics Standards Board for Accountants, which is based on the fundamental principles of integrity, objectiveness, professional competence and due care, confidentiality, and professional behavior. In addition, we maintain a comprehensive quality control system, including documented policies and procedures for compliance with ethical rules, professional standards, and applicable laws and regulations in accordance with the International Standard on Quality Management ("ISQM") 1 issued by the International Auditing and Assurance Standards Board.
3. **Our responsibilities**  
Our responsibility is to express a limited assurance conclusion on the Indicators included in the Report based on the procedures we have performed and the evidence we have obtained. We conducted our limited assurance engagement in accordance with the International Standard on Assurance Engagements: Assurance Engagements Other than Audits or Reviews of Historical Financial Information - ("ISAE 3000") (Revised), and with respect to GHG emissions, the International Standard on Assurance Engagements: Assurance Engagements on Greenhouse Gas Statements ("ISAE 3410"), issued by the International Auditing and Assurance Standards Board. The procedures, which we have performed according to our professional judgment, include inquiries, document inspection, analytical procedures, reconciliation between source documents and Indicators in the Report and the following:
  - Making inquiries regarding the Company's own criteria that it determined with consideration of Japanese environmental regulations, and evaluating the appropriateness thereof;
  - Inspecting relevant documents with regard to the design of the Company's internal controls related to the Indicators, and inquiring of personnel responsible thereof at the headquarters and one power station;
  - Performing analytical procedures concerning the Indicators at the headquarters and one power station; and
  - Testing, on a sample basis, underlying source information and conducting relevant re-calculations at the headquarters and one power station.

The procedures performed in a limited assurance engagement are more limited in nature, timing and extent than a reasonable assurance engagement. As a result, the level of assurance obtained in a limited assurance engagement is lower than would have been obtained if we had performed a reasonable assurance engagement.
4. **Conclusion**  
Based on the procedures performed and evidence obtained, nothing has come to our attention that causes us to believe that the Indicators included in the Report have not been measured and reported in accordance with the Company's own criteria that it determined with consideration of Japanese environmental regulations.

Note: The original of the above Assurance report is kept separately by the Company.

According to the requirements of the Assurance/Registration Scheme of Sustainability Reports of the Japanese Association of Assurance Organizations for Sustainability Information, the environmental data included in this Integrated Report has been audited by Ernst & Young ShinNihon LLC for accuracy and completeness of key sustainability information, and we have obtained an Independent Third-Party Assurance Report.

In addition, data that is assured to be based on the calculation standards is denoted with a ★ mark.

For the standards and scope of the calculations, please refer to the "J-POWER Group Integrated Report 2023 Supplementary Material: Environment."

### Environmental Impact Data for Domestic Operations

	Unit	FY2020	FY2021	FY2022 ★
<b>Amount of electricity</b>				
Power generation volume	billion kWh	66.4	62.3	59.6
Electricity sales volume	billion kWh	61.5	57.6	54.8
<b>Energy consumed</b>				
Coal (usage consumption intensity)	million tons (t/million kWh)	17.05 (3.34)	15.65 (3.34)	15.14 (3.37)
Natural gas	million Nm <sup>3</sup>	56	44	0
Heavy oil	thousand t/kl	36	37	25
Light oil	thousand tons	29	28	24
Biomass	thousand tons	36	32	122
Purchased electric power	billion kWh	0.106	0.118	0.098
<b>Water resources</b>				
Industrial use water	million m <sup>3</sup>	9.78	8.5	9.29
Volume of water used	million m <sup>3</sup>	0.29	0.3	0.27
Volume of water discharged	million m <sup>3</sup>	4.85	4.91	4.43
<b>Waste</b>				
Volume generated (volume recycled)	million tons (%)	2.05 (99.2%)	1.98 (97.7%)	1.95 (96.2%)
Of which is coal ash (volume recycled)	million tons (%)	1.69 (99.9%)	1.65 (98.3%)	1.64 (95.8%)
Of which is gypsum (volume recycled)	million tons (%)	0.29 (99.8%)	0.27 (97.3%)	0.28 (99.9%)
Amount of industrial waste disposed	thousand tons	16	46	75
Of which is specially-controlled	thousand tons	0.5	0.7	0.3
General waste disposal volume (used paper)	t	29	20	18
<b>Emissions into the atmosphere</b>				
NOx emissions (emission intensity)	thousand t (g/kWh)	24.2 (0.44)	23.0 (0.46)	23.0 (0.48)
SOx emissions (emission intensity)	thousand t (g/kWh)	10.8 (0.20)	10.5 (0.21)	9.3 (0.19)
Dust emissions (emission intensity)	thousand t (g/kWh)	0.6 (0.01)	0.5 (0.01)	0.7 (0.01)
N <sub>2</sub> O	t-CO <sub>2</sub>	170,000	160,000	93,000
SF <sub>6</sub>	t-CO <sub>2</sub>	600	8,300	3,200

\*1 Coal intensity is the amount of coal consumed divided by the electricity sales volume of thermal power plants.

\*2 The basic unit for NOx, SOx, and soot and dust is calculated based on the amount of electricity generated at thermal power plants, which are the source of emissions.

\*3 Beginning this year, greenhouse gas emissions of N<sub>2</sub>O and SF<sub>6</sub> are listed in terms of CO<sub>2</sub> equivalents. (Until last year, emissions of N<sub>2</sub>O and SF<sub>6</sub> themselves were listed, which differs from the values listed in Integrated Reports 2021 and 2022.)



# ESG Data

## Other ESG data

### Greenhouse Gas Emissions\*1,2

	Unit	FY2020	FY2021	FY2022★	
<b>Scope 1</b>		<b>53.58</b>	<b>47.95</b>	<b>48.91</b>	
Domestic power generation business		45.38	41.62	40.64	
Overseas power generation business		5.36	4.90	7.94	
Other		2.84	1.42	0.33	
<b>Scope 2 (Location criteria)</b>		<b>0.13</b>	<b>0.14</b>	<b>0.15</b>	
<b>Scope 2 (Market criteria)</b>		<b>—</b>	<b>—</b>	<b>0.15</b>	
<b>Scope 3</b>		<b>15.27</b>	<b>13.60</b>	<b>13.17</b>	
(1) Purchased goods and services	million t-CO <sub>2</sub>	—	0.31	0.27	
(2) Capital goods		—	0.44	0.40	
(3) Fuel and energy-related activities not included in Scope 1 and 2		—	3.84	4.43	
(5) Waste generated in operations		—	0.08	0.10	
(6) Business travels		—	0.001	0.001	
(7) Employee commuting		—	0.002	0.002	
(9) Down-stream transportation and distribution		—	1.02	0.15	
(11) Use of sold products		—	6.21	6.37	
(15) Investments		—	1.69	1.45	
<b>Total</b>			<b>68.98</b>	<b>61.68</b>	<b>62.23</b>

### Electricity Sales Volume per unit of CO<sub>2</sub> Emissions

	Unit	FY2020	FY2021	FY2022★
Domestic and overseas power generation business	kg-CO <sub>2</sub> /kWh	0.65	0.64	0.64
Domestic power generation business		0.71	0.70	0.71

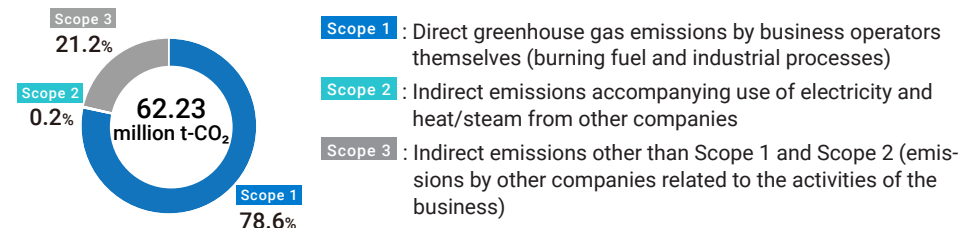
\*1 The scope of coverage includes J-POWER and its consolidated subsidiaries and equity-method affiliates in the Electric Power Business and Oversea Business.

Consolidated subsidiaries and equity-method affiliates are aggregated for the portion equivalent to J-POWER's equity stake.

\*2 Due to the nature of the products and services sold and the nature of the business, there is no energy consumption in the following categories.

- (4) Transportation and delivery (upstream)
- (8) Leased assets (upstream)
- (10) Processing of sold products
- (12) Disposal of sold products
- (13) Leased assets (downstream)
- (14) Franchise

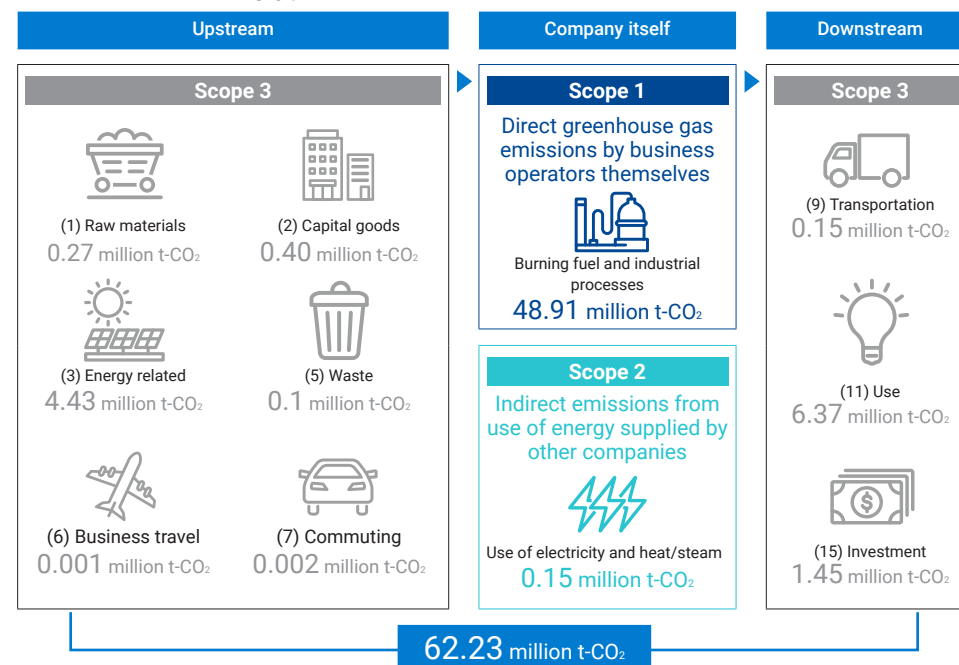
### FY2022 Greenhouse gas emission results



**Scope 1** : Direct greenhouse gas emissions by business operators themselves (burning fuel and industrial processes)

**Scope 2** : Indirect emissions accompanying use of electricity and heat/steam from other companies

**Scope 3** : Indirect emissions other than Scope 1 and Scope 2 (emissions by other companies related to the activities of the business)



#### Calculation methods in each Scope 3 category

- (1) Calculated by multiplying each product or service purchased by respective emission factor
- (2) Calculated by multiplying the capital investment by the emissions intensity
- (3) Sum of the following two values
  - 1) Emissions from production and transportation of fuel used by the company
  - 2) Calculated by multiplying the amount of electricity procured from sources other than the company by the emission intensity
- (5) Calculated by multiplying the amount of emissions by waste type by the emissions intensity of each treatment method
- (6) Calculated by multiplying the number of employees by the emissions intensity
- (7) Calculated by multiplying the number of employees and number of business days by type of work and by rank of employee, respectively, by emission intensity
- (9) Calculated by multiplying the ton-kilometers of sold coal transported by emission intensity
- (11) Calculated by multiplying the volume of coal sold by the emissions intensity
- (15) CO<sub>2</sub> emissions from power plants in which J-POWER's equity portion is 20%

# ESG Data

## Other ESG data

### Society

Accounting Metric		Unit	Result			
			FY2020	FY2021	FY2022	
<b>Human resources<sup>*1</sup></b>	Number of employees (consolidated) <sup>*2</sup>	Male	Persons	6,289	6,229	6,147
		Female	Persons	867	917	931
		Total	Persons	7,156	7,146	7,078
	Managers	Male	Persons	1,312	1,385	1,398
		Female	Persons	17	19	20
		Percentage of women	%	1.3	1.4	1.4
	Number of new graduates hired	Male	Persons	92	89	81
		Female	Persons	11	15	16
		Total	Persons	103	104	97
	Percentage of people with disabilities employed <sup>*3</sup>		%	2.39	2.45	2.42
	Average length of continuous service, years	Male	Years	20.4	20.4	19.7
		Female	Years	10.1	9.8	9.6
		Total	Years	19.8	19.7	19.0
	Average annual salary <sup>*4</sup>	Total	Yen	7,967,061	7,939,362	8,045,816
	Ratio of women's to men's wages <sup>*5,6</sup>	20s and younger	%	—	96.3	96.1
		30s	%	—	95.7	97.9
		40 and over	%	—	103.6	105.7
	Turnover rate for the three years after joining		%	2.5	4.4	6.4
	Total actual working hours per person		Hours	1,943	1,976	1,951
	Overtime hours worked per person		Hours/Month	20.2	21.8	21.4
Days of paid vacation taken per person		Days	14.9	15.4	16.4	
Utilization rate of childcare leave <sup>*7</sup>	Male	%	—	—	86	
	Female	%	—	—	100	
	Total	%	—	—	88	
Average age		Age	42.1	42.0	41.5	
<b>Human resources Development<sup>*1</sup></b>	Average training time per employee		Hours	24.7	34.2	33.9
	Average training expenses per employee		Thousand yen	204	232	245

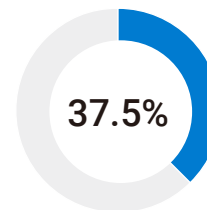
\*1 Unless specified otherwise, human resource-related and human resource development-related data are for J-POWER only.  
 \*2 J-POWER Group employees (excluding temporary employees)  
 \*3 Currently as of June 1 of each fiscal year  
 \*4 Average annual salary includes non-standard wages and bonuses. Management and other employees are not included.  
 \*5 Comparison of base salaries of employees in a career-track position. Ratio of female to male wages.  
 \*6 (Reference) Difference in wages between male and female workers calculated based on the Act on the Promotion of Women's Active Engagement in Professional Life, all employees (57.6%), regular employees (57.9%), non-regular employees (65.7%)  
 \*7 The Company manages the utilization rate of childcare leave for each fiscal year of the birth of an employee's child, and the percentage of employees whose children become two years old in the relevant fiscal year is shown.

Accounting Metric		Unit	Result			
			FY2020	FY2021	FY2022	
<b>Occupational Health and Safety</b>	Number of occupational accidents <sup>*8</sup>					
	Fatal accidents	J-POWER, only	Persons	0	0	0
		Major five companies <sup>*9</sup> + cooperating companies	Persons	1	0	0
		Total	Persons	1	0	0
	Serious injuries	J-POWER, only	Persons	0	0	0
		Major five companies <sup>*9</sup> + cooperating companies	Persons	7	11	8
		Total	Persons	7	11	8
	Minor injuries	J-POWER, only	Persons	1	0	2
		Major five companies <sup>*9</sup> + cooperating companies	Persons	5	11	5
		Total	Persons	6	11	7
	Frequency <sup>*10</sup>	J-POWER, only	—	0.85	1.27	0.91
Major five companies <sup>*9</sup> + cooperating companies		—	1.95	2.09	2.06	
Industry-wide		—	0.49	0.06	0.05	
Severity <sup>*11</sup>	J-POWER, only	—	0.09	0.09	0.09	
	Major five companies <sup>*9</sup> + cooperating companies	—	0.09	0.09	0.09	
Industry-wide	—	0.09	0.09	0.09		

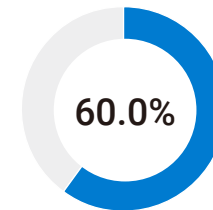
\*8 The number of fatalities and lost-workday injuries among work-related accidents involving J-POWER employees and work-related accidents involving contractors (primary contractors and subcontractors) involved in construction and operations ordered by J-POWER.  
 \*9 Major consolidated subsidiaries to which J-POWER outsources facilities maintenance. J-POWER Business Service Corporation, J-POWER HYTEC Co., Ltd., J-POWER Generation Service Co., Ltd., J-POWER Telecommunication Service Co., Ltd., J-POWER Design Co., Ltd.  
 \*10 Frequency = number of fatalities and injuries due to industrial accidents / total number of actual hours worked × 1,000,000  
 \*11 Severity = total number of days of labor loss/total number of actual hours worked × 1,000

### Governance (As of June 28, 2023)

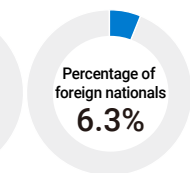
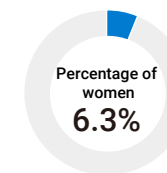
Percentage of Outside Directors on the Board of Directors



Percentage of Outside Officers on the Nomination and Compensation Committee



Composition of Directors





# Major Group Companies

## Consolidated Subsidiaries (As of March 31, 2023)

Company Name	Main Businesses	Equity Stake (%)
<b>Electric Power Business</b>		
J-POWER Transmission Network Co., Ltd.	Transmission business	100.0
J-Wind Kaminokuni, Ltd.	Wind power business	100.0
J-Wind Co., Ltd.	Wind power business	100.0
J-Wind KUZUMAKI Co., Ltd.	Wind power business	100.0
J-Wind SETANA Co., Ltd.	Wind power business	100.0
Nagasaki-Shikamachi Wind Power Co., Ltd.	Wind power business	70.0
Ishikari Green Energy Co., Ltd.	Wind power business	70.0 (70.0)
Esashi Green Energy Co., Ltd.	Wind power business	70.0 (70.0)
<b>Electric Power-Related Business</b>		
J-POWER AUSTRALIA PTY. LTD.	Investment in coal mines in Australia	100.0
J-POWER Generation Service Co., Ltd.	Operation of thermal power plants; sale of fly ash; ocean transportation of coal for thermal power plants; research, planning, and analysis of environmental conservation	100.0
J-POWER HYTEC Co., Ltd.	Construction, technical development, design, consulting, maintenance, and research for hydroelectric power plants, substations, and transmission lines; surveying of and compensation for construction sites; civil engineering, construction management, and construction services	100.0
J-POWER Business Service Corporation	Operation of welfare facilities; facility maintenance; business process outsourcing; development of computer software; import and sale of fuel for power generation	100.0
J-POWER EnTech Inc.	Engineering services for atmospheric and water pollutant removal equipment	100.0
J-POWER Telecommunication Service Co., Ltd.	Construction and maintenance of electronic and communications facilities, telecommunications, etc.	100.0
J-POWER Design Co., Ltd.	Design, management, and research for electric power facilities and other facilities and construction consulting	100.0
Miyazaki Wood Pellet Co., Ltd.	Operation of manufacturing facilities of wood pellets and procurement of forest offcut	98.3
JM Activated Coke, Inc.	Manufacturing, sales, and marketing of activated coke	90.0
J-Wind Service Co., Ltd.	Maintenance and operation of wind power plants	100.0 (100.0)
EPDC CoalTech and Marine Co., Ltd.	Ocean transportation of ash and fly ash	100.0 (100.0)

- Notes: 1. The percentages in parentheses represent indirect holding ratios and are included in the percentages above.  
2. J-POWER AUSTRALIA PTY. LTD., JP Renewable Europe Co., Ltd., J-POWER Holdings (Thailand) Co., Ltd., J-POWER Jackson Capital, LLC, J-POWER Jackson Partners, LLC, Jackson Generation, LLC, Gulf JP Co., Ltd., Gulf JP UT Co., Ltd. and Gulf JP NS Co., Ltd. are specified subsidiaries.  
3. Jackson Generation, LLC's ownership of voting rights decreased to 51% due to the partial transfer of its interest on February 27, 2023.

Company Name	Main Businesses	Equity Stake (%)
<b>Overseas Business</b>		
JP Renewable Europe Co., Ltd.	Management of investments	100.0
J-Power Investment Netherlands B.V.	Management of investments	100.0
J-POWER Consulting (China) Co., Ltd.	Management of investments, research and development of projects	100.0
JP Generation Australia Pty. Ltd.	Management of investments, research and development of projects	100.0
J-POWER North America Holdings Co., Ltd.	Management of investments	100.0
J-POWER Holdings (Thailand) Co., Ltd.	Management of investments	100.0 (100.0)
J-POWER Generation (Thailand) Co., Ltd.	Management of investments, research and development of projects	100.0 (100.0)
JPGA Partners Pty. Ltd.	Management of investments	100.0 (100.0)
J-POWER USA Investment Co., Ltd.	Management of investments	100.0 (100.0)
J-POWER USA Development Co., Ltd.	Management of investments, research and development of projects	100.0 (100.0)
J-POWER Renewables Capital, LLC	Development business	100.0 (100.0)
J-POWER Jackson Capital, LLC	Management of investments	100.0 (100.0)
J-POWER Jackson Partners, LLC	Management of investments	100.0 (100.0)
Jackson Generation, LLC	Thermal power business	100.0 (100.0)
J-POWER Alaska Development, LLC	Development business	100.0 (100.0)
Gulf JP Co., Ltd.	Management of investments	60.0 (60.0)
Gulf JP UT Co., Ltd.	Thermal power business	60.0 (60.0)
Gulf JP NS Co., Ltd.	Thermal power business	60.0 (60.0)
Gulf JP NNK Co., Ltd.	Thermal power business	60.0 (60.0)
Gulf JP CRN Co., Ltd.	Thermal power business	60.0 (60.0)
Gulf JP NK2 Co., Ltd.	Thermal power business	60.0 (60.0)
Gulf JP TLC Co., Ltd.	Thermal power business	60.0 (60.0)
Gulf JP KP1 Co., Ltd.	Thermal power business	60.0 (60.0)
Gulf JP KP2 Co., Ltd.	Thermal power business	60.0 (60.0)
Gulf JP1 Co., Ltd.	Solar power business	60.0 (60.0)
Gulf JP NLL Co., Ltd.	Thermal power business	45.0 (45.0)

### Other Businesses

Kaihatsu Hiryou Co., Ltd.	Production and sales of fertilizer using ash	100.0
Omuta Plant Service Co., Ltd.	Operation and maintenance of a waste-fueled power generation plant	100.0
J-POWER Latrobe Valley Pty. Ltd.	Participating in Australian Brown Coal Hydrogen Pilot Test Project	100.0
Biocoal Osaka-Hirano Co., Ltd.	Construction and operation of a sewage sludge-based fuel manufacturing facility	60.0
Green Coal Saikai Co., Ltd.	Operation of an ordinary waste-based fuel manufacturing facility	60.0

and 1 other company

## Major Group Companies

### Affiliates Accounted for by the Equity Method (As of March 31, 2023)

Company Name	Main Businesses	Equity Stake (%)
<b>Electric Power Business</b>		
Kashima Power Co., Ltd.	Thermal power business	50.0
Yuzawa Geothermal Power Generation Corporation	Geothermal power business	50.0
Osaki CoolGen Corporation	Large-scale demonstration trials of oxygen-blown IGCC and CO <sub>2</sub> separation and capture	50.0
Suzuyo Power Co., Ltd.	Electricity sale	49.9
TOSA POWER Inc.	Thermal power business	45.0
ENERES Co., Ltd.	Energy-related consulting business, power generation business, etc.	41.0
Hibiki Wind Energy Co., Ltd.	Offshore wind power generation surveying	40.0
Appi Geothermal Energy Corporation and 3 other companies	Geothermal power business	15.0

Company Name	Main Businesses	Equity Stake (%)
<b>Overseas Business</b>		
JM Energy Co., Ltd.	Management of investments	50.0
PT. BHIMASENA POWER INDONESIA	Thermal power business	34.0
Shaanxi Hanjiang Investment & Development Co., Ltd.	Hydroelectric power business	27.0
CBK Netherlands Holdings B.V.	Management of investments	50.0 (50.0)
J-POWER USA Generation, L.P.	Management of investments	50.0 (50.0)
Birchwood Power Partners, L.P.	Thermal power business	50.0 (50.0)
Birchwood Renewables, LLC	Development business	50.0 (50.0)
Gulf Electric Public Co., Ltd.	Management of investments	49.0 (49.0)
Gulf Power Generation Co., Ltd.	Thermal power business	49.0 (49.0)
Nong Khae Cogeneration Co., Ltd.	Thermal power business	49.0 (49.0)
Samutprakarn Cogeneration Co., Ltd.	Thermal power business	49.0 (49.0)
Gulf Cogeneration Co., Ltd.	Thermal power business	49.0 (49.0)
Gulf Yala Green Co., Ltd.	Thermal power business	49.0 (49.0)
EGCO Green Energy Co., Ltd.	Management of investments	26.0 (26.0)
Triton Knoll Offshore Wind Farm Ltd.	Wind power business	25.0 (25.0)
Tenaska Pennsylvania Partners, LLC	Thermal power business	25.0 (25.0)
EGCO Cogeneration Co., Ltd.	Thermal power business	20.0 (20.0)
CBK Power Co., Ltd.	Hydroelectric power business	– [100.0]
Green Country Energy, LLC	Thermal power business	– [100.0]
Pinelawn Power LLC	Thermal power business	– [100.0]
Equus Power I, L.P.	Thermal power business	– [100.0]
Edgewood Energy, LLC	Thermal power business	– [100.0]
Shoreham Energy, LLC	Thermal power business	– [100.0]
Orange Grove Energy, L.P.	Thermal power business	– [100.0]
Elwood Energy, LLC	Thermal power business	– [100.0]
Roi-Et Green Co., Ltd.	Thermal power business	– [95.0]
China Resources Power (Hezhou) Co., Ltd.	Thermal power business	– [34.0]
Tenaska Virginia Partners, L.P.	Thermal power business	– [30.0]
Tenaska Frontier Partners, Ltd.	Thermal power business	– [25.0]
and 50 other companies		

Note: The percentages in parentheses represent indirect holding ratios and are included in the percentages above. Those shown in brackets are the ratios held by closely related parties or parties in agreement and excluded from the percentages above.

# J-POWER Group Facilities

## Power Generation Facilities in Operation\* (As of March 31, 2023) \*Power generation facilities of the Electric Power Business segment and Overseas Business segment.

Domestic, Overseas Total	Generation Capacity 46,360 MW	Owned Capacity 26,037 MW
--------------------------	----------------------------------	-----------------------------

Domestic Total (93 bases)	Generation Capacity 18,491 MW	Owned Capacity 17,970 MW
------------------------------	----------------------------------	-----------------------------

Type	Power Plants	Location (Prefecture)	River System	Start of Operation (Year)	Authorized Output (MW)
Hydroelectric	Horoka	Hokkaido	Tokachigawa	1965	10
	Nukabira	Hokkaido	Tokachigawa	1956	44
	Meto No. 1	Hokkaido	Tokachigawa	1958	27
	Meto No. 2	Hokkaido	Tokachigawa	1958	28
	Ashoro	Hokkaido	Tokachigawa	1955	40
	Honbetsu	Hokkaido	Tokachigawa	1962	25
	Kumaushi	Hokkaido	Tokachigawa	1987	15
	Satsunaigawa	Hokkaido	Tokachigawa	1997	8
	Kuttari	Hokkaido	Tokachigawa	2015	0.5
	Shinkatsurazawa	Hokkaido	Ishikarigawa	2022	16
	Kumaoi	Hokkaido	Ishikarigawa	1957	5
	Towa	Iwate	Kitagamigawa	1954	27
	Isawa No. 1	Iwate	Kitagamigawa	2014	14
	Shimogo (Pumped storage plant)	Fukushima	Aganogawa	1988	1,000
	Otsumata	Fukushima	Aganogawa	1968	38
	Okutadami	Fukushima	Aganogawa	1960	560
	Okutadami (Ecological Flow)	Fukushima	Aganogawa	2003	3
	Otori	Fukushima	Aganogawa	1963	182
	Tagokura	Fukushima	Aganogawa	1959	400
	Tadami	Fukushima	Aganogawa	1989	65
	Taki	Fukushima	Aganogawa	1961	92
	Kurotani	Fukushima	Aganogawa	1994	20
	Kuromatagawa No. 1	Niigata	Shinanogawa	1958	62
	Kuromatagawa No. 2	Niigata	Shinanogawa	1964	17
	Suezawa	Niigata	Shinanogawa	1958	2
	Aburumagawa	Niigata	Shinanogawa	1985	5
	Okukiyotsu (Pumped storage plant)	Niigata	Shinanogawa	1978	1,000
	Okukiyotsu No. 2 (Pumped storage plant)	Niigata	Shinanogawa	1996	600

Type	Power Plants	Location (Prefecture)	River System	Start of Operation (Year)	Authorized Output (MW)
	Numappara (Pumped storage plant)	Tochigi	Nakagawa	1973	675
	Hayakido	Nagano	Tenryugawa	1985	11
	Misakubo	Shizuoka	Tenryugawa	1969	50
	Shintoyone (Pumped storage plant)	Aichi	Tenryugawa	1972	1,125
	Sakuma	Shizuoka	Tenryugawa	1956	350
	Sakuma No. 2	Shizuoka	Tenryugawa	1982	32
	Akiha No. 1	Shizuoka	Tenryugawa	1958	47
	Akiha No. 2	Shizuoka	Tenryugawa	1958	35
	Akiha No. 3	Shizuoka	Tenryugawa	1991	47
	Funagira	Shizuoka	Tenryugawa	1977	32
	Miboro	Gifu	Shougawa	1961	215
	Miboro No. 2	Gifu	Shougawa	1963	59
	Ogamigo	Gifu	Shougawa	1971	20
	Nagano	Fukui	Kuzuryugawa	1968	220
	Yugami	Fukui	Kuzuryugawa	1968	54
	Konokidani	Fukui	Kuzuryugawa	2016	0.2
	Tedorigawa No. 1	Ishikawa	Tedorigawa	1979	250
	Nishiyoshino No. 1	Nara	Shingugawa	1956	33
	Nishiyoshino No. 2	Nara	Kinokawa	1955	13
	Totsugawa No. 1	Nara	Shingugawa	1960	75
	Totsugawa No. 2	Wakayama	Shingugawa	1962	58
	Owase No. 1	Mie	Shingugawa/ Choushigawa	1962	40
	Owase No. 2	Mie	Choushigawa	1961	25
	Ikehara	Nara	Shingugawa	1964	350
	Nanairo	Wakayama	Shingugawa	1965	82
	Komori	Mie	Shingugawa	1965	30
	Yanase	Kochi	Naharigawa	1965	36
	Futamata	Kochi	Naharigawa	1963	72
	Nagayama	Kochi	Naharigawa	1960	37
	Sameura	Kochi	Yoshinogawa	1972	42
	Setoishi	Kumamoto	Kumagawa	1958	20
	Sendaigawa No. 1	Kagoshima	Sendaigawa	1965	120
	Sendaigawa No. 2	Kagoshima	Sendaigawa	1964	15
<b>Total (Domestic Hydroelectric, 61 plants)</b>					<b>8,577</b>

## J-POWER Group Facilities

### Power Generation Facilities in Operation (As of March 31, 2023)

Type	Power Plants	Location (Prefecture)	Start of Operation (Year)	Output Capacity (MW)	Ownership (%)	Owned Capacity (MW)
Wind Power	Setana Seaside	Hokkaido	2005	12	100	12
	Setana-Osato Wind Farm	Hokkaido	2020	50	100	50
	Kaminokuni Wind Farm	Hokkaido	2014	28	100	28
	Esashi	Hokkaido	2023	21	70	15
	New Shimamaki Wind Farm	Hokkaido	2023	4	100	4
	Ohma Wind Farm	Aomori	2016	20	100	20
	Green Power Kuzumaki	Iwate	2003	21	100	21
	Kuzumaki No. 2	Iwate	2020	45	100	45
	Nikaho No. 2	Akita	2020	41	100	41
	Yurihonjo Bayside	Akita	2017	16	100	16
	Koriyama-Nunobiki Kogen	Fukushima	2007	66	100	66
	Hiyama Kogen	Fukushima	2011	28	100	28
	Tokyo Bayside	Tokyo	2003	2	100	2
	Irozaki	Shizuoka	2010	34	100	34
	Tahara Bayside	Aichi	2005	22	100	22
	Tahara	Aichi	2004	2	100	2
	Awara-Kitagata	Fukui	2011	20	100	20
	Yokihinosato Wind Park	Yamaguchi	2003	5	100	5
	Minami Ehime	Ehime	2015	29	100	29
	Nagasaki-Shikamachi Wind Farm	Nagasaki	2005	15	70	11
	Aso-Oguni Wind Farm	Kumamoto	2007	9	100	9
<b>Total (Domestic Wind Power, 21 farms)</b>				<b>488</b>		<b>477</b>
Geothermal	Wasabizawa	Akita	2019	46	50	23
<b>Total (Domestic Geothermal, 1 plant)</b>				<b>46</b>		<b>23</b>

Type	Power Plants	Location (Prefecture)	Start of Operation (Year)	Output Capacity (MW)	Ownership (%)	Owned Capacity (MW)	
Coal-fired	Isogo	Kanagawa	New No. 1	2002	600	100	600
			New No. 2	2009	600	100	600
	Takasago	Hyogo	No. 1	1968	250	100	250
			No. 2	1969	250	100	250
	Takehara	Hiroshima	New No. 1	2020	600	100	600
			No. 3	1983	700	100	700
	Tachibanawan	Tokushima	No. 1	2000	1,050	100	1,050
			No. 2	2000	1,050	100	1,050
	Matsushima	Nagasaki	No. 1	1981	500	100	500
			No. 2	1981	500	100	500
	Matsuura	Nagasaki	No. 1	1990	1,000	100	1,000
			No. 2	1997	1,000	100	1,000
	Ishikawa Coal	Okinawa	No. 1	1986	156	100	156
			No. 2	1987	156	100	156
<b>Thermal (J-POWER): 7 power plants</b>				<b>8,412</b>		<b>8,412</b>	
Coal-fired	Tosa	Kochi		167	45	75	
	Kashima	Ibaraki		645	50	323	
Demonstration tests facility	Osaki CoolGen	Hiroshima		166	50	83	
<b>Thermal (Subsidiaries): 3 power plants</b>				<b>978</b>		<b>481</b>	
<b>Total (Domestic Thermal): 9 power plants, 1 test facility</b>				<b>9,390</b>		<b>8,893</b>	

## J-POWER Group Facilities

### Power Generation Facilities in Operation (As of March 31, 2023)

Overseas Total (37 projects)	Output Capacity 27,869 MW	Owned Capacity 8,067 MW
---------------------------------	------------------------------	----------------------------

Countries	Type	Projects	Output Capacity (MW)	Ownership (%)	Owned Capacity (MW)	Power Purchasers	Validity of Purchase Agreement	
Thailand	Gas-fired (CCGT)	7 SPP*1	790	—	456	EGAT/Companies in the industrial park	Valid to 2038	
		KP1	110	60	66			
		KP2	110	60	66			
		TLC	110	60	66			
		NNK	110	60	66			
		NLL	120	45	54			
		CRN	110	60	66			
		NK2	120	60	72			
	Gas-fired (CCGT)	Nong Seang	1,600	60	960	EGAT	Valid to 2039	
	Gas-fired (CCGT)	U-Thai	1,600	60	960	EGAT	Valid to 2040	
	Solar	Rooftop solar	1	60	1	Company in the industrial park	—	
	<b>Total (Consolidated)</b>			<b>3,991</b>		<b>2,376</b>		
	Biomass (Chaff)	Roi-Et	9	25	2	EGAT	Valid to 2024	
	Gas-fired (CCGT)	EGCO Cogeneration	112	20	22	EGAT/Companies in the industrial park	Valid to 2024	
Biomass (Rubber-Wood Waste)	Yala	20	49	10	EGAT	Valid to 2031		
Gas-fired (CCGT)	Kaeng Khoi 2	1,468	49	719	EGAT	Valid to 2033		
<b>Total (Non-Consolidated)</b>			<b>1,610</b>		<b>754</b>			
<b>Thailand (Total, 14 projects)</b>			<b>5,600</b>		<b>3,130</b>			

Countries	Type	Projects	Output Capacity (MW)	Ownership (%)	Owned Capacity (MW)	Power Purchasers	Validity of Purchase Agreement
The United States	Gas-fired (CCGT)	Tenaska Frontier	830	31	257	ERCOT market and MISO market	—
	Gas-fired (SCGT)*2	Elwood Energy	1,350	50	675	PJM market	—
	Gas-fired (CCGT)	Green Country	795	50	398	SPP market	—
	Gas-fired (CCGT)	Pinelawn	80	50	40	Long Island Power Authority	Valid to 2025
	Gas-fired (CCGT)	Jackson	1,200	51	612	PJM market	—
	Gas-fired (SCGT)	Equus	48	50	24	NYISO market	—
	Gas-fired (CCGT)	Fluvanna	885	15	133	Shell Energy North America	Valid to 2024
	Gas-fired (SCGT)	Edgewood	88	50	44	Long Island Power Authority	Valid to 2023
	Jet Fuel (Simple Cycle)	Shoreham	90	50	45	Long Island Power Authority	Valid to 2023
	Gas-fired (SCGT)	Orange Grove	96	50	48	San Diego Gas & Electric	Valid to 2035
	Gas-fired (CCGT)	Westmoreland	940	25	235	PJM market	—
<b>The United States (Total, 11 projects)</b>			<b>6,402</b>		<b>2,511</b>		
China	Hydroelectric	Hanjiang (Xihe, Shuhe)	450	27	122	Shaanxi Electric Power Company	Renewed every year*4
	Coal-fired, Wind Power, Solar, Pumped Storage	Gemeng*3	9,617	7	673	Shanxi Province Power Corporation	—
	Coal-fired	Hezhou	2,090	17	355	Guanxi Power Grid Co.	Renewed every year*4
	<b>China (Total, 4 projects)</b>			<b>12,157</b>		<b>1,150</b>	
Philippines	Hydroelectric	CBK (3 projects)	728	50	364	National Power Corporation	Valid to 2026
	Hydroelectric	Lake Mainit	25	40	10	ANECO	Valid to 2048
The United Kingdom	Offshore wind	Triton Knoll	857	25	214	Orsted	Valid to 2037
Indonesia	Coal-fired	Batang	2,000	34	680	PLN	Valid to 2047
Australia	Solar	Kidston Stage1	50	7.7	4	NEM market	—
	Solar	Jemalong Solar	50	7.7	4	NEM market	—
<b>Other countries/regions (8 projects)</b>			<b>3,710</b>		<b>1,276</b>		

\*1 The 7 SPPs project, which commenced operation in 2013.

\*2 SCGT (simple cycle gas turbine): A generating system using only a gas turbine.

\*3 Gemeng International Energy Co., Ltd., is an electric power company that owns 16 power generation companies.

\*4 Although power purchase agreements are renewed every year, J-POWER concludes memoranda of understanding regarding power grid connection and management with province-level transmission and distribution companies to, in principle, continuously purchase power for the duration of a given facility's operation.

## J-POWER Group Facilities

### Coal Mine Projects (As of December 31, 2022)

Coal Mine	Location	Outport	2022 Sales Volume (million tons)	Vested Interest (%)	Coal Production Start
Clermont	Queensland, Australia	Dalrymple Bay	9.03	22.2	2010
Narrabri	New South Wales, Australia	Newcastle Port	5.88	7.5	2012
Maules Creek	New South Wales, Australia	Newcastle Port	9.11	10	2014

### Major Transmission and Transformation Facilities\* (As of March 31, 2023)

\*Transmission and transformation facilities are held by J-POWER Transmission Network Co., Ltd., a wholly owned subsidiary of J-POWER.

#### Transmission Facilities

Major Transmission Lines	Beginning of Operation (Year)	Location (Prefecture)	Distance (km)	Voltage (kV)
Tokachi Trunk Line	1956	Hokkaido	214.4	187
Hokkaido-Honshu HVDC Interconnection Line	1979	Hokkaido – Aomori	167.4	DC±250
Tadami Trunk Line	1959	Fukushima – Tokyo metropolitan area	216.3	275-500
Sakuma East Trunk Line	1956	Shizuoka – Tokyo metropolitan area	197.2	275
Sakuma West Trunk Line	1956	Shizuoka – Aichi	107.7	275
Miboro Trunk Line	1960	Gifu – Aichi	108.6	275
Honshu-Shikoku Interconnection Line	1994	Kagawa – Okayama	127.0	500
Kii Channel HVDC Interconnection Line	2000	Tokushima – Wakayama	99.8	DC±250
Nahari Trunk Line	1960	Kochi – Ehime	120.0	187
Kanmon Interconnection Line	1980	Fukuoka – Yamaguchi	64.2	500

#### Substations

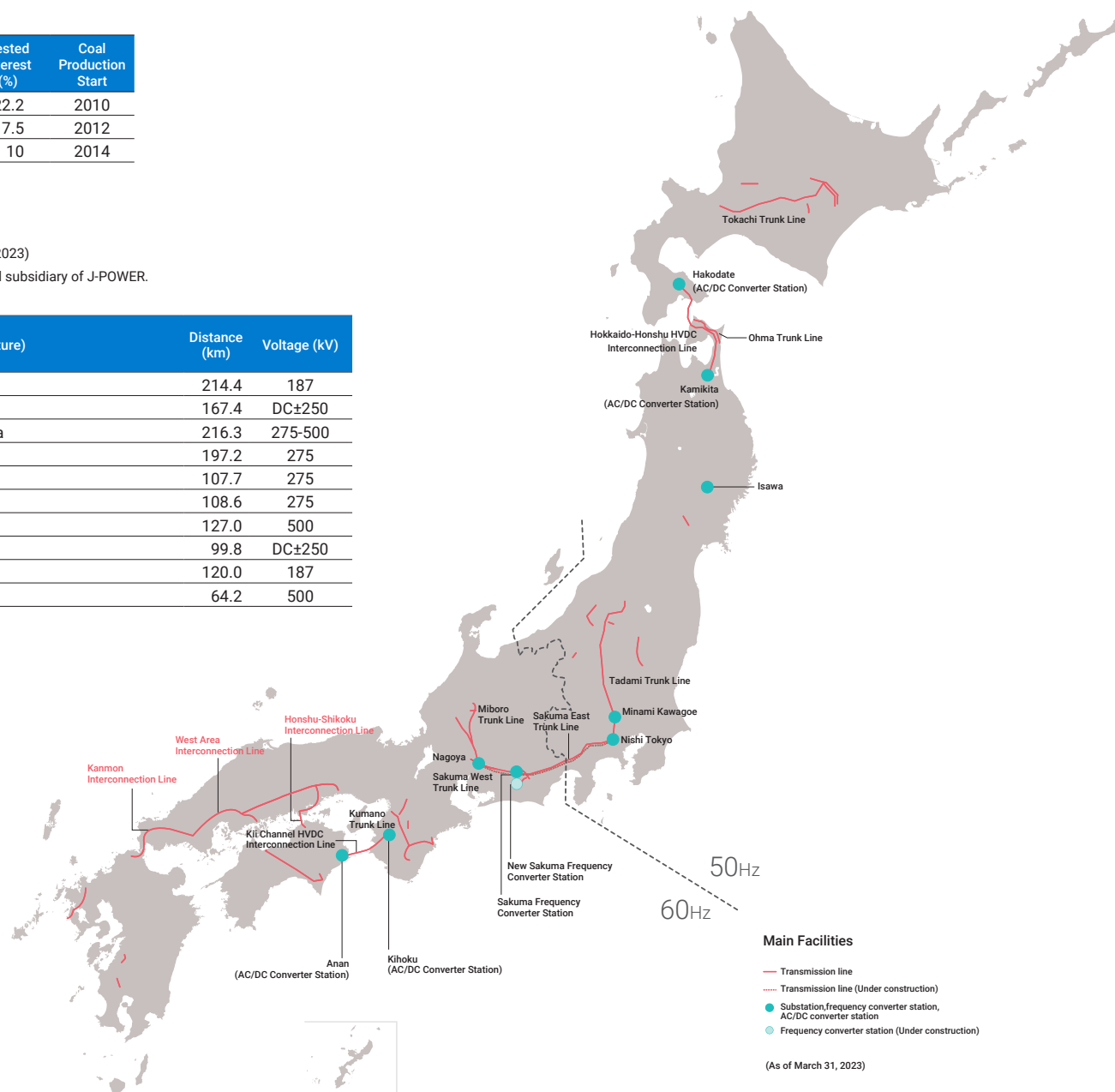
Substations	Beginning of Operation (Year)	Location (Prefecture)	Output (kVA)
Isawa	2012	Oshu City, Iwate	9,000
Minami Kawagoe	1959	Kawagoe City, Saitama	1,542,000
Nishi Tokyo	1956	Machida City, Tokyo	1,350,000
Nagoya	1956	Kasugai City, Aichi	1,400,000

#### Frequency Converter Station

Frequency Converter Station	Beginning of Operation (Year)	Location (Prefecture)	Output (MW)
Sakuma	1965	Tenryu, Hamamatsu City, Shizuoka	30

#### AC/DC Converter Stations

AC/DC Converter Stations	Beginning of Operation (Year)	Location (Prefecture)	Output (MW)
Hakodate	1979	Nanae Town, Kameda, Hokkaido	60
Kamikita	1979	Tohoku Town, Kamikita, Aomori	60
Kihoku	2000	Katsuragi Town, Ito, Wakayama	140
Anan	2000	Anan City, Tokushima	140





## J-POWER Group Facilities

### Major Projects Under Construction or Development

Domestic (As of March 31, 2023)

Type	Projects	Location (Prefecture)	Status	Output Capacity (MW)	Ownership (%)	Owned Capacity (MW)	Start of Operation
<b>Nuclear</b>	Ohma	Aomori	Under construction	1,383	100	1,383	To be determined
<b>Hydroelectric</b>	Suezawa (Repowering)	Niigata	Under construction	1 ▶ 2	100	1 ▶ 2	FY2024
	Ogamigou (Repowering)	Gifu	Preparing for repowering	20 ▶ 21	100	20 ▶ 21	FY2024
	Nagayama (Repowering)	Kochi	Preparing for repowering	37 ▶ 40	100	37 ▶ 40	FY2025
	Onabara	Ishikawa	Preparing for construction	1	100	1	FY2026
<b>Wind Onshore</b>	Kaminokuni No. 2*1	Hokkaido	Under construction	42	100	42	FY2023
	Minami Ehime No. 2	Ehime	Under construction	34	100	34	FY2025
	Ishikari Hachinosawa	Hokkaido	Under construction	21	70	15	FY2023
	New Tomamae (Replacement)	Hokkaido	Under construction	31	100	31	FY2023
	New Saraki Tomanai (Replacement)	Hokkaido	Under construction	15	100	15	FY2023
	New Nikaho (Replacement)	Akita	Under construction	25	100	25	FY2023
	Wajima	Ishikawa	Preparing for construction	90	100	90	FY2027
<b>Offshore</b>	Kitakyushu Hibikinada Offshore	Fukuoka	Under construction	Max 220	40	88	FY2025
<b>Geothermal</b>	Appi	Iwate	Under construction	15	15	2	FY2024
	Onikobe	Miyagi	Under construction*2	15	100	15	FY2023
<b>Solar</b>	Kitakyushu Hibikinada	Fukuoka	Preparing for construction	30	100	30	FY2024
	Himeji Oshio	Hyogo	Preparing for construction	2	100	2	FY2024

#### Under Environmental Impact Assessment

Type	Projects	Location (Prefecture)	Output Capacity (MW)
<b>Wind Onshore</b>	Setana-Futuro	Hokkaido	
	Naka-Noto	Ishikawa	
	Fukui Ono Ikeda	Fukui	
	New Tahara Bayside (Replacement)	Aichi	*3
	Watarai	Mie	
	Kichu	Wakayama	
	Hiroshima-Nishi	Hiroshima	
	Reihoku Kunimiyama	Kochi	

Type	Projects	Location (Prefecture)	Output Capacity (MW)
<b>Wind Onshore</b>	Seiyo Yusuhara	Ehime/Kochi	
	Youra	Oita	
	Aso-Nishihara (Replacement)	Kumamoto	*3
	Minami Osumi (Replacement)	Kagoshima	
	Hisatsu	Kumamoto/Kagoshima	
	Kita-Kagoshima	Kagoshima	

\*1 Data for phase 1 construction of Kaminokuni No. 2. Planned maximum capacity of 120 MW.

\*2 Onikobe began operations in April 2023.

\*3 The maximum output is approximately 800 MW in total at the planned sites undergoing environmental impact assessment procedures.

Overseas (As of March 31, 2023)

Type	Projects	Location	Status	Output Capacity (MW)	Ownership (%)	Owned Capacity (MW)	Start of Operation
<b>Hydroelectric</b>	Bulanog Batang	Philippines	Under development	34	40	13	2029
<b>Pumped storage</b>	K2-Hydro	Australia	Under construction	250	7.7	19	2024
<b>Solar</b>	Refugio	United States	Under development	400	25	100	After 2023
	Rooftop solar (7)	Thailand	Under construction	total 10	60	6	After 2023
<b>Storage</b>	Bouldercombe	Australia	Under construction	50	7.7	39	2023
<b>Onshore wind</b>	Kidston Stage-3 Wind	Australia	Under development	258	53.9**4	139	2026
<b>Thermal</b>	EGCO Cogeneration	Thailand	Under construction	74	20	15	2024

\*4 The total of J-POWER Group 50% equity and 7.7% investment in Genex.

### Major Transmission/Transformation Development Plans\*5

Project	Status	Capacity	Start of Operation
Construction of the New Sakuma Frequency Converter Station and replacement and expansion of related transmission lines	Under construction	New Sakuma Frequency Converter Station: 300 MW Sakuma East Trunk Line: Approx. 141 km	Expansion scheduled or completion at the end of FY2027

\*5 The power transmission and transformation business is handled by J-POWER Transmission Network Co., Ltd., a wholly owned subsidiary of J-POWER.

# Attestation of Validity

## On the issuance of the J-POWER Group Integrated Report 2023



Representative Director President  
and Chief Executive Officer  
Hitoshi Kanno

To deepen understanding of our initiatives aimed at the creation of medium- to long-term value, J-POWER began issuing an Integrated Report in 2019 while engaging in dialogue with stakeholders.

This year's Integrated Report marks our fifth since beginning publication. In it, we reiterate our mission to promote sustainability throughout society by balancing stable energy supply with the response to climate change. This year's report also introduces our competitiveness and business model, which balances growth with our transition to carbon neutrality.

One change from last year is the update of information on the progress of efforts to achieve materiality related key performance initiatives (KPIs) and the progress of efforts based on the J-POWER "BLUE MISSION 2050." We are further improving the content of our disclosures with regard to climate change scenario analysis in accordance with TCFD recommendations through internal discussions based on opinions received through dialogue with our stakeholders.

In addition, the report also introduces initiatives that support the Group's business foundation and drive its growth, such as its strategies for human capital and DX as well as the status of efforts to strengthen corporate governance.

This report was created in partnership with related departments and the Corporate Planning & Administration Department, which primarily handles its editing. As the person in charge of ESG oversight, I attest that the process for creating the report is appropriate and that the content is accurate.

I hope that stakeholders find this report helpful in gaining a deeper understanding of the Group. We will continue to work to further expand the content of the report and make it useful for dialogue with stakeholders.

# Corporate Profile/Stock Information (As of March 31, 2023)

<b>Corporate Name</b>	Electric Power Development Co., Ltd.
<b>Communication Name</b>	J-POWER
<b>Date of Establishment</b>	Sept. 16, 1952
<b>Headquarters</b>	15-1, Ginza 6-chome, Chuo-ku, Tokyo 104-8165, Japan
<b>Paid-in Capital</b>	¥180,502,169,192
<b>Number of Shares Authorized</b>	660,000,000
<b>Number of Shares Issued</b>	183,051,100
<b>Number of Shareholders</b>	95,002
<b>Stock Exchange Listing</b>	Tokyo Stock Exchange
<b>Independent Public Accountants</b>	Ernst & Young ShinNihon LLC
<b>Transfer Agent</b>	Sumitomo Mitsui Trust Bank, Limited

## Major Offices

- Head Office: 15-1, Ginza 6-chome, Chuo-ku, Tokyo
- East Regional Headquarters: Kawagoe-shi, Saitama
- Chubu Regional Headquarters: Kasugai-shi, Aichi
- West Regional Headquarters: Osaka-shi, Osaka

## Major Overseas Subsidiaries

- J-POWER USA Development Co., Ltd.
- J-POWER Generation (Thailand) Co., Ltd.
- J-POWER Consulting (China) Co., Ltd.

## Major Shareholders (Top 10/As of March 31, 2023)

Name or Designation	Number of Shares Held (Thousands of Shares)	Percentage of Total Shares Issued (%)
The Master Trust Bank of Japan, Ltd. (Trust Account)	22,111	12.08
Nippon Life Insurance Company	9,152	5.00
Custody Bank of Japan, Ltd. (Trust Account)	8,308	4.54
Mizuho Bank, Ltd.	5,155	2.82
J-POWER Employees Shareholding Association	4,960	2.71
JP MORGAN CHASE BANK 385635	4,189	2.29
Sumitomo Mitsui Banking Corporation	3,436	1.88
CGML PB CLIENT ACCOUNT/COLLATERAL	3,348	1.83
JP MORGAN CHASE BANK 380072	3,055	1.67
Fukoku Mutual Life Insurance Company	3,029	1.65

## Organization Chart (As of June 28, 2023)



## Composition of Shareholders (As of March 31, 2023)

\* "Individuals and Others" includes 3,331 shares of treasury stock.

