

Mandom Group Environmental Data by Production Site

1: Aggregation Area: Japan (Production Site: Fukusaki Factory), Overseas (Production Sites: Indonesia, China)

2: Aggregation Period: Japan: April of the listed fiscal year to the following March, Overseas: January to December of the listed fiscal year

Production Site Overview

Country	Name of Factory	Site area (m ²)	Floor area (m ²)	Note
Japan	Fukusaki Factory	71,058	37,730	
Indonesia	Head Office / Sunter Factory	36,153	41,939	Head Office / Sunter Factory was relocated in June 2015 and has since been operating under the name Head Office / Factory 1. During the same period, the name of Cibitung Factory was changed to Factory 2.
	Cibitung Factory	54,442	39,884	
	Head Office / Factory1	147,936	59,620	
	Factory2	54,442	39,884	
China	Zhongshan Factory	27,253	5,972	

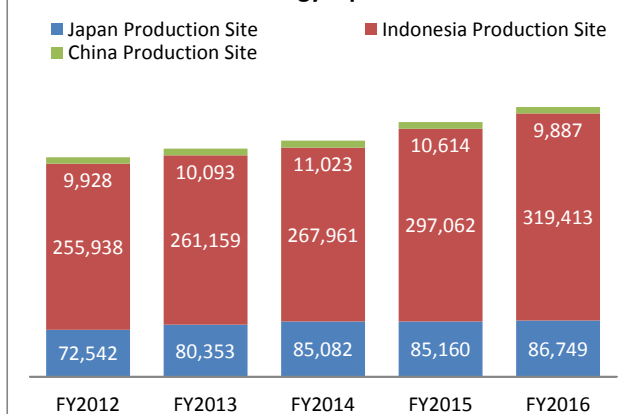
Net Sales, Production Volume, Eco-efficiency by Production Site

Country	Unit	FY2012	FY2013	FY2014	FY2015	FY2016
Japan						
Net Sales	million yen	38,208	40,945	41,637	44,104	45,945
Per Unit	t -CO ₂ /million yen	0.094	0.105	0.105	0.102	0.094
Production Volume	thousand units	115,839	122,461	132,159	136,706	135,861
Per Unit	t -CO ₂ /thousand units	0.031	0.035	0.033	0.033	0.032
Indonesia						
Net Sales	million Rp	1,863,571	1,863,517	2,330,909	2,344,373	2,556,688
Per Unit	t -CO ₂ /million Rp	0.010	0.011	0.009	0.010	0.009
Production Volume	thousand units	774,842	740,624	731,054	613,238	710,291
Per Unit	t -CO ₂ /thousand units	0.025	0.027	0.028	0.037	0.034
China						
Net Sales	thousand yuan	87,299	107,624	91,266	92,921	123,331
Per Unit	t -CO ₂ /thousand yuan	0.009	0.007	0.009	0.008	0.006
Production Volume	thousand units	11,755	12,315	12,784	12,567	13,445
Per Unit	t -CO ₂ /thousand units	0.063	0.063	0.061	0.060	0.052

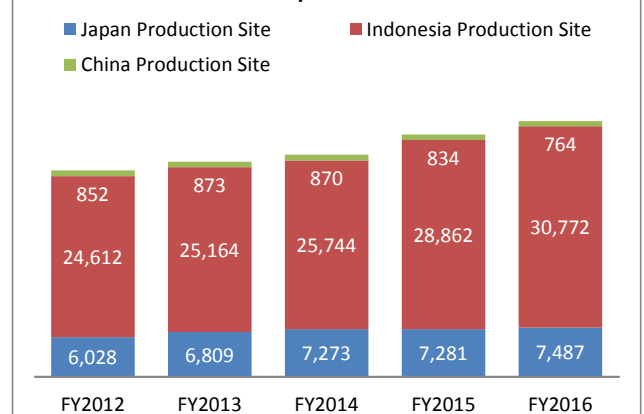
Individual Environmental Data by Production Site

Reporting Content	Unit	Business Location / Category	FY2012	FY2013	FY2014	FY2015	FY2016
Total Energy Input	GJ	Total	338,408	351,606	364,066	392,836	416,049
		Japan Production Site	72,542	80,353	85,082	85,160	86,749
		Fukusaki Factory	72,542	80,353	85,082	85,160	86,749
		Indonesia Production Site	255,938	261,159	267,961	297,062	319,413
		Head Office/Sunter Factory	84,002	87,061	90,918	-	-
		Cibitung Factory	171,936	174,098	177,043	-	-
		Head Office / Factory1	-	-	-	131,471	151,208
		Factory2	-	-	-	165,591	168,205
		China Production Site	9,928	10,093	11,023	10,614	9,887
		Zhongshan Factory	9,928	10,093	11,023	10,614	9,887
Electric Power Input	thousand kWh	Total	31,492	32,845	33,887	36,977	39,023
		Japan Production Site	6,028	6,809	7,273	7,281	7,487
		Fukusaki Factory	6,028	6,809	7,273	7,281	7,487
		Indonesia Production Site	24,612	25,164	25,744	28,862	30,772
		Head Office/Sunter Factory	7,463	7,787	8,066	-	-
		Cibitung Factory	17,149	17,377	17,678	-	-
		Head Office / Factory1	-	-	-	12,325	13,948
		Factory2	-	-	-	16,537	16,824
		China Production Site	852	873	870	834	764
		Zhongshan Factory	852	873	870	834	764

Total Energy Input (GJ)



Electric Power Input (thousand kWh)



Reporting Content	Unit	Business Location / Category	FY2012	FY2013	FY2014	FY2015	FY2016
Water Input	m ³	Total	307,395	311,626	290,953	276,681	304,413
		Japan Production Site	86,411	87,040	76,292	85,358	80,619
		Fukusaki Factory water supply	64,054	63,843	63,944	74,872	71,789
		Fukusaki Factory industrial water supply	22,357	23,197	12,348	10,486	8,830
		Indonesia Production Site	206,725	210,575	195,848	177,655	207,530
		Head Office/Sunter Factory water supply	148,423	146,796	157,100	-	-
		Head Office/Sunter Factory groundwater	4,270	5,914	0	-	-
		Head Office/Sunter Factory industrial water supply	11,560	12,050	2,116	-	-
		Cibitung Factory water supply	42,472	45,815	36,632	-	-
		Head Office/Factory1 water supply	-	-	-	138,101	154,718
		Head Office/Factory1 groundwater	-	-	-	0	0
		Factory2 industrial water supply	-	-	-	0	27,796
		Factory2 water supply	-	-	-	39,554	25,016
		China Production Site	14,259	14,011	18,813	13,668	16,264
		Zhongshan Factory water supply	14,259	14,011	18,813	13,668	16,264
CO ₂ Emissions	t -CO ₂	Total	23,664	24,790	25,376	27,696	29,114
		Japan Production Site	3,596	4,284	4,352	4,486	4,325
		Fukusaki Factory	3,596	4,284	4,352	4,486	4,325
		Indonesia Production Site	19,297	19,695	20,203	22,422	24,093
		Head Office/Sunter Factory	6,293	6,525	6,810	-	-
		Cibitung Factory	13,004	13,170	13,394	-	-
		Head Office/Factory1	-	-	-	9,894	11,364
		Factory2	-	-	-	12,528	12,730
		China Production Site	744	770	781	751	696
		Zhongshan Factory	744	770	781	751	696

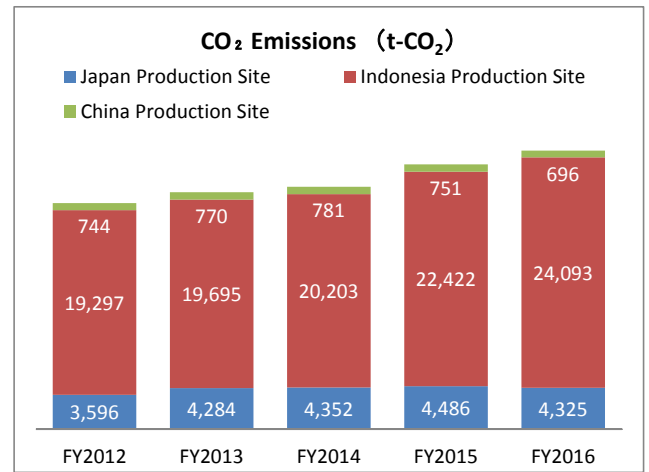
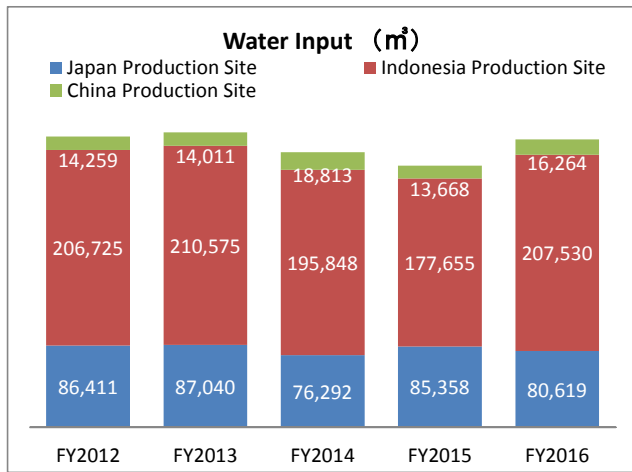
Please note: The changes of CO₂ emission coefficients

	Business Location / Category	FY2012	FY2013	FY2014	FY2015	FY2016
CO ₂ Emission Coefficients	Japan Production Site					
	Electric power emission coefficients	0.450	0.514	0.522	0.531	0.509
	Kerosene emission coefficients	2.49	2.49	2.49	2.49	2.49
	Gas emission coefficients	3.00	3.00	3.00	3.00	3.00
	Indonesia Production Site					
	Electric power emission coefficients	0.755	0.755	0.755	0.755	0.755
	Diesel fuel emission coefficients	2.58	2.58	2.58	2.58	2.58
	Gas emission coefficients	3.00	3.00	3.00	3.00	3.00
	China Production Site					
	Electric power emission coefficients	0.764	0.764	0.764	0.764	0.764
	Diesel fuel emission coefficients	2.58	2.58	2.58	2.58	2.58
	Gas emission coefficients	3.00	3.00	2.70	2.70	2.70

* Energy consumption calculated based on formulas in the Japanese Act on the Rational Use of Energy.

* Overseas CO₂ emission coefficients by country are drawn from "CO₂ Emissions from Fuel Combustion: Highlights, 2013 Edition." Source: IEA. Fiscal year CO₂ emission coefficients for Japan are based on data from individual electric power producers.

* All fuel coefficients other than electricity are drawn from the calorific value and emission coefficients in the Japanese "The Calculating and Reporting Manual for Greenhouse Gas Emissions Ver.4.2".



Reporting Content	Unit	Business Location / Category	FY2012	FY2013	FY2014	FY2015	FY2016
Waste	t	Total	3,500	3,796	3,267	3,150	2,986
		Japan Production Site	2,735	3,068	2,425	2,370	2,295
		Fukusaki Factory	2,735	3,068	2,425	2,370	2,295
		Indonesia Production Site	761	724	833	771	683
		Head Office/Sunter Factory	427	428	423	-	-
		Cibitung Factory	334	295	410	-	-
		Head Office/Factory1	-	-	-	474	342
		Factory2	-	-	-	296	341
		China Production Site	4	5	9	10	8
Zhongshan Factory	4	5	9	10	8		
Final Disposal Amount	t	Total	105	140	187	266	345
		Japan Production Site	4	9	8	6	7
		Fukusaki Factory	4	9	8	6	7
		Indonesia Production Site	97	126	170	250	332
		Head Office/Sunter Factory	97	126	170	-	-
		Cibitung Factory	0	0	0	-	-
		Head Office/Factory1	-	-	-	223	297
		Factory2	-	-	-	26	35
		China Production Site	4	5	9	10	6
Zhongshan Factory	4	5	9	10	6		
Resource Recovery Rate	%	Japan Production Site	99.9%	99.7%	99.7%	99.8%	99.7%
		Indonesia Production Site	87.3%	82.6%	79.6%	67.6%	51.4%
		China Production Site	0.0%	0.0%	0.0%	0.0%	18.2%
Wastewater (*data not yet available)	m³	Japan Production Site	32,332	35,279	34,732	38,546	32,235
		Indonesia Production Site	*	*	*	*	*
		China Production Site	*	*	*	*	*
Sulfur Oxide (SOx) Emissions (*data not yet available)	kg	Japan Production Site	30	26	28	25	34
		Indonesia Production Site	*	*	*	*	*
		China Production Site	*	5	13	25	2
Nitrogen Oxide (NOx) Emissions (*data not yet available)	kg	Japan Production Site	281	263	210	141	245
		Indonesia Production Site	*	*	*	*	*
		China Production Site	*	15	76	94	6
Dust Emissions (*data not yet available)	kg	Japan Production Site	5	5	14	3	4
		Indonesia Production Site	*	*	*	*	*
		China Production Site	*	*	*	*	*