

# Environmental Data by Manufacturing Facility in Japan

Overview	Manufacturing facility	Awazu Plant (established in 1921)	Kanazawa Plant (established in 2007)	Osaka Plant (established in 1952)
	Location	Komatsu, Ishikawa Prefecture	Kanazawa, Ishikawa Prefecture	Hirakata, Osaka Prefecture
	Main products	Small and medium-sized bulldozers, small hydraulic excavators, small and medium-sized wheel loaders, motor graders, armored vehicles, etc.	Ultra-large hydraulic excavators, large presses	Large bulldozers, medium-sized and large hydraulic excavators, mobile crushers/recyclers/tub grinders (crushers, soil stabilizers, tub grinders, etc.)
	Site/production area (1,000 m <sup>2</sup> )	716/187	134/22	541/121
	Number of employees	3,269	581	2,052
	Date of ISO14001 certification acquisition	September 1997	May 2007	July 1997

\*The number of employees includes those working for Komatsu affiliates on the premises.  
\*Number of employees as of end of March 2011.

Major Performance	Environmental impact *Refer to the Data on Environmental Impact Resulting from Business Activities for details on the methods used to calculate amounts. *Total emissions of waste are expressed as a composite of the amount recycled (excluding valueables) and the amount disposed. *Recycling rate is calculated by dividing the amount recycled by the amount generated (including valueables). *Total emissions of BOD and COD are calculated by multiplying the average concentration by the amount of wastewater.	Item	Actual value	Item	Actual value	Item	Actual value		
		Total CO <sub>2</sub> emissions	41,111 t-CO <sub>2</sub>	Total CO <sub>2</sub> emissions	2,813 t-CO <sub>2</sub>	Total CO <sub>2</sub> emissions	35,319 t-CO <sub>2</sub>		
NOx total amount	12,998 kg	NOx total amount	— kg	NOx total amount	2,930 kg				
SOx total amount	3,681 kg	SOx total amount	0 kg	SOx total amount	173 kg				
Total emissions of waste	1,685 t	Total emissions of waste	208 t	Total emissions of waste	1,553 t				
Amount recycled	1,684 t	Amount recycled	208 t	Amount recycled	1,550 t				
Recycling rate	99.9 %	Recycling rate	100 %	Recycling rate	99.8 %				
BOD emissions	3,894 kg	BOD emissions	209 kg	BOD emissions	103 kg				
COD emissions	2,812 kg	COD emissions	463 kg	COD emissions	735 kg				
Wastewater	1,851,783 m <sup>3</sup>	Wastewater	72,000 m <sup>3</sup>	Wastewater	149,185 m <sup>3</sup>				
Energy consumption *The heat energy conversion factor is calculated in keeping with Greenhouse Gas Emissions Calculation - Reporting Manual by the Act on Promotion of Global Warming Countermeasures.	Item	Actual consumption	Converted to calorific equivalents (GJ)	Item	Actual consumption	Converted to calorific equivalents (GJ)	Item	Actual consumption	Converted to calorific equivalents (GJ)
	Electricity	73,108 MWh	710,862	Electricity	7,138 MWh	69,597	Electricity	68,162 MWh	662,323
	Heavy oil A	2,818 kℓ	110,176	Heavy oil A	0 kℓ	0	Heavy oil A	215 kℓ	8,407
	Kerosene	12 kℓ	424	Kerosene	0 kℓ	0	Kerosene	81 kℓ	2,973
	Light oil	264 kℓ	10,078	Light oil	1 kℓ	53	Light oil	275 kℓ	10,505
	Town gas	0 Nkm <sup>3</sup>	0	Town gas	0 Nkm <sup>3</sup>	0	Town gas	3,692 Nkm <sup>3</sup>	154,695
	LPG	1,517 t	76,159	LPG	1 t	25	LPG	61 t	3,062
	Other		1,939	Other		990	Other		1,592
	Total		909,638	Total		70,666	Total		843,556

Compliance Conditions to Major Regulations	Air	Item	Unit	Facility	Regulated value	Actual value	Facility	Regulated value	Actual value	Facility	Regulated value	Actual value
		Nitrogen oxides (NOx)	ppm	Boiler	180	96	N/A	—	—	Boiler	150	18
				Diesel engine	950	640			Metal furnace	180	52	
								Paint drying furnace	230	4		
		Sulfur oxides (SOx)	—	K-value regulation	17.5	1.2			Regulation of total emissions (Nm <sup>3</sup> /h)	1.573	0.002	
				Soot and dust	g/m <sup>3</sup> N	Boiler	0.3	0.002	N/A	—	—	Boiler
		Diesel engine	0.1	0.019				Metal furnace	0.1	0.013		
							Paint drying furnace	0.1	0.0036			

\*Regulated values are in accordance with the Air Pollution Control Law and local regulations.

Wastewater	Item	Regulated value according to the Water Pollution Control Law Unit	Regulated value	Actual value			Regulated value	Actual value			Regulated value	Actual value		
				Maximum	Minimum	Average		Maximum	Minimum	Average		Maximum	Minimum	Average
	pH	5.8-8.6	5.8-8.6	7.3	6.8	7.1	5.0-9.0	7.9	6.9	7.4	5.8-8.6	8.0	7.3	7.5
	BOD (Biochemical oxygen demand)	160mg/ℓ	80	3.9	1.0	2.0	80	2.9	2.9	—	25	1.6	0.2	0.7
	COD (Chemical Oxygen Demand)	160mg/ℓ	80	6.7	ND	1.4	80	13.0	5.0	6.4	25	7.4	3.7	4.9
	Suspended solids (SS)	200mg/ℓ	120	6.2	ND	1.3	120	4.5	4.5	—	80	3.6	1.2	2.1
	Mineral oils	5mg/ℓ	5	ND	ND	ND	5	ND	ND	—	3	0.1	ND	0.1
	Copper	3mg/ℓ	3	ND	ND	ND	3	ND	ND	—	3	ND	ND	ND
	Zinc	2mg/ℓ	2	0.15	ND	0.08	5	ND	ND	—	2	ND	ND	ND
	Nitrogen	120mg/ℓ	120	4.4	2.1	3.7	120	5.8	5.8	—	120	19.0	2.2	5.7
	Phosphorus	16mg/ℓ	16	0.27	0.03	0.12	16	1.6	1.6	—	16	1.8	ND	0.4
	Cadmium	0.1mg/ℓ	0.1	ND	ND	ND	0.1	ND	ND	—	0.01	ND	ND	ND
	Lead	0.1mg/ℓ	0.1	ND	ND	ND	0.1	ND	ND	—	0.01	ND	ND	ND
	Chromium (VI)	0.5mg/ℓ	0.5	ND	ND	ND	0.5	ND	ND	—	0.05	ND	ND	ND
	Trichloroethylene	0.3mg/ℓ	0.3	0.004	ND	0.003	0.3	ND	ND	—	0.03	ND	ND	ND
	Tetrachloroethylene	0.1mg/ℓ	0.1	ND	ND	ND	0.1	ND	ND	—	0.01	0.0007	ND	0.0007
	Dichloromethane	0.2mg/ℓ	0.2	ND	ND	ND	0.2	ND	ND	—	0.02	ND	ND	ND
	1,1,1-trichloroethane	3mg/ℓ	3	ND	ND	ND	3	ND	ND	—	1	ND	ND	ND

\*Regulated values are in accordance with the Water Pollution Control Law and local regulations.

\*ND ("not detected") indicates a value below the lower limit of detection.  
\*ND is considered to be the lower limit of detection when calculating the average.  
\*Other items are confirmed to be below the regulated value.

\*Data for the Awazu Plant include data for the Komatsu Machinery Corporation and the Komatsu Engineering Corp. (Awazu Plant).

\*Data for the Kanazawa Plant include data for the Kanazawa Dai-ichi, Dai-ni and the Kawakita Plant.

\*Data for the Osaka Plant include data for the Rokko Plant.

Ibaraki Plant (established in 2007)	Oyama Plant (established in 1962)	Koriyama Plant (established in 1995)	Shonan Plant (established in 1966)
Hitachinaka, Ibaraki Prefecture	Oyama, Tochigi Prefecture	Koriyama, Fukushima Prefecture	Hiratsuka, Kanagawa Prefecture
Large wheel loaders, dump trucks	Engines for construction/industrial machinery, diesel generators, hydraulic equipment, axle, excimer lasers, etc.	Hydraulic cylinders, swivel joints, gear pumps	Control equipment for construction and mining equipment, hybrid components Thermoelectric modules, temperature control equipment, etc.
251/46	561/140	297/19	68/5
872	3,600	448	1,035
May 2007	May 1997	July 2002	March 2000

Item	Actual value	Item	Actual value	Item	Actual value	Item	Actual value				
Total CO <sub>2</sub> emissions	4,659 t-CO <sub>2</sub>	Total CO <sub>2</sub> emissions	70,086 t-CO <sub>2</sub>	Total CO <sub>2</sub> emissions	12,823 t-CO <sub>2</sub>	Total CO <sub>2</sub> emissions	2,901 t-CO <sub>2</sub>				
NOx total amount	— kg	NOx total amount	59,145 kg	NOx total amount	84,908 kg	NOx total amount	0 kg				
SOx total amount	142 kg	SOx total amount	657 kg	SOx total amount	4,810 kg	SOx total amount	0 kg				
Total emissions of waste	411 t	Total emissions of waste	3,590 t	Total emissions of waste	964 t	Total emissions of waste	133 t				
Amount recycled	411 t	Amount recycled	3,590 t	Amount recycled	964 t	Amount recycled	133 t				
Recycling rate	100 %	Recycling rate	100 %	Recycling rate	100 %	Recycling rate	100 %				
BOD emissions	9,771 kg	BOD emissions	4,797 kg	BOD emissions	67 kg	BOD emissions	2,716 kg				
COD emissions	— kg	COD emissions	7,897 kg	COD emissions	226 kg	COD emissions	— kg				
Wastewater	17,552 m <sup>3</sup>	Wastewater	568,800 m <sup>3</sup>	Wastewater	19,995 m <sup>3</sup>	Wastewater	35,907 m <sup>3</sup>				
Item	Actual consumption	Converted to calorific equivalents (Gj)	Item	Actual consumption	Converted to calorific equivalents (Gj)	Item	Actual consumption	Converted to calorific equivalents (Gj)	Item	Actual consumption	Converted to calorific equivalents (Gj)
Electricity	10,522 MWh	102,800	Electricity	93,484 MWh	907,395	Electricity	11,020 MWh	106,639	Electricity	7,476 MWh	74,536
Heavy oil A	66 kℓ	2,581	Heavy oil A	358 kℓ	13,978	Heavy oil A	2,880 kℓ	112,608	Heavy oil A	0 kℓ	0
Kerosene	14 kℓ	511	Kerosene	4,293 kℓ	157,553	Kerosene	0 kℓ	0	Kerosene	0 kℓ	0
Light oil	113 kℓ	4,316	Light oil	3,760 kℓ	143,613	Light oil	0 kℓ	0	Light oil	0 kℓ	0
Town gas	0 Nkm <sup>3</sup>	0	Town gas	6,177 Nkm <sup>3</sup>	258,816	Town gas	0 Nkm <sup>3</sup>	0	Town gas	15 Nkm <sup>3</sup>	637
LPG	35 t	1,758	LPG	45 t	2,259	LPG	262 t	13,152	LPG	0 t	0
Other	—	57	Other	—	3,407	Other	—	0	Other	—	0
Total	—	112,022	Total	—	1,487,021	Total	—	232,399	Total	—	75,173

Facility	Regulated value	Actual value	Facility	Regulated value	Actual value	Facility	Regulated value	Actual value	Facility	Regulated value	Actual value
N/A	—	—	Diesel engine	950	830	Cogeneration engine	760	740	N/A	—	—
			Gas turbine	70	17						
			Boiler	180	72						
			Annealing furnace	200	50						
			K-value regulation	7.0	0.57	K-value regulation	11.5	0.39			
N/A	—	—	Diesel engine	0.1	0.021	Tempering (electric) furnace	0.2	less than 0.003	N/A	—	—
			Boiler	0.3	0.002	Baking (electric) furnace	0.2	less than 0.003			
			Annealing furnace	0.25	0.01	Cogeneration engine	0.2	0.05			
			Electric furnace	0.2	0.001						

Regulated value	Actual value			Regulated value	Actual value			Regulated value	Actual value			Regulated value	Actual value		
	Maximum	Minimum	Average		Maximum	Minimum	Average		Maximum	Minimum	Average		Maximum	Minimum	Average
5-9	—	—	—	5.8-8.6	7.6	6.9	7.2	5.8-8.6	7.4	6.9	7.2	5-9	8.1	6.2	7.3
600	950*	190	557	25	15.6	3.6	8.4	20	8.7	ND	3.4	600	200	2.0	45.0
—	—	—	—	25	19.8	6.5	13.9	40	17.0	6.2	11.3	—	—	—	—
—	—	—	—	50	19.2	2.4	9.4	50	26.0	1.0	4.8	600	110	ND	21.0
30	61.0*	5.4	25.0	5	0.5	ND	0.5	1	ND	ND	ND	5	ND	ND	ND
—	—	—	—	3	ND	ND	ND	2	ND	ND	—	3	ND	ND	0.05
—	—	—	—	2	0.12	ND	0.06	2	0.12	0.12	—	2	0.14	0.02	0.07
—	—	—	—	20	10.0	3.5	6.4	120	29.0	29.0	—	—	—	—	—
—	—	—	—	2	1.0	0.1	0.3	16	3.1	3.1	—	—	—	—	—
—	—	—	—	0.1	ND	ND	ND	0.1	ND	ND	—	0.1	ND	ND	ND
—	—	—	—	0.1	ND	ND	ND	0.1	ND	ND	ND	0.1	ND	ND	ND
—	—	—	—	0.1	ND	ND	ND	0.1	ND	ND	ND	0.5	ND	ND	ND
—	—	—	—	0.3	ND	ND	ND	0.3	ND	ND	—	0.3	ND	ND	ND
—	—	—	—	0.1	ND	ND	ND	0.1	ND	ND	—	0.1	ND	ND	ND
—	—	—	—	—	—	—	—	0.2	ND	ND	—	0.2	ND	ND	ND
—	—	—	—	3	ND	ND	ND	3	ND	ND	—	3	ND	ND	ND

\*Data for the Ibaraki Plant include data for the Mooka Plant.

\*After the advisory meeting with local sewerage works division, measures are being executed because the restriction value was temporarily exceeded.

\*Data for the Oyama Plant include data for the Komatsu Cummins Engine Co., Ltd., the Industrial Power Alliance Ltd., and the GIGAPHOTON, Inc.

\*Data for the Shonan Plant include data for KELK Ltd.

# Environmental Data by Manufacturing Facility in Japan

Overview	Manufacturing facility	Research Division (established in 1985)	Komatsu Utility Co., Ltd. (established in 1968)	Komatsu Castex Ltd. (established in 1952)
	Location	Hiratsuka, Kanagawa Prefecture	Oyama, Tochigi Prefecture	Himi, Toyama Prefecture
	Main products	R&D on business fields of the Komatsu Group	Forklift trucks, mini shovel, mini wheel loaders, etc.	Iron castings, steel castings, molds for casting, etc.
	Site/production area (1,000 m <sup>2</sup> )	195/0	245/48	429/73
	Number of employees	193	1,070	1,219
	Date of ISO14001 certification acquisition	May 2008	February 1998	January 2000

\*The number of employees includes those working for Komatsu affiliates on the premises.  
\*Number of employees as of end of March 2011.

Major Performance	Environmental impact	Item	Actual value		Item	Actual value		Item	Actual value	
		Total CO <sub>2</sub> emissions	2,095 t-CO <sub>2</sub>	Total CO <sub>2</sub> emissions	4,719 t-CO <sub>2</sub>	Total CO <sub>2</sub> emissions	77,389 t-CO <sub>2</sub>			
		NOx total amount	293 kg	NOx total amount	1,429 kg	NOx total amount	14,449 kg			
		SOx total amount	46 kg	SOx total amount	1,168 kg	SOx total amount	1,925 kg			
		Total emissions of waste	84 t	Total emissions of waste	565 t	Total emissions of waste	8,316 t			
		Amount recycled	83 t	Amount recycled	565 t	Amount recycled	8,053 t			
		Recycling rate	98.1 %	Recycling rate	100 %	Recycling rate	99.3 %			
		BOD emissions	5 kg	BOD emissions	431 kg	BOD emissions	3,307 kg			
		COD emissions	11 kg	COD emissions	561 kg	COD emissions	4,340 kg			
		Wastewater	3,417 m <sup>3</sup>	Wastewater	99,659 m <sup>3</sup>	Wastewater	1,256,862 m <sup>3</sup>			
	Energy consumption	Item	Actual consumption	Converted to calorie equivalents (GJ)	Item	Actual consumption	Converted to calorie equivalents (GJ)	Item	Actual consumption	Converted to calorie equivalents (GJ)
		Electricity	4,169 MWh	40,317	Electricity	7,866 MWh	76,471	Electricity	150,097 MWh	1,457,585
		Heavy oil A	32 kℓ	1,251	Heavy oil A	440 kℓ	17,204	Heavy oil A	2,417 kℓ	94,485
		Kerosene	104 kℓ	3,809	Kerosene	4 kℓ	147	Kerosene	1,176 kℓ	43,159
		Light oil	52 kℓ	1,983	Light oil	32 kℓ	1,222	Light oil	309 kℓ	11,821
Town gas		0 Nkm <sup>3</sup>	0	Town gas	0 Nkm <sup>3</sup>	0	Town gas	0 Nkm <sup>3</sup>	0	
LPG		4 t	211	LPG	125 t	6,275	LPG	3,152 t	158,230	
Other			10	Other		554	Other		138	
Total			47,582	Total		101,873	Total		1,765,419	

Compliance Conditions to Major Regulations	Air	Item	Unit	Facility	Regulated value	Actual value	Facility	Regulated value	Actual value	Facility	Regulated value	Actual value
		Nitrogen oxides (NOx)	ppm	Service generator	303	70	Small boilers*	(260)	64	Annealing furnace	200	60
				Cold/hot water generator	390	34				Annealing furnace (small)	180	30
										Calciners	220	7
		Sulfur oxides (SOx)	—	K-value regulation	11.5	0.2	K-value regulation	7.0	0.16	K-value regulation	17.5	0.95
				Service generator	0.1	0.022	Small boilers*	(0.5)	0.004	Annealing furnace	0.25	0.01 or less
		Soot and dust	g/m <sup>3</sup> N	Cold/hot water generator	0.2	0.001				Annealing furnace (small)	0.2	0.01 or less
										Calciners	0.15	0.01 or less
										Arch furnace	0.1	0.01 or less

\*Regulated values are in accordance with the Air Pollution Control Law and local regulations.

\*Regulated values of NOx, soot and dust are in accordance with self-regulatory measures, because these boilers are small.

Compliance Conditions to Major Regulations	Wastewater	Item	Regulated value according to the Water Pollution Control Law Unit	Regulated value	Actual value			Regulated value	Actual value			Regulated value	Actual value		
					Maximum	Minimum	Average		Maximum	Minimum	Average		Maximum	Minimum	Average
		pH	5.8-8.6	5.8-8.6	7.4	7.0	7.2	5.8-8.6	7.4	7.0	7.2	5.8-8.6	8.8	6.9	7.8
		BOD (Biochemical oxygen demand)	160mg/ℓ	10	2.0	1.0	1.7	25	7.9	1.9	4.3	25	5.1	1.3	2.6
		COD (Chemical Oxygen Demand)	160mg/ℓ	25	7.0	2.0	4.5	25	10.9	2.9	5.6	160	6.3	2.3	3.5
		Suspended solids (SS)	200mg/ℓ	65	14.0	2.0	5.3	50	18.8	2.4	7.6	90	20.0	ND	6.3
		Mineral oils	5mg/ℓ	5	1.0	1.0	1.0	5	ND	ND	ND	5	ND	ND	ND
		Copper	3mg/ℓ	1	ND	ND	ND	3	ND	ND	ND	1	ND	ND	ND
		Zinc	2mg/ℓ	1	ND	ND	ND	2	0.23	ND	0.07	2	ND	ND	ND
		Nitrogen	120mg/ℓ	120	—	—	—	20	6.0	2.3	4.2	120	8.4	1.6	4.8
		Phosphorus	16mg/ℓ	16	—	—	—	2	0.67	0.21	0.44	16	0.83	0.07	0.31
		Cadmium	0.1mg/ℓ	0.1	0.01	ND	0.01	0.1	ND	ND	ND	0.1	ND	ND	ND
		Lead	0.1mg/ℓ	0.1	0.05	0.05	0.05	0.1	ND	ND	ND	0.1	ND	ND	ND
		Chromium (VI)	0.5mg/ℓ	0.5	0.05	0.05	0.05	0.1	ND	ND	ND	0.5	ND	ND	ND
		Trichloroethylene	0.3mg/ℓ	0.3	ND	ND	ND	0.3	ND	ND	ND	0.3	ND	ND	ND
Tetrachloroethylene	0.1mg/ℓ	0.1	0.002	0.002	0.002	0.1	ND	ND	ND	0.1	ND	ND	ND		
Dichloromethane	0.2mg/ℓ	0.2	ND	ND	ND	0.2	ND	ND	ND	0.2	ND	ND	ND		
1,1,1-trichloroethane	3mg/ℓ	3	0.002	0.002	0.002	3	ND	ND	ND	3	ND	ND	ND		

\*Regulated values are in accordance with the Water Pollution Control Law and local regulations.

\*ND ("not detected") indicates a value below the lower limit of detection.

\*ND is considered to be the lower limit of detection when calculating the average.

\*Other items are confirmed to be below the regulated value.

Overview	Manufacturing facility	Komatsu Cabtec Co., Ltd. (established in 1918)	Komatsu NTC Ltd. (established in 1945)	Komatsu House Ltd. (established in 1971)
	Location	Ryuou-cho, Gamou, Shiga Prefecture	Nanto, Toyama Prefecture	Shinshiro, Aichi Prefecture
	Main products	Cabs for construction equipment	Machine tools, sheet-metal machines, semiconductor manufacturing equipment	Prefabricated structures for businesses
	Site/production area (1,000 m <sup>2</sup> )	41/7	188/68	31/10
	Number of employees	366	670	40
	Date of ISO14001 certification acquisition	December 2007	June 1999	March 2002

\*The number of employees includes those working for Komatsu affiliates on the premises.  
 \*Number of employees as of end of March 2011.

Major Performance	Environmental impact *Refer to the Data on Environmental Impact Resulting from Business Activities for details on the methods used to calculate amounts. *Total emissions of waste are expressed as a composite of the amount recycled (excluding valuables) and the amount disposed. *Recycling rate is calculated by dividing the amount recycled by the amount generated (including valuables). *Total emissions of BOD and COD are calculated by multiplying the average concentration by the amount of wastewater.	Item	Actual value	Item	Actual value	Item	Actual value			
		Total CO <sub>2</sub> emissions	3,776 t-CO <sub>2</sub>	Total CO <sub>2</sub> emissions	8,308 t-CO <sub>2</sub>	Total CO <sub>2</sub> emissions	639 t-CO <sub>2</sub>			
		NOx total amount	— kg	NOx total amount	— kg	NOx total amount	356 kg			
		SOx total amount	4 kg	SOx total amount	0 kg	SOx total amount	76 kg			
		Total emissions of waste	401 t	Total emissions of waste	1,697 t	Total emissions of waste	36 t			
		Amount recycled	187 t	Amount recycled	1,517 t	Amount recycled	36 t			
		Recycling rate	97.2 %	Recycling rate	94.2 %	Recycling rate	100 %			
		BOD emissions	800 kg	BOD emissions	719 kg	BOD emissions	50 kg			
		COD emissions	577 kg	COD emissions	— kg	COD emissions	127 kg			
		Wastewater	133,305 m <sup>3</sup>	Wastewater	1,437,941 m <sup>3</sup>	Wastewater	15,270 m <sup>3</sup>			
	Energy consumption *The heat energy conversion factor is calculated in keeping with Greenhouse Gas Emissions Calculation - Reporting Manual by the Act on Promotion of Global Warming Countermeasures.	Item	Actual consumption	Converted to calorie equivalents (Gj)	Item	Actual consumption	Converted to calorie equivalents (Gj)	Item	Actual consumption	Converted to calorie equivalents (Gj)
		Electricity	7,536 MWh	73,596	Electricity	21,257 MWh	208,130	Electricity	625 MWh	6,231
		Heavy oil A	0 kℓ	0	Heavy oil A	0 kℓ	0	Heavy oil A	54 kℓ	2,111
		Kerosene	26 kℓ	954	Kerosene	1 kℓ	18	Kerosene	0 kℓ	0
		Light oil	57 kℓ	2,158	Light oil	12 kℓ	458	Light oil	5 kℓ	195
Town gas		0 Nkm <sup>3</sup>	0	Town gas	0 Nkm <sup>3</sup>	0	Town gas	0 Nkm <sup>3</sup>	0	
LPG		223 t	11,195	LPG	35 t	1,733	LPG	80 t	4,006	
Other		—	0	Other	—	138	Other	—	0	
Total		—	87,903	Total	—	210,478	Total	—	12,543	

Compliance Conditions to Major Regulations	Air	Item	Unit	Facility	Regulated value	Actual value	Facility	Regulated value	Actual value	Facility	Regulated value	Actual value			
		Nitrogen oxides (NOx)	ppm	N/A	—	—	N/A	—	—	Boiler	250	59			
		Sulfur oxides (SOx)	—	—	—	—	—	—	—	K-value regulation	17.5	0.51			
		Soot and dust	g/m <sup>3</sup> N	N/A	—	—	N/A	—	—	Boiler	0.3	0.003			
	*Regulated values are in accordance with the Air Pollution Control Law and local regulations.														
	Wastewater	Item	Regulated value according to the Water Pollution Control Law Unit	Regulated value	Actual value			Regulated value	Actual value			Regulated value	Actual value		
					Maximum	Minimum	Average		Maximum	Minimum	Average		Maximum	Minimum	Average
		pH	5.8-8.6	5.8-8.6	7.4	7.0	7.2	5.8-8.6	7.3	6.4	6.8	5.8-8.6	7.3	6.3	6.9
		BOD (Biochemical oxygen demand)	160mg/ℓ	20	17.0	1.0	6.0	160	0.5	ND	0.5	160	6.5	0.5	3.3
		COD (Chemical Oxygen Demand)	160mg/ℓ	20	7.1	2.7	4.3	—	—	—	—	160	16.0	4.0	8.3
		Suspended solids (SS)	200mg/ℓ	20	8.4	0.5	3.7	200	2.0	ND	1.1	200	6.0	1.0	2.4
		Mineral oils	5mg/ℓ	—	—	—	—	5	ND	ND	ND	5	ND	ND	ND
		Copper	3mg/ℓ	0.1	0.03	ND	0.01	—	—	—	—	—	—	—	—
		Zinc	2mg/ℓ	0.5	0.14	0.02	0.04	—	—	—	—	—	—	—	—
		Nitrogen	120mg/ℓ	8	7.7	1.5	4.5	—	—	—	—	120	25.0	3.3	13.3
Phosphorus	16mg/ℓ	0.6	0.5	ND	0.2	—	—	—	—	16	3.4	0.3	1.4		
Lead	0.1mg/ℓ	0.03	ND	ND	ND	—	—	—	—	—	—	—	—		

\*Regulated values are in accordance with the Water Pollution Control Law and local regulations.  
 \*ND ("not detected") indicates a value below the lower limit of detection.  
 \*ND is considered to be the lower limit of detection when calculating the average.  
 \*Other items are confirmed to be below the regulated value.

\*Data for Komatsu NTC Ltd. include data for Lossev Technology Corporation, Toyama Kiko Corporation, and D.S.K. Co., Ltd.

Overview	Manufacturing facility	Komatsu Construction Equipment Sales and Service Japan Ltd. (established in March 1967)	Komatsu Rental Ltd. (established in Oct. 2006)
	Location	Sagamihara, Kanagawa Prefecture (Head office)	Yokohama, Kanagawa Prefecture (Head office)
	Activities	Sales and service for construction machinery	Rentals for construction machinery, engineering works construction machine apparatuses, and vehicles
	Number of bases	101 sites	147 sites
	Number of employees	1,936	981
	Date of ISO14001 certification acquisition	—	—

Major Performance	Environmental impact *Total waste emissions are equal to the amount disposed + the amount recycled (including valuables). *Recycling rate is calculated by dividing the amount recycled by the amount generated (including valuables).	Item	Actual value	Item	Actual value		
		Total CO <sub>2</sub> emissions	5,050 t-CO <sub>2</sub>	Total CO <sub>2</sub> emissions	2,712 t-CO <sub>2</sub>		
		Total emissions of waste	4,009 t	Total emissions of waste	2,118 t		
		Amount recycled	2,824 t	Amount recycled	1,692 t		
		Recycling rate	70.4 %	Recycling rate	79.9 %		
		Energy consumption *The heat energy conversion factor is calculated in keeping with Greenhouse Gas Emissions Calculation - Reporting Manual by the Act on Promotion of Global Warming Countermeasures.	Item	Actual consumption	Converted to calorie equivalents (Gj)	Item	Actual consumption
	Electricity		9,622 MWh	95,931	Electricity	5,663 MWh	56,462
	Heavy oil A		50 kℓ	1,967	Heavy oil A	0 kℓ	0
	Kerosene		379 kℓ	13,906	Kerosene	101 kℓ	3,718
	Light oil		48 kℓ	1,834	Light oil	90 kℓ	3,442
	LPG		27 t	1,345	LPG	9 t	427
	Town gas, et al.		—	1,304	Town gas, et al.	—	360
	Total		—	116,287	Total	—	64,409

\*A part of data is not included because of the influence of the earthquake