

Mineral Industry Surveys

For information, contact:

Lisa A. Corathers, Manganese Commodity Specialist U.S. Geological Survey 989 National Center Reston, VA 20192

Telephone: (703) 648-4973, Fax: (703) 648-7757

E-mail: lcorathers@usgs.gov

Maria Arguelles (Data) Telephone: (703) 648-7990 Fax: (703) 648-7975 E-mail: marguell@usgs.gov

Internet: http://minerals.usgs.gov/minerals

MANGANESE IN JANUARY 2007

Preliminary data (gross weight) for January 2007 indicate that consumption of manganese ore containing 35% or more manganese, exclusive of that consumed at iron and steel plants, was 32,200 metric tons (t) in January 2007, according to the U.S. Geological Survey. This was a 7% decrease from the revised amount of 34,700 t consumed in December 2006.

Corresponding industry stocks of ore at the end of the month were 141,000 t, which was an 11% decrease from that at the end of December 2006. These data include estimates for annual respondents on the basis of 2006 data.

Data for U.S. imports and exports for January through December 2006 are published in this issue.

Ferroalloy Prices, manganese content

	High-carbon ferromanganese ¹	Medium-carbon ferromanganese ¹	Silicomanganese ¹	Manganese metal ²
	(dollars per gross ton)	(cents per pound)	(cents per pound)	(cents per pound)
January 4	840.00-900.00	66.00-72.00	38.00-40.00	92.00-95.00
January 11	890.00-950.00	66.00-72.00	39.00-40.00	92.00-95.00
January 18	895.00-975.00	66.00-72.00	39.00-40.00	92.00-95.00
January 25	925.00-980.00	66.00-72.00	40.00-42.00	94.00-98.00

Ore Prices, dollars per metric ton unit, manganese content³

	44% Manganese Ore ²	48% Manganese Ore ²
January 4	2.30-2.40	2.70-2.80
January 11	2.40-2.50	2.70-2.80
January 18	2.40-2.50	2.70-2.80
January 25	2.40-2.50	2.70-2.80

¹Source: Platts Metals Week, dealer import price.

²Source: Ryan's Notes, North American transaction price.

³To determine dollars per metric ton, multiply the manganese content percentage by the price.

 $\label{eq:table 1} \textbf{TABLE 1} \\ \textbf{SELECTED U.S. FOREIGN TRADE IN MANGANESE}^1$

(Metric tons, manganese content)²

	Import	ts for consumpt	tion	Exports			
•	Ore and	Ferroalloy			Ferroalloy		
	dioxide	and metal	Total	Ore	and metal	Total	
2005:							
December	39,800	35,600	75,400	1,690	1,550	3,230	
January-December	379,000 ^r	451,000	830,000 ^r	6,730	14,700	21,400	
2006:							
January	20,300	25,600	45,900	46	1,710	1,760	
February	27,500	52,600 ^r	80,100 ^r	87	1,170	1,260	
March	4,970	47,400	52,300	63	1,660	1,720	
April	30,300	34,800	65,200	25	661	686	
May	7,140	46,300	53,400	40	609	648	
June	26,800	52,600	79,400	101	753	853	
July	39,300	44,400	83,700	95	11,200	11,300	
August	5,710	54,400	60,100	36	838	874	
September	18,000	49,400	67,400	201	488	689	
October	49,000	64,500	114,000	157	921	1,080	
November	30,500	52,400	82,800	133	606	739	
December	32,300	53,600	85,900	135	1,060	1,190	
Total	292,000	578,000	870,000	1,120	21,700	22,800	

rRevised.

Source: U.S. Census Bureau.

 ${\bf TABLE~2} \\ {\bf U.S.~IMPORTS~FOR~CONSUMPTION~OF~SILICOMANGANESE~IN~DECEMBER~2006}^1$

(Metric tons)

					Year to date	2
	Gross	Mn	Customs	Gross	Mn	Customs
Source	weight	content	value ³	weight	content	value ³
Australia				29,900	19,400	\$19,400,000
Austria				1,100	668	406,000
Canada	305	226	\$171,000	1,050	751	624,000
France				11	7	3,620
Georgia				49,400	36,000	32,600,000
Korea, Republic of				13,000	8,330	9,920,000
Mexico	1,000	664	690,000	17,300	11,300	12,000,000
Netherlands				42	25	48,100
Norway	9,830	6,060	9,140,000	77,800	48,300	68,200,000
Romania	20,200	13,200	14,500,000	32,300	21,400	22,700,000
Russia				3,960	2,030	2,920,000
Saudi Arabia				7,510	4,820	4,370,000
South Africa	8,050	5,370	6,270,000	168,000	111,000	115,000,000
Total	39,300	25,500	30,800,000	401,000	264,000	288,000,000

⁻⁻ Zero

¹Data rounded to no more than three significant digits; may not add to totals shown.

²As reported except as estimated for imports of manganese dioxide and manganese waste and scrap and for exports from gross weights.

¹Data rounded to no more than three significant digits; may not add to totals shown.

²Includes revisions to previous months' data.

³Customs value generally represents a value in the foreign country and therefore excludes U.S. import duties, freight, insurance, and other charges incurred in bringing the material into the United States.

TABLE 3 U.S. IMPORTS FOR CONSUMPTION OF FERROMANGANESE IN DECEMBER $2006^{\rm 1}$

(Metric tons)

				Year to date ²		2
	Gross	Mn	Customs	Gross	Mn	Customs
Source	weight	content	value ³	weight	content	value ³
Low carbon:						
Canada				42	37	\$57,700
China	4,590	3,880	\$5,740,000	21,100	17,900	25,700,000
Japan				3,500	2,810	3,690,000
Korea, Republic of				9,310	7,670	9,420,000
Mexico	541	436	600,000	6,920	5,580	7,230,000
Norway				1,080	869	1,350,000
South Africa	40	37	60,600	2,790	2,570	4,100,000
Total	5,170	4,350	6,400,000	44,800	37,500	51,500,000
Medium carbon, 1%-2% C:						
Austria	19	15	18,900	19	15	18,900
Brazil	15	12	24,400	1,550	1,250	1,500,000
Canada				143	114	163,000
China	3,620	2,890	3,740,000	13,200	10,700	13,200,000
Korea, Republic of				15,700	12,700	14,000,000
Mexico	376	300	339,000	12,500	10,000	9,260,000
Nauru				56	46	68,500
Norway				3,270	2,690	3,830,000
South Africa	4,100	3,320	4,770,000	32,500	26,400	28,700,000
Spain				36	29	37,100
Total	8,130	6,550	8,900,000	79,000	63,900	70,800,000
Medium carbon, 2%-4% C:						
Brazil				19	14	19,300
Georgia				1,470	1,160	637,000
Total				1,490	1,170	657,000
High carbon:						
Australia				4,000	2,940	2,240,000
Brazil				9,200	7,220	5,590,000
Canada				97	58	61,200
China	4,670	3,530	3,210,000	32,700	24,800	22,600,000
France				1,500	1,170	764,000
Hong Kong				500	375	327,000
India				3,000	2,280	2,170,000
Korea, Republic of				13,200	10,000	9,190,000
Mexico				44	35	52,800
Norway				21	18	25,400
Poland				592	465	567,000
South Africa	14,900	11,600	11,700,000	157,000	122,000	101,000,000
Spain	20	15	27,900	60	46	71,900
Ukraine				10,800	8,300	7,500,000
Total	19,500	15,200	14,900,000	233,000	179,000	152,000,000
Grand total	32,800	26,100	30,200,000	358,000	282,000	275,000,000
Zero	- /	-,	-,,	,	,	, ,

⁻⁻ Zero.

¹Data rounded to no more than three significant digits; may not add to totals shown.

²Includes revisions to previous months' data.

³Customs value generally represents a value in the foreign country and therefore excludes U.S. import duties, freight, insurance, and other charges incurred in bringing the material into the United States.

 ${\rm TABLE~4}$ U.S. IMPORTS FOR CONSUMPTION OF MANGANESE ORE (20% OR MORE Mn) IN DECEMBER 2006 $^{1,\,2}$

(Metric tons)

				Year to date		
	Gross	Mn	Customs	Gross	Mn	Customs
Source	weight	content	value ³	weight	content	value ³
More than 20%, but less than 47% manganese:						
Brazil				1,790	812	\$280,000
Canada				6,510	1,850	309,000
China				2,410	858	115,000
Colombia	4,940	1,730	\$321,000	39,200	17,500	675,000
Ghana	41,200	15,400	2,410,000	41,200	15,400	2,410,000
Mexico				2,950	1,030	353,000
South Africa	38,600	14,700	2,740,000	107,000	40,600	7,660,000
Total	84,700	31,800	5,470,000	201,000	78,000	11,800,000
47% or more manganese:						
Australia				25,000	12,800	3,900,000
Belgium				2,090	1,100	305,000
Brazil	18	15	41,800	7,600	4,990	1,240,000
China				4,300	2,260	502,000
Gabon				230,000	120,000	26,600,000
Mexico				2,950	287	354,000
Morocco				38	29	15,000
South Africa				98,300	50,700	9,140,000
Total	18	15	41,800	371,000	192,000	42,100,000
Grand total	84,700	31,800	5,510,000	572,000	270,000	53,900,000

⁻⁻ Zero

Source: U.S. Census Bureau.

TABLE 5 U.S. IMPORTS FOR CONSUMPTION OF MANGANESE DIOXIDE IN DECEMBER 2006^1

(Metric tons, gross weight)

			Year to date		
		Customs		Customs	
Source	Quantity	value ²	Quantity	value ²	
Australia	388	\$728,000	13,700	\$19,300,000	
Belgium			618	1,490,000	
Brazil	6	9,870	344	322,000	
China	303	312,000	15,100	16,000,000	
Colombia			8	14,400	
France			3	29,400	
Germany			46	254,000	
Indonesia			40	74,500	
Japan	158	201,000	6,480	8,940,000	
Mexico			150	183,000	
Netherlands			1	4,290	
South Africa			2	3,960	
United Kingdom			(3)	13,400	
Total	854	1,250,000	36,400	46,600,000	

⁻⁻ Zero

¹Quantities for general imports and imports for consumption are identical.

²Data rounded to no more than three significant digits; may not add to totals shown.

³Customs value generally represents a value in the foreign country and therefore excludes U.S. import duties, freight, insurance, and other charges incurred in bringing the material into the United States.

¹Data rounded to no more than three significant digits; may not add to totals shown. ²Customs value generally represents a value in the foreign country and therefore excludes U.S. import duties, freight, insurance, and other charges incurred in bringing the material into the United States.

³Less than ½ unit.

TABLE 6 U.S. IMPORTS FOR CONSUMPTION OF MANGANESE METAL IN DECEMBER $2006^{\rm l}$

(Metric tons)

			Year	to date ²
	Gross	Customs	Gross	Customs
Source	weight	value ³	weight	value ³
Unwrought flake:				
China	916	\$1,350,000	18,100	\$23,500,000
Hong Kong			18	23,800
South Africa	168	293,000	3,300	5,390,000
Total	1,080	1,650,000	21,400	29,000,000
Unwrought powder:	•			
China			1,290	1,620,000
South Africa	393	678,000	3,800	6,810,000
Total	393	678,000	5,090	8,430,000
Unwrought, other:				
Brazil			73	153,000
China	340	460,000	1,740	2,800,000
Germany	114	261,000	836	1,580,000
Russia			21	76,100
South Africa			700	1,200,000
Spain	19	34,700	496	827,000
Total	473	755,000	3,870	6,640,000
Other manganese, wrought:				
Brazil			463	601,000
China			710	883,000
France	3	40,000	23	263,000
Jamaica			(4)	3,000
Mexico	41	71,400	223	376,000
Netherlands			15	30,800
United Kingdom	40	93,300	59	142,000
Total	84	205,000	1,490	2,300,000
Grand total	2,030	3,290,000	31,900	46,300,000

⁻⁻ Zero.

Note: Imports for consumption of metallic waste and scrap totaled 23 tons, all of which was from Canada, to give a year-to-date total of $1{,}010$ metric tons.

¹Data rounded to no more than three significant digits; may not add to totals shown.

²Includes revisions to previous months' data.

³Customs value generally represents a value in the foreign country and therefore excludes U.S. import duties, freight, insurance, and other charges incurred in bringing the material into the United States.

⁴Less than ½ unit.

TABLE~7 U.S. EXPORTS OF MANGANESE ORE (20% OR MORE Mn), FERROMANGANESE, SILICOMANGANESE, AND MANGANESE METAL BY COUNTRIES OF DESTINATION IN DECEMBER 2006^1

(Metric tons, gross weight)

			Ferrom	anganese,				
	Mang	anese ore	2% c	or less C	Silicon	nanganese	Manganese metal ²	
Country	December	Year to date ³	December	Year to date ³	December	Year to date ³	December	Year to date ³
Argentina								7
Australia						15		11
Austria	6	6						
Belgium							136	1,370
Brazil						123		24
Canada	47	1,490	1,110	11,900	606	6,830	34	655
Chile				1				14
China		35					9	157
Colombia								7
Dominican Republic		9						
France				660			5	347
Germany	36	180						154
Hong Kong							22	96
India								74
Indonesia		23		54		255		16
Ireland			12	12				
Israel							31	31
Italy								4
Japan		103					48	848
Korea, Republic of								41
Malaysia								8
Mexico				25		153	18	41
Netherlands				100		13		
Poland		21						
Portugal								3
South Africa								2
Spain						8		
Sweden		19					13	50
Switzerland								35
Trinidad and Tobago								3
United Kingdom		7		161			11	26
Venezuela	181	361						
Total	271	2,250	1,130	12,900	606	7,400	326	4,020

⁻⁻ Zero.

Note: Exports of ferromanganese with more than 2% carbon totaled 126 tons, of which 68 tons went to Canada and 59 tons went to Mexico, to give a year-to-date total of 16,200 tons.

 $^{^{1}\}mathrm{Data}$ rounded to no more than three significant digits; may not add to totals shown.

²Includes manganese-aluminum, some other alloys, and waste and scrap.

³Includes revisions to previous months' data.

7

 ${\it TABLE~8}$ U.S. FOREIGN TRADE IN SELECTED MANGANESE CHEMICALS IN DECEMBER 2006, BY CLASS 1

					Year	to date ²
			Principal sources			Principal sources
			and destinations:			and destinations:
	Gross weight	Value ³	gross weight (metric tons);	Gross weight	Value ³	gross weight (metric tons);
Class	(metric tons)	(thousands)	value ³ (thousands)	(metric tons)	(thousands)	value ³ (thousands)
Imports for consumption:						
Manganese oxides other than dioxide	167	\$165	Mexico 82; \$41	7,520	\$6,590	China 3,200; \$4,220
Manganites, manganates, and						
other permanganates				16	34	Japan 16; \$34
Potassium permanganate	174	405	Czech Republic 59; \$133	1,300	2,950	Czech Republic 584; \$1,290
Sodium permanganate				47	63	China 47; \$63
Sulfates, basket category,						
including manganese sulfate	2,820	1,350	China 2,260; \$861	45,100	25,600	China 22,000; \$9,940
Exports:						
Manganese dioxide	437	507	Canada 260; \$178	6,040	5,830	Canada 3,490; \$2,140
Manganese oxides other than dioxide	993	958	Canada 436; \$213	22,200	12,400	Canada 17,500; \$6,510
Manganites, manganates, and						
other permanganates	2	4	Canada 2; \$4	46	108	Canada 46; \$108
Potassium permanganate	118	1,090	Canada 48; \$123	2,340	6,500	Spain 695; \$1,510
Sodium permanganate	183	401	Spain 76; \$129	1,500	4,410	Spain 581; \$2,040
Sulfates, basket category,						
including manganese sulfate	2,630	2,050	Canada 1,500; \$770	26,400	20,500	Canada 19,900; \$10,600

⁻⁻ Zero.

¹Data are rounded to no more than three significant digits.

²Includes revisions to previous months' data.

³For imports, Customs value; for exports, free alongside ship value.