

Mineral Industry Surveys

For information, contact:

James F. Carlin, Jr., Tin Commodity Specialist

U.S. Geological Survey

989 National Center

Reston, VA 20192

Telephone: (703) 648-4985, Fax: (703) 648-7757

E-mail: jcarlin@usgs.gov

Elsie D. Isaac (Data)

Telephone: (703) 648-7950

Fax: (703) 648-7975

E-mail: eisaac@usgs.gov

MINES FaxBack: (703) 648-4999

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

TIN IN SEPTEMBER 2000

Domestic consumption of primary tin in September was estimated by the U.S. Geological Survey to be 2% lower than that in August, but 1% higher than that in September 1999.

The *Platt's Metals Week* average composite price for tin in September was \$3.72 per pound, 2% higher than that in August and 2% higher than that in September 1999. During the first 9 months of 2000, January and September have been the only 2 months with a price increase.

The U.S. Steel Group of USX Corp. (Pittsburgh, PA) announced that it would acquire the tin mill products business of LTV Corp. (Cleveland, OH). LTV's tin mill products operations are located in Aliquippa, PA, and East Chicago, IN. Upon takeover, U.S. Steel will shutdown the Aliquippa facility. Under the terms of the agreement, U.S. Steel will assume about \$95 million of LTV's employee related obligations, including shutdown benefits for about 400 workers at the tin mill in Aliquippa, PA, and the assumption of pension, medical, and life insurance obligations for all employees. The company indicated that about half of the expense would be covered by U.S. Steel's overfunded pension plan. The purchase is expected to be completed by the end of 2000. With Pohang Iron and Steel Corp. of South Korea, U.S. Steel is also half-owner of USS-Posco Industries Corp., a joint venture steel plant in Pittsburgh, CA. This joint venture is the only tinplate producer on the West Coast. The LTV acquisition will make U.S. Steel Corp. the nation's major producer of tin mill products. In acquiring LTV's 500-employee tin mill at its large Indiana Harbor Works in East Chicago, IN, U.S. Steel will boost its capacity to produce tin-coated sheet to about 1.7 million metric tons (Mt) per year. U.S. Steel tin mills at its large Gary, IN, works and at its smaller Fairless works (Fairless Hills, PA) together can produce about 1.30 Mt annually. The domestic tinplate market is estimated to be about 4.5 Mt annually (American Metal Market, 2000b).

The U.S. Steel Group also completed its purchase of the steelmaking operations of VSZ a.s. (Kosice, Slovakia) after the shareholders of the Slovak firm approved the deal. The new U.S. Steel subsidiary, named U.S. Steel Kosice s.r.o., represents about

25% of the firm's expanded steelmaking capacity. The Kosice mill, a modern, 100%-continuous-cast steel producer, produces flat-rolled sheet and tin mill products, and ships to the central European market (American Metal Market, 2000c).

PT Tambang Timah (Jakarta, Indonesia), the world's largest tin mining enterprise, announced that it would close its lone sales office in the United States by yearend. Timah's U.S. sales office has been located in New York, NY, for over 10 years and has been one of the few examples of a major producer selling its refined tin directly to consumers in the United States. Most refined tin is sold by major world producers to importers/dealers domestically who in turn re-sell it to a wide variety of users. Timah also announced that it plans to sell online (e-commerce) by yearend (Platt's Metals Week, 2000).

The Government of China, the world's leading tin producer, announced that it will seek to attract foreign investment for mining in Xinjiang Province, located in northwestern China. The Government intends to adopt preferential policies to attract foreign capital to tap vast resources of natural gas, coal, and non-ferrous metals in Xinjiang along with state-owned mining enterprises. Foreign companies that invest in Xinjiang will be eligible for exemption from fees for mining rights in the first year and a subsequent 50% reduction for the next 2 years. Wholly owned foreign companies and joint ventures will be exempt from mineral resource compensation fees for 5 years. Also, the Government will seek to attract investment by issuing stocks, holding assets sales, and franchising. China believes these moves would accelerate its entry into the World Trade Organization and further lift its economy. Geologists working in Xinjiang recently discovered deposits of copper, nickel, lead, zinc, and tin near the province of Urumqi—an estimated total of about 1.2 Mt of base metal ores in an area covering almost 860,000 square kilometers (Metal Bulletin, 2000a).

In London, Baseresult Ltd., a Cornwall firm, announced that it was close to finalizing the acquisition of the South Crofty tin mine in Cornwall, and was making plans to pump water out of the mine shafts. These shafts were flooded 29 months ago when the mine

was closed, with the loss of 300 jobs. The dewatering is expected to take 4 years and cost \$3 million to pump out the 2,600 feet of tunnels in the mine. The firm expected to operate the mine for 14 years. It valued reserves at \$190 million. The future of the mine is clouded, however, by plans announced recently by the South West England Regional Development Agency, which may oppose the 40-acre tin mine. The region has a metropolitan population of around 45,000. The area is a mix of houses, industrial areas, and retail centers. Part of Baseresult's business plan involves the pumping of mine waste and power station ash into underground voids in order to dispose of tin tailings and to stabilize the ground. Consequently, some in the community fear the region could become a landfill site. Baseresult expected to derive 60% of its income from the sale of tin concentrates, with the other 40% coming from assimilating ash into its tailings disposal system (American Metal Market, 2000a).

Also in London, it was reported that Rio Tinto plc has selected the final two bidding groups seeking to buy Rio's 49% stake in the

Portuguese copper-tin miner Somincor (Metal Bulletin, 2000b).

Update

On November 10, 2000, the *Platt's Metals Week* composite price for tin was \$3.63 per pound.

References Cited

- American Metal Market, 2000a, Development project may get in way of effort to reopen tin mine: American Metal Market, v. 108, no. 203, October 20, p. 7.
- 2000b, U.S. Steel Group set to acquire LTV tin unit: American Metal Market, v. 108, no. 195, October 9, p. 1.
- 2000c, VSZ shareholders ok USS deal: American Metal Market, v. 108, no. 198, October 13, p. 3.
- Metal Bulletin, 2000a, China to foster mining investment in Xinjiang: Metal Bulletin, no. 8520, October 26, p. 5.
- 2000b, Somincor short-list: Metal Bulletin, no. 8520, October 26, p. 14.
- Platt's Metals Week, 2000, Tin giant Tambang Timah closing US office: Platt's Metals Week, v. 71, no. 43, October 24, p. 2.

TABLE 1
SALIENT TIN STATISTICS 1/

(Metric tons, unless otherwise noted)

	2000			
	1999	August	September	January-September
Production, secondary e/ 2/	16,300	900	900	8,100
Consumption:				
Primary	38,400	3,570 r/	3,510	31,800
Secondary	8,890	906	887	8,050
Imports for consumption, metal	47,500	3,550	NA	NA
Exports, metal	6,770	568	NA	NA
Stocks at end of period	10,700	7,820	8,210	XX
Prices (average cents per pound): 3/				
Metals Week composite 4/	365.98	363.52	372.11	XX
Metals Week New York dealer	254.54	249.50	257.31	XX
London, standard grade, cash	245.00	240.00	248.00	XX
Kuala Lumpur	240.70	239.34	245.07	XX

e/ Estimated. r/ Revised. NA Not available. XX Not applicable.

1/ Data are rounded to no more than three significant digits, except prices.

2/ Includes tin recovered from alloys and tinplate. The detinning of tinplate (coated steel) yields only a small part of the total.

3/ Source: Platt's Metals Week.

4/ The Metals Week composite price is a calculated formula, not a market price, that includes fixed and finance charges, and a risk factor. It is normally substantially higher than other tin prices.

TABLE 2
METALS WEEK COMPOSITE PRICE 1/

(Cents per pound)

Period	High	Low	Average
1999:			
September	372.30	357.68	364.61
October	383.67	363.53	369.61
November	397.54	385.56	391.55
December	403.52	381.53	386.61
Year	403.52	343.72	365.98
2000:			
January	405.27	390.75	397.72
February	391.72	377.25	382.84
March	383.26	364.68	373.01
April	371.49	365.85	368.16
May	369.58	363.91	367.72
June	373.83	362.99	368.23
July	372.25	362.15	366.03
August	372.25	362.15	363.52
September	375.60	365.86	372.11

1/ The Metals Week composite price is a calculated formula, not a market price, that includes fixed and finance charges, and a risk factor. It is normally substantially higher than other tin prices.

Source: Platt's Metals Week.

TABLE 3
TINPLATE PRODUCTION AND SHIPMENTS IN THE UNITED STATES 1/

(Metric tons, unless otherwise noted)

Period	Tinplate waste (waste, strips, cobble, etc.) (gross weight)	Tinplate (all forms)			Shipments 2/
		Gross weight	Tin content	Tin per metric ton of plate (kilograms)	
1999	W	1,750,000	9,080	5.2	2,370,000
2000:					
January	W	141,000	718	5.1	184,000
February	W	144,000	785	5.5	175,000
March	W	155,000	810	5.2	203,000
April	W	149,000	736	4.9	170,000
May	W	156,000	816	5.2	219,000
June	W	149,000	795	5.3	203,000
July	W	165,000	780	4.7	182,000
August	W	157,000	795	5.1	214,000
September	W	145,000	761	5.3	203,000

W Withheld to avoid disclosing company proprietary data.

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

2/ Source: American Iron and Steel Institute monthly publication.

TABLE 4
U.S. TIN IMPORTS FOR CONSUMPTION AND EXPORTS 1/

(Metric tons)

Country or product	2000			January- August
	1999	July	August	
Imports:				
Metal (unwrought tin):				
Bolivia	3,850	651	339	5,070
Brazil	4,700	662	620	4,020
Chile	3,980	--	--	1,720
China	13,900	937	722	7,180
Hong Kong	261	120	--	397
Indonesia	7,930	479	419	3,600
Japan	282	--	--	--
Malaysia	944	--	--	104
Peru	11,000	1,110	1,430	8,480
Russia	--	--	--	145
Singapore	60	--	--	20
Thailand	20	--	--	--
United Kingdom	60	5	2	216
Other	533	70	20	275
Total	47,500	4,030	3,550	31,200
Other (gross weight):				
Alloys	3,090	324	359	2,770
Bars and rods	872	112	95	675
Foil, tubes, pipes	1	--	--	--
Plates, sheets, strip	122	7	136	550
Waste and scrap	2,730	104	181	1,430
Miscellaneous	2,290	1,550	605	5,150
Total	9,100	2,090	1,380	10,600
Exports (metal)	6,770	524	568	3,960

-- Zero.

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

Source: U.S. Census Bureau.

TABLE 5
CONSUMPTION OF TIN IN THE UNITED STATES, BY FINISHED PRODUCT 1/

(Metric tons of contained tin)

Product	2000							
	1999	August			September			January- September total 2/
		Primary	Secondary	Total	Primary	Secondary	Total	
Alloys (miscellaneous) 3/	W	121	W	121	119	W	119	1,100
Babbitt	1,610	W	W	W	W	W	W	249
Bar tin and anodes	718	25	W	25	24	W	24	220
Bronze and brass	3,410	99 r/	144	243	108	125	233	2,170
Chemicals	8,220	682	W	682	682	W	682	6,130
Collapsible tubes and foil	45	W	W	W	W	W	W	W
Solder	18,700	741	338	1,080	876	417	1,290	12,600
Tinning	862	58 r/	--	58 r/	57	--	57	527
Tinplate 4/	9,150	795	--	795	761	--	761	7,000
Tin powder	W	W	--	W	48	W	48	195
White metal 5/	892	W	--	W	W	W	W	10
Other	3,620	452 r/	124	576	236	45	281	1,540
Total reported	47,300	2,970	606	3,580	2,910	587	3,500	31,800
Estimated undistributed consumption 6/	--	600	300	900	600	300	900	8,070
Grand total	47,300	3,570 r/	906	4,480 r/	3,510	887	4,400	39,800

r/ Revised. W Withheld to avoid disclosing company proprietary data; included with "Other." -- Zero.

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

2/ May include revisions for prior months.

3/ Includes terre metal.

4/ Includes secondary pig tin and tin components of tinplating chemical solutions.

5/ Includes pewter, britannia metal, and jewelers' metal.

6/ Estimated consumption of plants reporting on an annual basis.