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Mineral Industry Surveys

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TIN IN FEBRUARY 2002

Domestic consumption of primary tin in February was estimated by the U.S. Geological Survey to be about 3% lower than that in January and 9% lower than that in February 2001.

The Platts Metals Week average composite price for tin in February was $2.73 per pound, down 3% from that in January and 23% lower than that in February 2001.

Tin prices in the first quarter of 2002 remained at low levels worldwide, down about 25% from the high levels in 1999. Industry observers believe one of the important reasons for low prices is oversupply caused mostly by the growing volume of tin mined in the Babel Province of Indonesia at illegal mining operations. By one estimate, the illegal mining accounts for about 45,000 metric tons per year (t/yr) of tin (Container Recycling Report, 2002).

In Indonesia, it was announced that the world's largest tin mining organization, PT Timah, planned to cut costs by merging subsidiaries that duplicate each other's functions. The new structure, which will cost $20 million to achieve, calls for removal of non-tin mining units and the streamlining of Timah's investment unit (Platts Metals Week, 2002d). Timah is on the verge of bankruptcy reportedly due in large part to government liberalization policies in the industry that inadvertently boosted illegal mining. Management of the state-owned firm has expressed concern that Timah cannot survive the year. In an effort to avoid bankruptcy, Timah has drawn up a plan to lay off 3,800 of the firm's 5,000 employees, return most of its land-based mining territory to the Government, and sell unproductive assets or those that have no direct relation to tin production. Also, Timah has already halted operations at most of its dredges, which had contributed roughly half of its total tin production.

The Indonesian Government has vowed to combat illegal miners. However, government officials admit it will be difficult to eliminate the estimated 130,000 illegal operations because about 13% of the one million citizens of Babel Province rely on illegal mining for their income. Complaints about illegal tin mining in the country have also been voiced internationally. In a special meeting in London during October 2001, four of the world's largest tin mining companies—Tambang Timah, Minsur SA of Peru, Hunan Tin Corp. of China, and Murchison NL of Australia—together with the subsidiary of Australia's Iluka Resources Ltd., PT Koba Tin (Indonesia), issued a joint statement expressing concern about illegal mining in Indonesia. Illegally mined tin ore has led to a significant drop in tin prices, causing these firms to incur large losses.

Significant government liberalization of the tin industry was implemented in 1999. Liberalization policies removed tin from a list of strategic commodities such as oil, allowing the metal to be traded and exported freely without strict surveillance. As a strategic commodity, only a few companies had official licences to export and trade tin. The liberalization policy set no limit on tin exports and also exempted tin ore producers from paying royalties to the government. As a result, the government lost $5 million in 2001 in royalties. Moreover, the illegal miners produced only tin ore, costing the country $50 million of added value that could have been derived from processing ore into tin concentrate. According to government officials, the policy was intended to boost exports and create new job opportunities. Nevertheless, the policy caused the number of illegal tin operations to balloon from only a few hundred to 7,000 within a year of being introduced. Government officials now also acknowledge that rampant illegal mining has led to massive environmental destruction throughout Babel Province, which is home to about 90% of Indonesia's tin deposits. Legal and illegal mining operations in Babel Province account for about one-third of the world's tin production, which totals some 280,000 t/yr. Illegal miners there exceed Timah's output of 40,000 t/yr (Nikkei Weekly, 2002).

In China, it was announced that 15 officials in charge of the Xinzhou tin mine in the Nandan District of southwest China (where 81 miners died in a flood during July 2001) were sentenced to more than 10 years in prison for corruption.

Most of the officials were jailed for taking bribes. Other officials in the Nandan District were dismissed from their positions after the tin mine flooded (Platts Metals Week, 2002a).

Antaike, the Chinese nonferrous metals information center, announced that China's total tin output in 2001 reached 92,000 metric tons (t), down 17% from 2000. The decline was attributed to lower prices, as well as shutdowns at tin mines in the Nandan District following the deadly mining accident at the Xinzhou Mine. China exported 46,000 t of tin in 2001, down from 62,000 t in 2000 (Platts Metals Week, 2002b).

Minsur SA, Peru's only tin miner, announced that it expects its tin output to increase by 10% this year. Minsur's underground San Rafael tin mine is located in the southern highland region of Puno; production capacity is 2,500 metric tons per day. The mine produced 38,000 t of tin-in-concentrate in 2001. Minsur also plans to invest $8 million this year on exploration at concessions around the country to boost tin reserves. In addition, Minsur plans to refine all of its tin output this year at its 45,000-t/yr Funsur tin refinery in the Southern Peru Port of Pisco. About 60% of Minsur's exports are sold to the United States and 35% are shipped to Europe. Minsur is studying the possibility of a $20 million upgrade to expand capacity at the refinery to 60,000 t/yr in 2003. The San Rafael Mine has reserves of 14 million metric tons with ore grades of 5% tin, making it one of the world's richest tin deposits. The mine's estimated life is 15 years. Minsur, controlled by the local Brescia Group, makes Peru the world's third ranked tin producer after China and Indonesia, and its production costs are $1,200 per metric ton (Platts Metals Week, 2002c).

Update

On March 5, the United States imposed 30% tariffs on a variety of steel products, including tin mill products, as part of a 3-year program of import restrictions on most steel imports that the U.S. International Trade Commission determined were a substantial cause of serious financial harm to the domestic steel industry. Exempt from the ruling were North American Free Trade Agreement (NAFTA) partners—Canada and Mexico—as well as developing countries in the World Trade Organization whose exports have been less than 3% of total American imports, which include Argentina, Turkey, and Thailand. The 30% tariffs will decrease by 6% in each year; that is, to 24% in the second year of relief and 18% in the third year (Metal Bulletin, 2002).

On April 15, 2002, the Platts Metals Week composite price for tin was $2.91 per pound.

References Cited

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Platts Metals Week, 2002a, China sentences 15 for mine accident: Platts Metals Week, v. 73, no. 11, March 18, p. 6.

Platts Metals Week, 2002b, China's 2001 tin output dips 17%: Platts Metals Week, v. 73, no. 9, March 4, p. 7.

Platts Metals Week, 2002c, Minsur to boost tin output 10% this year: Platts Metals Week, v. 73, no.11, March 18, p. 6.

Platts Metals Week, 2002d, Timah plans $20 million subsidiary merger: Platts Metals Week, v. 73, no. 11, March 18, p. 6.

TABLE 1
SALIENT TIN STATISTICS 1/

(Metric tons, unless otherwise noted)

		2002		
	2001 p/	January	February	January-February
Production, secondary e/ 2/	10,800	900	900	1,800
Consumption:				
Primary	39,300	3,110 r/	3,020	6,130
Secondary	10,500	855 r/	857	1,710
Imports for consumption, metal	37,500	2,950	NA	NA
Exports, metal	4,350	378	NA	NA
Stocks at end of period	XX	7,320 r/	7,410	XX
Prices (average cents per pound): 3/				
Metals Week composite 4/	314.88	280.68	273.15	XX
Metals Week New York dealer	211.48	185.16	178.59	XX
London, standard grade, cash	200.00	175.00	169.00	XX
Kuala Lumpur	200.77	175.72	169.92	XX

e/ Estimated. p/ Preliminary. 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: Platts 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
2001:			
February	355.03	349.76	352.96
March	352.74	341.70	348.45
April	346.75	340.32	342.70
May	348.21	336.94	342.78
June	344.36	325.63	332.74
July	321.14	291.50	306.98
August	285.47	270.73	280.33
September	278.39	262.81	268.50
October	275.81	264.30	270.42
November	301.03	272.87	287.17
December	297.98	283.04	289.64
Year	359.89	262.81	314.88
2002:			
January	287.97	277.20	280.68
February	280.03	267.12	273.15

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: Platts Metals Week.

Note: Data for 2001 in the January 2002 publication were printed erroneously.

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

(Metric tons, unless otherwise noted)

Period	Tinplate waste (waste, strips, cobbles, etc.) (gross weight)	Tinplate (all forms) Gross weight	Tin content	Tin per metric ton of plate (kilograms)	Shipments 2/
2001p/	77,500	1,710,000	8,130	4.8	2,010,000
2001:					
December	3,880	136,000	668	4.9	130,000
2002:					
January	W	187,000 r/	683 r/	3.6 r/	191,000
February	5,190	190,000	637	3.4	152,000

p/ Preliminary. r/ Revised. 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	2001 Year p/	2001 December	2002 January
Imports:			
Metal (unwrought tin):			
Bolivia	6,040	450	610
Brazil	5,510	621	220
Chile	122	--	--
China	6,360	140	473
Hong Kong	20	--	--
Indonesia	3,880	260	100
Malaysia	674	170	--
Peru	14,000	1,830	1,520
Russia	143	--	--
Singapore	145	--	--
United Kingdom	118	--	--
Other	434	2	33
Total	37,500	3,470	2,950
Other (gross weight):			
Alloys	3,830	403	381
Bars and rods	539	29	9
Foil, tubes, pipes	1	--	(2/)
Plates, sheets, strip	529	--	2
Waste and scrap	3,700	29	--
Miscellaneous	13,900	1,300	4,090
Total	22,500	1,760	4,480
Exports (metal)	4,350	269	378

p/ Preliminary. -- Zero.
1/ Data are rounded to no more than three significant digits; may not add to totals shown.
2/ Less than 1/2 unit.

Source: U.S. Census Bureau.

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

(Metric tons of contained tin)

Product	2001 p/	2002						
		January			February			January-February
		Primary	Secondary	Total	Primary	Secondary	Total	
Alloys (miscellaneous) 2/	1,500	133 r/	W	133 r/	134	W	134	267
Babbitt	316	59 r/	23 r/	82 r/	24	23	47	129
Bar tin and anodes	248	19	W	19	16	W	16	35
Bronze and brass	2,640	89 r/	107 r/	196 r/	85	109	194	390
Chemicals	8,020	642	W	642	642	W	642	1,280
Collapsible tubes and foil	W	W	W	W	W	W	W	W
Solder	15,700	680 r/	412 r/	1,090 r/	774	412	1,190	2,280
Tinning	906	31 r/	--	31 r/	33	--	33	64
Tinplate 3/	8,130	683 r/	--	683 r/	637	--	637	1,320
Tin powder	W	W	W	W	W	W	W	W
White metal 4/	W	W	W	W	W	W	W	W
Other	1,530	178	13 r/	191 r/	75	13	88	279
Total reported	38,900	2,510 r/	555 r/	3,070 r/	2,420	557	2,980	6,050
Estimated undistributed consumption 5/	10,800	600	300	900	600	300	900	1,800
Grand total	49,700	3,110 r/	855 r/	3,970 r/	3,020	857	3,880	7,850

p/ Preliminary. 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/ Includes terne metal.

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

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

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