

# Mineral Industry Surveys

### For information, contact:

Rob Crangle, Gypsum Commodity Specialist National Minerals Information Center U.S. Geological Survey 989 National Center Reston, VA 20192

Telephone: (703) 648-6410, Fax: (703) 648-7757

Email: rcrangle@usgs.gov

Susan M. Weaver (Data) Telephone: (703) 648-7979 Fax: (703) 648-7975 Email: sweaver@usgs.gov

Internet: https://www.usgs.gov/centers/national-minerals-

information-center

## **GYPSUM IN THE FOURTH QUARTER 2023**

Producers mined 5.42 million metric tons (Mt) of gypsum in the fourth quarter of 2023, unchanged from that in the third quarter of 2023 and 9% less than that in the fourth quarter of 2022. The total production of mined gypsum in 2023 was 21.6 Mt, which was 3% less than that in 2022. Synthetic gypsum used was estimated to be 3.63 Mt in the fourth quarter of 2023, which was unchanged from that in the third quarter of 2023, and unchanged from that in the fourth quarter of 2022. During the fourth quarter of 2023, synthetic gypsum accounted for approximately 33% of the 10.9-Mt total supply of gypsum in the United States. Total synthetic gypsum used in 2023 was estimated to be 14.5 Mt, which was unchanged from that in 2022 (table 1). Both mined and synthetic gypsum are used as raw material for wallboard. The wallboard industry is the leading domestic consumer of gypsum.

Calcined gypsum production during the fourth quarter of 2023 was 4.82 Mt, which was 4% more than that in the third quarter of 2023 and essentially unchanged from than that in the fourth quarter of 2022 (table 1). Sales of board products were 3.87 Mt, equivalent to approximately 625 million square meters (6.73 billion square feet), unchanged from those in the third quarter of 2023 and essentially unchanged from those in the fourth quarter of 2022 (table 2). The total supply of calcined gypsum in 2023 was 18.9 Mt, which was essentially unchanged from the total annual supply of calcined gypsum in 2022 (table 1).

Sales of uncalcined gypsum in the fourth quarter of 2023, primarily for portland cement and agricultural uses, were estimated to be 4.95 Mt, unchanged from those in the third quarter of 2023 and essentially unchanged from the fourth quarter of 2022. Total estimated sales of uncalcined gypsum in 2023 were 19.8 Mt, which were essentially unchanged from those in 2022 (table 2).

The occurrence of quarterly fluctuations is not unusual in the production and consumption of gypsum, synthetic gypsum, and calcined gypsum. These variances are often the result of differences in weather conditions, which can impede or encourage construction activities, coupled with market demands

that are often driven by residential and commercial building activity.

According to the U.S. Census Bureau, imports of crude gypsum in the fourth quarter of 2023 were 1.88 Mt (table 3), essentially unchanged from those in the third quarter of 2023 and 6% more than those in the fourth quarter of 2022. Spain was the leading source with 41% of total crude imports, followed by Canada with 29% and Mexico with 25%. Total crude gypsum imports in 2023 were 7.79 Mt, 13% more than those in 2022.

According to the U.S. Census Bureau, gypsum wallboard imports for the fourth quarter of 2023 were 154,000 t, equivalent to about 17.2 million square meters (185 million square feet). These imports were 26% less than those in the third quarter of 2023 and 26% less than those in the fourth quarter of 2022. Mexico was the source of 98% of wallboard imports, with most of the remaining imported from Canada. Total wallboard imports in 2023 were 786,000 t, 4% less than those in 2022.

Wallboard exports to 31 countries or localities in the fourth quarter of 2023 were 169,000 t, equivalent to 18.8 million square meters (202 million square feet). These were essentially unchanged from those in the third quarter of 2023 and 11% more than those in the fourth quarter of 2022. Most wallboard exports were shipped to Canada, which accounted for 92% of the total. Wallboard exports in 2023 were 699,000 t, 11% more than those in 2022.

Changes in wallboard import and export data are frequently amplified as a result of relatively small quantities of traded material.

All percentages in this report were calculated based on unrounded data.

List services and web feed subscribers are the first to receive notification of new USGS minerals information publications and data releases. For more information on how to subscribe, visit: https://www.usgs.gov/centers/national-minerals-information-center/minerals-information-publication-list-services

# TABLE 1 GYPSUM SUPPLY $^{1,2}$

### (Metric tons)

-	202	22	2023							
	1st quarter—			1st quarter-						
	4th quarter	4th quarter	1st quarter	2d quarter	3d quarter	4th quarter	4th quarter			
Crude:										
Mined <sup>3</sup>	5,950,000	22,300,000	5,280,000 <sup>r</sup>	5,490,000 <sup>r</sup>	5,390,000 <sup>r</sup>	5,420,000	21,600,000			
Imported <sup>4</sup>	1,780,000	6,870,000	1,840,000	2,200,000	1,860,000	1,880,000	7,790,000			
Synthetic gypsum <sup>5</sup>	3,630,000	14,500,000	3,630,000	3,630,000	3,630,000	3,630,000	14,500,000			
Total supply	11,400,000	43,700,000	10,800,000	11,300,000 <sup>r</sup>	10,900,000	10,900,000	43,900,000			
Crude, exported <sup>4</sup>	8,950	39,000	10,500	11,500	13,400	8,660	44,100			
Consumption	11,300,000	43,700,000	10,700,000 <sup>r</sup>	11,300,000 <sup>r</sup>	10,900,000	10,900,000	43,800,000			
Calcined:										
Produced	4,860,000	18,700,000	4,680,000	4,740,000	4,610,000	4,820,000	18,900,000			
Imported <sup>6</sup>	7,930	29,200	10,700	14,900	12,900	11,700	50,100			
Total supply	4,860,000	18,700,000	4,690,000	4,750,000	4,630,000	4,830,000	18,900,000			
Exported <sup>6</sup>	27,200	106,000	29,300	34,800	28,200	20,300	113,000			
Consumption	4,840,000	18,600,000	4,660,000	4,720,000	4,600,000	4,810,000	18,800,000			

Revised.

<sup>&</sup>lt;sup>1</sup>Includes data from the Gypsum Association.

<sup>&</sup>lt;sup>2</sup>Data are rounded to no more than three significant digits; may not add to totals shown.

<sup>&</sup>lt;sup>3</sup>Includes estimated data.

<sup>&</sup>lt;sup>4</sup>Import and export data are for "Gypsum; anhydrite," Harmonized Tariff Schedule 2520.10.0000.

<sup>&</sup>lt;sup>5</sup>Estimated, based on American Coal Ash Association data for FGD gypsum used.

 $<sup>^6\</sup>mathrm{Import}$  and export data are for "Plaster," Harmonized Tariff Schedule 2520.20.0000.

 $\label{eq:table 2} {\sf GYPSUM\ SOLD\ OR\ USED\ BY\ PRODUCERS,\ BY\ USE}^{1,\,2}$ 

(Metric tons, unless otherwise specified)

	20	)22	2023					
		1st quarter-			1st quarter-			
	4th quarter	4th quarter	1st quarter	2d quarter	3d quarter	4th quarter	4th quarter	
Uncalcined: <sup>e, 3</sup>								
Portland and masonry cement	1,375,000	5,500,000	1,400,000	1,400,000	1,400,000	1,400,000	5,600,000	
Agriculture and other <sup>4</sup>	3,600,000	14,400,000	3,550,000	3,550,000	3,550,000	3,550,000	14,200,000	
Total	4,975,000	19,900,000	4,950,000	4,950,000	4,950,000	4,950,000	19,800,000	
Calcined:								
Board products <sup>5</sup>	3,850,000	15,900,000	3,860,000	3,960,000	3,890,000	3,870,000	15,600,000	
Plaster	17,100	75,600	19,700	19,900	16,600	17,200	73,400	
Total	3,870,000	16,000,000	3,880,000	3,980,000	3,900,000	3,890,000	15,700,000	
Board products: (thousand square feet) <sup>6</sup>								
Regular board	3,850,000	16,300,000	3,600,000	3,640,000	3,620,000	3,650,000	14,500,000	
Type X board	2,030,000	8,290,000	2,160,000	2,300,000	2,210,000	2,180,000	8,830,000	
Other	903,000	3,620,000	946,000	912,000	916,000	903,000	3,680,000	
Total supply	6,780,000	28,200,000	6,700,000	6,850,000	6,740,000	6,730,000	27,000,000	

<sup>&</sup>lt;sup>e</sup>Estimated.

<sup>&</sup>lt;sup>1</sup>Includes data from the Gypsum Association.

<sup>&</sup>lt;sup>2</sup>Data are rounded to no more than three significant digits; may not add to totals shown.

<sup>&</sup>lt;sup>3</sup>Does not include synthetic gypsum from electric powerplants.

<sup>&</sup>lt;sup>4</sup>Includes gypsum used for infrastructure purposes, unspecified uses, and estimated under-reported amount.

<sup>&</sup>lt;sup>5</sup>Includes weight of paper and other materials.

<sup>&</sup>lt;sup>6</sup>One square meter equals 10.78 square feet.

 $\label{eq:table 3} \text{CRUDE GYPSUM IMPORTED FOR CONSUMPTION}^{1,\,2}$ 

### (Metric tons)

	20	)22	2023								
	1st quarter			1st quarter-							
Country or locality	4th quarter	4th quarter	1st quarter	2d quarter	3d quarter	4th quarter	4th quarter				
Canada	557,000	2,120,000	484,000	627,000	450,000	540,000	2,100,000				
China	91	821	80	41	755	6	882				
Dominican Republic	7,520	34,400		9,130	36		9,160				
Germany	21	42	18	244	1	20	283				
India	2,840	2,840	1				1				
Mexico	479,000	1,980,000	455,000	650,000	595,000	466,000	2,170,000				
Morocco	320	923	101	25	4,450	101	4,680				
Spain	611,000	2,510,000	811,000	782,000	807,000	777,000	3,180,000				
Taiwan	2	4	23				23				
Thailand		103		80		80	160				
Turkey	123,000	225,000	58,600	136,000		97,800	293,000				
United Arab Emirates			34,500				34,500				
United Kingdom		116	132		38	213	383				
Other	19	35			32	46	78				
Total	1,780,000	6,870,000	1,840,000	2,200,000	1,860,000	1,880,000	7,790,000				

<sup>--</sup> Zero.

Source: U.S. Census Bureau.

<sup>&</sup>lt;sup>1</sup>Data are rounded to no more than three significant digits; may not add to totals shown.

<sup>&</sup>lt;sup>2</sup>May include revisions to previously published data.

 $\label{eq:table 4} \text{CRUDE GYPSUM IN THE UNITED STATES}^{1,2}$ 

### (Metric tons)

Period	Consumption <sup>3</sup>	Production <sup>4</sup>	Imports <sup>5</sup>	Exports <sup>5</sup>	
2022:					
4th quarter	7,720	5,950	1,780	9	
1st quarter-4th quarter	29,200	22,300	6,870	39	
2023:					
1st quarter	7,120 <sup>r</sup>	5,280 <sup>r</sup>	1,840	10	
2d quarter	7,680 <sup>r</sup>	5,490 <sup>r</sup>	2,200	12	
3d quarter	7,240 <sup>r</sup>	5,390 <sup>r</sup>	1,860	13	
4th quarter	7,290	5,420	1,880	9	
1st quarter–4th quarter	29,300	21,600	7,790	44	

Revised.

<sup>&</sup>lt;sup>1</sup>Excludes synthetic gypsum.

<sup>&</sup>lt;sup>2</sup>Data are rounded to no more than three significant digits; may not add to totals shown.

<sup>&</sup>lt;sup>3</sup>Consumption calculated by adding production and imports and subtracting exports. Quarterly inventory changes are not included.

<sup>&</sup>lt;sup>4</sup>Production data derived from semiannual gypsum canvasses of non-wallboard producers, annual canvass of all producers, and quarterly data provided by the Gypsum Association.

<sup>&</sup>lt;sup>5</sup>Data from U.S. Census Bureau.

 ${\it TABLE 5}$  SALES OF GYPSUM BOARD PRODUCTS, BY SALES REGIONS IN  $2023^{1,2}$ 

(Thousand square feet)<sup>3</sup>

	New	Middle	E. North	W. North	South	E. South	W. South				
	England	Atlantic	Central	Central	Atlantic	Central	Central	Mountain	Pacific	Exports	Total
4th quarter:											
Veneer base	44,600	1,700	10,400	209	3,920	14	7	115	837		61,800
Sheathing	4,750	10,900	8,270	7,870	21,000	4,910	19,500	8,060	20,200	12,200	118,000
Regular gypsum board	60,100	245,000	369,000	225,000	1,150,000	320,000	608,000	324,000	280,000	63,300	3,650,000
Type X gypsum board	62,400	217,000	238,000	153,000	465,000	102,000	275,000	272,000	362,000	32,100	2,180,000
Liner panel	1,980	8,980	3,840	1,420	28,800	3,980	6,620	7,470	3,270	545	66,900
Predecorated board	427	1,770	1,880	905	2,990	936	2,240	1,270	1,420	438	14,300
5/16 Mobile home board		1,580	2,970		607	5,800	764			29	11,700
Water/moisture resistant board	25,900	128,000	55,700	28,600	171,000	33,400	69,800	37,300	63,400	17,900	631,000
Total	200,000	615,000	690,000	418,000	1,840,000	471,000	981,000	651,000	730,000	126,000	6,730,000
1st quarter-4th quarter:											
Veneer base	197,000	6,620	41,700	1,010	17,400	20	89	537	4,030	1	268,000
Sheathing	15,600	44,000	30,300	31,400	81,200	19,600	81,100	36,000	87,900	62,900	490,000
Regular gypsum board	245,000	1,000,000	1,440,000	879,000	4,620,000	1,240,000	2,390,000	1,270,000	1,150,000	265,000	14,500,000
Type X gypsum board	263,000	915,000	981,000	640,000	1,850,000	386,000	1,050,000	1,100,000	1,500,000	142,000	8,830,000
Liner panel	7,140	34,300	17,100	5,950	123,000	13,800	24,300	26,500	12,400	2,780	268,000
Predecorated board	2,180	6,720	7,690	3,650	12,000	3,800	8,540	4,320	5,640	1,470	56,000
5/16 Mobile home board		7,160	14,200		2,880	19,100	2,630			210	46,200
Water/moisture resistant board	108,000	510,000	238,000	118,000	682,000	129,000	276,000	153,000	252,000	83,800	2,550,000
Total	838,000	2,520,000	2,770,000	1,680,000	7,390,000	1,810,000	3,840,000	2,590,000	3,020,000	558,000	27,000,000

<sup>--</sup> Zero.

Source: Gypsum Association.

<sup>&</sup>lt;sup>1</sup>Data are rounded to no more than three significant digits; may not add to totals shown.

<sup>&</sup>lt;sup>2</sup>Sales region equivalent to U.S. Census Bureau Geographic Division as follows: New England (CT, MA, ME, NH, RI, VT); Middle Atlantic (NJ, NY, PA); East North Central (IL, IN, MI, OH, WI); West North Central (IA, KS, MN, MO, ND, NE, SD); South Atlantic (DC, DE, FL, GA, MD, NC, SC, VA, WV); East South Central (AL, KY, MS, TN); West South Central (AR, LA, OK, TX); Mountain (AZ, CO, ID, MT, NM, NV, UT, WY); Pacific (AK, CA, HI, OR, WA).

<sup>&</sup>lt;sup>3</sup>One square meter equals 10.78 square feet.