

# 2006 Minerals Yearbook

## CONNECTICUT



### THE MINERAL INDUSTRY OF CONNECTICUT

### This chapter has been prepared under a Memorandum of Understanding between the U.S. Geological Survey and the Connecticut Geological and Natural History Survey for collecting information on all nonfuel minerals.

In 2006, Connecticut's nonfuel raw mineral production<sup>1</sup> was valued at about \$168 million, based upon annual U.S. Geological Survey (USGS) data. This was a more than 4% increase compared with that of 2005 and followed a nearly 23% increase from 2004 to 2005. Because data for dimension stone (mostly quartzite) and common clays were withheld (company proprietary data), the actual total values for 2004-06 are higher than those reported in table 1.

Crushed stone and construction sand and gravel, the leading nonfuel mineral commodities by value, accounted for nearly all the State's total nonfuel mineral production and value. In 2006, an \$11.4 million increase in the value of construction sand and gravel more than offset a \$3.8 million decrease in the value of crushed stone, resulting in the State's overall rise in production value for the year. Although construction sand and gravel production increased by nearly 5%, the commodity's total production value rose by nearly 18% because of a 13% increase in its average unit value for the year. A slight increase took place in the unit value of crushed stone but its production was down by about 5%. The value of common clay also was up, slightly, while the production and value of dimension stone and gemstones were the same as that of 2005 (table 1).

The following narrative information was provided by the Connecticut Geological and Natural History<sup>2</sup> Survey (CGNHS). By yearend, CGNHS records indicated that 30 bedrock stone quarries and one clay quarry were actively mining in 2006. The importance of mining information in Connecticut has increased in the past several years, with its relevancy continually emphasized through mining and minerals information requests to the CGNHS by Connecticut's Department of Environmental Protection, and the State's Office of Legislative Research, in addition to consultants, homeowners, and land speculators.

### **Environmental Issues**

In 2006, an historic Verde Antique dimension and decorative marble mine was disturbed during the construction and expansion of a shopping mall in Milford, CT. Because of the concern about airborne asbestos (chrysotile) exposure to the construction workers, the State Department of Public Health was notified, and mitigation measures were employed to reduce airborne particulates and to cover the exposure upon completion of the construction project. The project was completed and is now an active shopping district.

Abandoned barite mines in the south-central Connecticut town of Cheshire became a substantial public issue in 2006 owing to a large 60-meter-wide sinkhole formed by land subsidence in a homeowner's yard that overlaid an old buried mine shaft. The Cheshire town attorney had previously recommended that notices about sinkhole hazards be placed on land records for areas of the town where the old mines were located. At yearend, a resolution of the matter had not yet been reached between attorneys for the homeowner with the new sinkhole and the town attorneys with regard to responsibility for mitigating the hazard. Several depressions, the new sinkhole, and a street cave-in were determined to be aligned over an old mine shaft in the town. Overall, an estimated 16 underground mine shafts are in the town under what in now considered to be reclaimed land, much of which is in residential areas.

### **State Government Activities**

The accuracy of mining information remained a basic part of the CGNHS mission. In 2006, the agency took a renewed approach to its in-house information, in part with a small increase in staffing for the expressed purpose of assisting with quality control of the Connecticut mines database. This included work on updating Connecticut mining information to ensure accuracy of mining locations and the most current status of mining activities in all known locations. The agency review of the State's mines database included and was supplemented by fieldwork that it conducted to validate entries; the database included the tabulation of Global Positioning System (GPS) site locations.

Additionally, the CGNHS continued promoting interest in the State's Educational Mineral Collecting permit program, in which mineral clubs, museums, nature centers, and schools in the State may apply for permits to collect minerals at selected historic quarry sites on State land. A description of the program and permit application is available on the Internet (Connecticut Department of Environmental Protection, 2008).

### **Reference Cited**

<sup>&</sup>lt;sup>1</sup>The terms "nonfuel mineral production" and related "values" encompass variations in meaning, depending upon the mineral products. Production may be measured by mine shipments, mineral commodity sales, or marketable production (including consumption by producers) as is applicable to the individual mineral commodity.

All 2006 USGS mineral production data published in this chapter are those available as of March 2008. All USGS Mineral Industry Surveys and USGS Minerals Yearbook chapters—mineral commodity, State, and country—can be retrieved over the Internet at URL http://minerals.usgs.gov/minerals.

<sup>&</sup>lt;sup>2</sup>Margaret A. Thomas, Acting State Geologist and Environmental Analyst with the Connecticut Geological and Natural History Survey, authored the text of the State mineral industry information provided by that agency.

Connecticut Department of Environmental Protection, 2008, Educational mineral collecting for mineral clubs, nature centers, schools, and Connecticut museums, accessed November 13, 2008, at http://www.ct.gov/dep/cwp/view.asp?a=2701&q=323440&depNav\_GID=1641.

### TABLE 1 NONFUEL RAW MINERAL PRODUCTION IN CONNECTICUT<sup>1, 2</sup>

#### (Thousand metric tons and thousand dollars unless otherwise specified)

	2004		2005		2006	
Mineral	Quantity	Value	Quantity	Value	Quantity	Value
Clays, common	87	(3)	89	(3)	85	(3)
Gemstones, natural	NA	6	NA	6	NA	6
Sand and gravel, construction	8,330	55,600	8,400	64,200	8,780	75,600
Stone:						
Crushed	10,100	75,700	10,500 <sup>r</sup>	96,600 r	10,000	92,800
Dimension	W	(3)	W	(3)	W <sup>(3)</sup>	(3)
Total	XX	131,000	XX	161,000 r	XX	168,000

<sup>r</sup>Revised. NA Not available. W Withheld to avoid disclosing company proprietary data. XX Not applicable.

<sup>1</sup>Production as measured by mine shipments, sales, or marketable production (including consumption by producers).

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

<sup>3</sup>Value excluded to avoid disclosing company proprietary data.

	TABLE 2	
CONNECTICUT:	CRUSHED STONE SOLD OR USE	D, BY $KIND^1$

		2005			2006			
	Number	Quantity		Number	Quantity			
	of	(thousand	Value	of	(thousand	Value		
Kind	quarries	metric tons)	(thousands)	quarries	metric tons)	(thousands)		
Limestone <sup>2</sup>	4	1,070 <sup>r</sup>	\$9,780	4	959	\$8,790		
Dolomite	2	644	6,390	2	661	6,260		
Marble	1	46	474	1	134	1,160		
Granite	7 <sup>r</sup>	630 <sup>r</sup>	5,980 <sup>r</sup>	7	640	5,720		
Traprock	9	7,980	73,000	8	7,600	70,500		
Miscellaneous stone	2 <sup>r</sup>	97 <sup>r</sup>	983 <sup>r</sup>	2	46	392		
Total	XX	10,500 r	96,600 r	XX	10,000	92,800		

<sup>r</sup>Revised. XX Not applicable.

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

<sup>2</sup>Includes limestone-dolomite reported with no distinction between the two.

#### TABLE 3

### CONNECTICUT: CRUSHED STONE SOLD OR USED BY PRODUCERS IN 2006, BY USE<sup>1</sup>

#### (Thousand metric tons and thousand dollars)

Use	Quantity	Value
Construction:		
Coarse aggregate (+1 <sup>1</sup> / <sub>2</sub> inch):		
Riprap and jetty stone	W	W
Other coarse aggregate	3	37
Coarse aggregate, graded:		
Concrete aggregate, coarse	(2)	(2)
Bituminous aggregate, coarse	(2)	(2)
Other graded coarse aggregate	139	2,070
Total	356	3,510
Fine aggregate (- <sup>3</sup> / <sub>8</sub> inch):		
Stone sand, bituminous mix or seal	W	W
Other fine aggregate	23	354
Coarse and fine aggregates:		
Graded road base or subbase	W	W
Other coarse and fine aggregates	43	343
Other construction materials	9	74
Agriculture, limestone	W	W
Unspecified: <sup>3</sup>		
Reported	8,200	76,600
Estimated	1,100	9,900
Total	9,310	86,500
Grand total	10.000	92.800

W Withheld to avoid disclosing company proprietary data; included in "Grand total."

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

<sup>2</sup>Withheld to avoid disclosing company proprietary data; included in "Total."

<sup>3</sup>Reported and estimated production without a breakdown by end use.

# TABLE 4 CONNECTICUT: CONSTRUCTION SAND AND GRAVEL SOLD OR USED IN 2006, BY MAJOR USE CATEGORY<sup>1</sup>

	Quantity		
	(thousand	Value	Unit
Use	metric tons)	(thousands)	value
Concrete aggregate and concrete products <sup>2</sup>	1,010	\$10,900	\$10.82
Asphaltic concrete aggregates and road base materials <sup>3</sup>	324	3,320	10.24
Fill	359	1,410	3.93
Snow and ice control <sup>4</sup>	228	2,770	12.15
Unspecified: <sup>5</sup>			
Reported	1,540	11,800	7.64
Estimated	5,320	45,400	8.53
Total or average	8,780	75,600	8.61
1			

<sup>1</sup>Data are rounded to no more than three significant digits, except unit value; may not add to totals shown.

<sup>2</sup>Includes plaster and gunite sand.

<sup>3</sup>Includes road and other stabilization (lime).

<sup>4</sup>Includes filtration.

<sup>5</sup>Reported and estimated production without a breakdown by end use.