

## GEMSTONES<sup>1</sup>

(Data in million dollars, unless noted)

**Domestic Production and Use:** Output of natural gemstones was primarily from Tennessee, Alabama, Arkansas, North Carolina, Oregon, and Arizona. Output of synthetic gemstones was primarily from 14 firms; 4 in Arizona, 3 in California, and 1 each in Massachusetts, Michigan, New Jersey, New Mexico, North Carolina, Ohio, and Washington. It was estimated that visitors found 185 carats of diamonds in the Crater of Diamonds State Park in Arkansas. There was considerable production of freshwater pearls in Tennessee; turquoise in Arizona and Nevada; beryl, tourmaline, and amethyst in Maine; tourmaline, beryl, kunzite, and garnet in California; and sapphire in Montana. Major uses were jewelry, carvings, and gem and mineral collections.

### **Salient Statistics—United States:**

	<u>1991</u>	<u>1992</u>	<u>1993</u>	<u>1994</u>	<u>1995<sup>e</sup></u>
Production: Natural <sup>2</sup>	84.4	66.2	57.7	50.5	75.5
Synthetic	17.9	18.9	18.1	22.2	24.4
Imports for consumption	4,640	4,950	5,850	6,440	6,520
Exports, including reexports	1,710	1,450	1,630	2,240	2,510
Consumption, apparent	3,030	3,480	4,300	4,270	4,110
Price	Variable, depending on size, type, and quality				
Stocks, yearend <sup>3</sup>	NA	NA	NA	NA	NA
Employment, mine <sup>4</sup>	800	800	1,000	1,000	850
Net import reliance <sup>5</sup> as a percent of apparent consumption	97	98	98	98	98

**Recycling:** Insignificant.

**Import Sources (1991-94 by value):** Israel, 28%; India, 25%; Belgium, 15%; United Kingdom, 5%; and other, 27%. Diamond imports were about 90% of the total value of gem imports.

<u>Tariff:</u>	<u>Item</u>	<u>Number</u>	<u>Most favored nation (MFN)</u> <u>12/31/95</u>	<u>Non-MFN<sup>6</sup></u> <u>12/31/95</u>
	Diamonds, unworked or sawn	7102.31.0000	Free	Free.
	Diamond, less than ½ carat	7102.39.0010	Free	10% ad val.
	Diamond, cut, more than ½ carat	7102.39.0050	Free	10% ad val.
	Precious stones, unworked	7103.10.2000	Free	Free.
	Precious stones, simply sawn	7103.10.4000	21% ad val.	50% ad val.
	Rubies, cut	7103.91.0010	Free	10% ad val.
	Sapphires, cut	7103.91.0020	Free	10% ad val.
	Emeralds, cut	7103.91.0030	Free	10% ad val.
	Other precious, cut but not set	7103.99.1000	2.1% ad val.	10% ad val.
	Other precious stones, other	7103.99.5000	21% ad val.	50% ad val.
	Imitation precious stones	7018.10.2000	2.8% ad val.	20% ad val.
	Synthetic cut, but not set	7104.90.1000	3.1% ad val.	10% ad val.
	Pearls, natural	7101.10.0000	Free	10% ad val.
	Pearls, cultured	7101.21.0000	2.1% ad val.	10% ad val.
	Pearls, imitation not strung	7018.10.1000	8% ad val.	60% ad val.

**Depletion Allowance:** 14% (Domestic), 14% (Foreign).

**Government Stockpile:** The National Defense Stockpile (NDS) does not contain an inventory of gemstones per se. However, portions of the industrial diamond inventory are of near-gem or gem quality. Additionally, the beryl and quartz inventories contain some gem-quality materials and the inventory of synthetic ruby and sapphire could be used by the gem industry. The Defense Logistics Agency is currently disposing of materials from the NDS.

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**Events, Trends, and Issues:** In the past, except for a few gem diamonds found each year in Arkansas, U.S. diamond production was insignificant. However, test mining is underway at two mines in the Colorado-Wyoming Stateline district. Domestic commercial gemstone production includes agates, beryls, freshwater pearls, garnets, jade, jasper, mother-of-pearl, opals, peridot, quartz, sapphire, tourmalines, and turquoise. Significant steps are being made in the marketing of lines of jewelry made with U.S. gemstones.

Exploration for diamonds continues in Alaska, Colorado, Michigan, Minnesota, Wisconsin, and Wyoming. The second phase of the diamond exploration project, bulk sampling, at the Crater of Diamonds State Park in Arkansas has been approved. Significant diamond exploration efforts by multiple companies continued in the Northwest Territories of Canada and in several areas in Australia.

### World Mine Production,<sup>7</sup> Reserves, and Reserve Base:

	Mine production		Reserves and reserve base <sup>8</sup>
	<u>1994</u>	<u>1995<sup>e</sup></u>	
United States	—	—	World reserves and reserve base of gem diamond are substantial. No reserves or reserve base data are available for other gemstones.
Angola	270	300	
Australia	19,500	20,000	
Botswana	11,000	11,000	
Brazil	600	600	
Central African Republic	370	400	
China	230	250	
Ghana	580	600	
Namibia	1,280	1,300	
Russia	8,500	8,500	
Sierra Leone	155	200	
South Africa	5,000	5,000	
Venezuela	220	200	
Zaire	4,000	4,000	
Other countries	<u>5,230</u>	<u>5,300</u>	
World total (rounded)	<u>56,900</u>	<u>57,700</u>	

**World Resources:** Most of the world gem diamond reserves are in southern Africa, Russia, and Western Australia. Estimation of a reserve base is now difficult to determine because of the changing economic evaluation of near-gem materials and new discoveries in Australia, Canada, and Russia.

**Substitutes:** Plastics, glass, metals, wood, paper, and other materials are substituted for gemstones. Synthetic materials that have the same appearance and chemical and physical properties are substituted for natural gemstones. Simulants are materials of similar appearance, but with different chemical and physical properties, that are substituted for natural gemstones.

<sup>e</sup>Estimated. NA Not available.

<sup>1</sup>Excludes industrial diamond and garnet. See Diamond (Industrial) and Garnet (Industrial).

<sup>2</sup>Natural includes production of freshwater pearls, natural and cultured.

<sup>3</sup>Stocks data are not available and are assumed to be zero for apparent consumption and net import reliance calculation.

<sup>4</sup>Estimate includes operators of fee site deposits.

<sup>5</sup>Defined as imports - exports + adjustments for Government and industry stock changes.

<sup>6</sup>See Appendix B.

<sup>7</sup>Data in thousands of carats of gem diamond.

<sup>8</sup>See Appendix C for definitions.