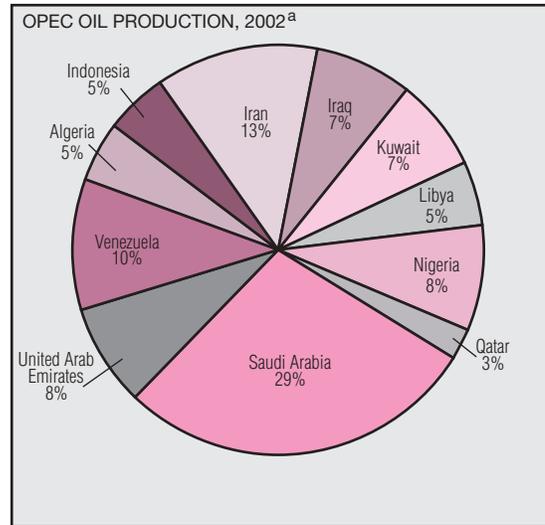
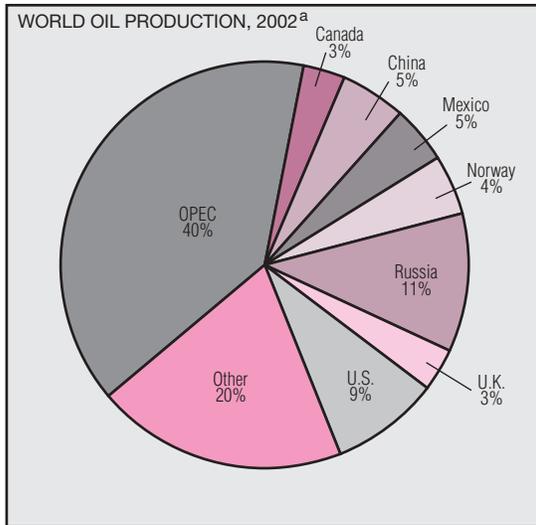


International Oil Markets



OPEC Crude Oil Production (thousands of barrels a day)			
	February 2003	Quota	Surplus capacity
Algeria	1,050	782	50
Indonesia	1,025	1,270	25
Iran	3,700	3,597	50
Iraq	2,315	N/A	585
Kuwait	2,125	1,966	75
Libya	1,370	1,312	30
Nigeria	2,225	2,018	75
Qatar	740	635	110
Saudi Arabia	8,700	7,963	1,800
United Arab Emirates	2,200	2,138	300
Venezuela	1,400	2,819	0
OPEC	26,850	24,500	3,100



a. Based on 10 months of data.

SOURCES: U.S. Department of Energy, Energy Information Administration; OPEC; and Bloomberg Financial Information Services.

Oil, the world's single most important energy source, is in limited supply. The global economy depends on oil-producing nations to provide a steady, reliable supply. About 40% of world oil production is supplied by the Organization for the Petroleum Exporting Countries. OPEC was formed in 1960 by Iran, Iraq, Saudi Arabia, and Venezuela to maintain stability in the oil market for the benefit of producers and consumers. Today, OPEC's 11 members collectively possess more than three-quarters of the world's total crude oil reserves and

supply 55% of the oil traded in international markets.

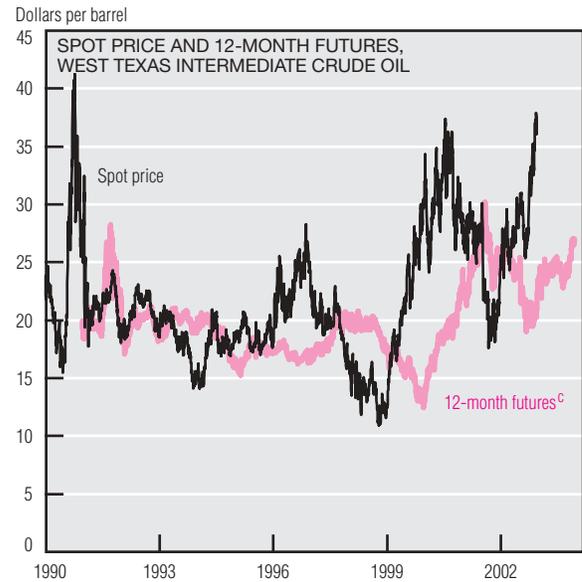
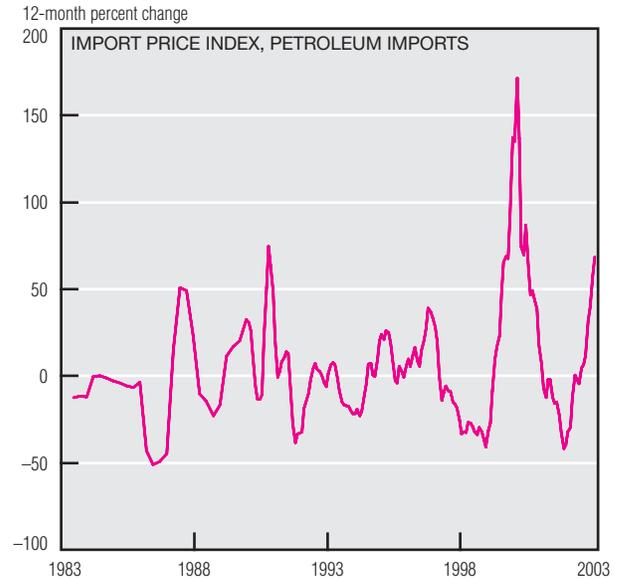
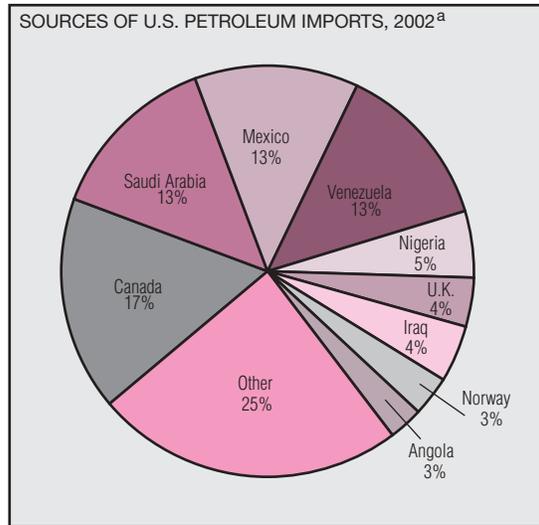
The dominant OPEC member is Saudi Arabia, which has been the world's largest oil producer since 1993 and accounted for more than 11% of world oil production in 2002. Each of the other major members—Iran, Venezuela, Nigeria, and the United Arab Emirates—accounted for somewhere between 3% and 5% of world oil production last year.

As a major oil producer, OPEC exercises a powerful influence on the oil market, increasing or decreasing

production in response to falling or rising oil prices. Its members set output limits or quotas for regulating oil supply in order to stabilize price movements. Recently, because of the geopolitical situation in Iraq, production shortages in Venezuela, and declining petroleum stocks, the world market price for oil has risen significantly. In response, OPEC has set production levels above its former limits. In February 2003, all its members except Indonesia and Venezuela were exceeding their quotas to counteract

(continued on next page)

International Oil Markets (cont.)



a. Based on 11 months of data.

b. Futures prices with a one-month lead.

c. Futures prices with a 12-month lead.

SOURCES: U.S. Department of Labor, Bureau of Labor Statistics; U.S. Department of Energy, Energy Information Administration; and Bloomberg Financial Information Services.

upward price pressure. Current prices are well above OPEC's ceiling of \$28 dollars per barrel, so the organization will have to increase production still further to bring prices back below that ceiling.

The U.S., the world's largest importer of oil, buys more than 60% of its total oil consumption abroad. The major suppliers of oil to this country are Canada, Mexico, Saudi Arabia, and Venezuela, which collectively account for about 56% of U.S. oil imports.

Oil prices' volatility recently doubled compared to the early 1990s. Petroleum import prices rose 68.6% between January 2002 and January 2003, after falling 39.5% in the previous calendar year. The spot price of West Texas intermediate crude rose 35% between December 2002 and February 2003, when it reached \$37.70, the highest price since the Gulf War.

Wide oil price fluctuations introduce uncertainty into business and personal decision making, so it is not surprising that futures markets have

arisen to mitigate this risk. Futures prices are sometimes considered a good predictor of spot prices. One-month futures contracts seem to track spot prices fairly well, with futures prices highly correlated (0.9) with the spot. Currently, prices for one-month futures contracts indicate that oil prices will remain high through March. It is much harder, however, to predict oil prices a year ahead from the futures market. One-year futures prices do not track spot prices very well and are only weakly correlated (0.15) with them.