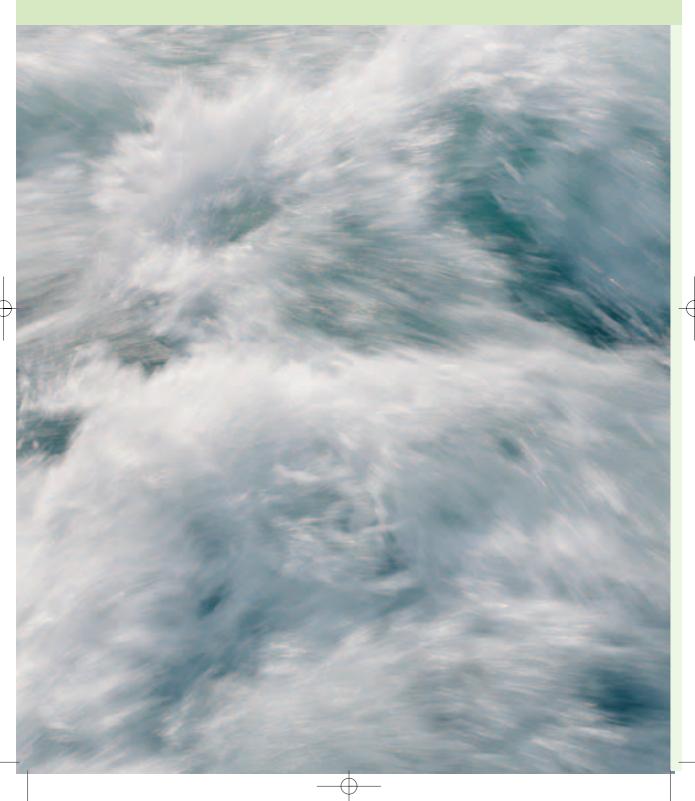
The petroleum sector – Norway's largest industry



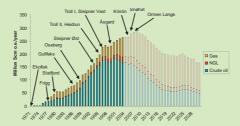


Figure 1.1 Production level and start-up dates for important fields (Source: NPD/MPE)

In the late 1950s, very few people believed that the Norwegian Continental Shelf (NCS) might conceal rich oil and gas deposits. However, the discovery of gas at Groningen in the Netherlands in 1959 caused geologists to revise their thinking on the petroleum potential of the North Sea.

With the Ekofisk discovery in 1969, the Norwegian oil adventure began to earnest. Production from the field began on 9 June 1971, and in the following years a number of major discoveries were made. Today, there are 48 fields in production on the NCS. Production from these fields corresponds to around 20 times the domestic consumption of petroleum and has established Norway as a key supplier to the global oil market and the European gas market. In connection with the development of the Snøhvit field, for the first time agreements have been signed for the sale of gas to markets outside Europe.

2004 was a record year for petroleum production on the NCS. Production amounted to 3.2 million barrels of oil (including NGL and condensate) per day and 78 billion standard cubic metres of gas, making a total of saleable petroleum of 263 million standard cubic metres of oil equivalents (scm oe).

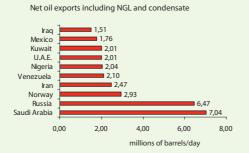
Norway ranks as the world's third largest oil exporter and the seventh largest oil producer. In 2003, Norway was the world's third largest gas exporter and the eighth largest gas producer¹.

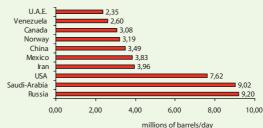
The significance of the petroleum sector in the Norwegian society

Petroleum activities have contributed significantly to economic growth in Norway and to the financing of the Norwegian welfare state. Through more than 30 years of operation, the industry has created values in excess of NOK 4,000 billion in current terms; it is today Norway's largest industry. In 2004, the petroleum sector accounted for 21 percent of the value creation in the country. This equates to twice the value creation of the manufacturing industry and around 15 times the total value creation of the primary industries.

Through direct and indirect taxes and direct ownership, the state is ensured a high proportion of the values created from the petroleum activities. In 2004, the state's net cash flow from the petroleum sector

Oil production including NGL and condensate





Figur 1.2 The largest oil producers and exporters in 2004 (incl. NGL/condensate)

(Source: Petroleum Economics Ltd)

¹ Source: IEA: Key World Energy Statistics 2004 (based on 2003 figures).

The Largest Industry in Norway (2004)

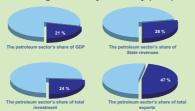


Figure 1.3 Macroeconomic indicators for the petroleum sector (Source: Statistics Norway, Ministry of Finance)

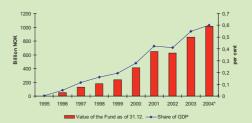


Figure 1.4 The size of the Petroleum Fund at 31.12.2004 and as a share of GDP (Source: Norwegian Public Accounts, Statistics Norway)

amounted to 28 percent of total revenues. After more than 30 years of production, the business has generated net revenues to the state in the order of NOK 2,000 billion in current terms. Beyond the resources used to cover the non-oil budget deficit, the state's revenues from petroleum activities are allocated to a separate fund, the Petroleum Fund. By the end of 2004, the value of this fund was NOK 1,016 billion.

In 2004, crude oil, natural gas and pipeline services accounted for 47 percent of the value of Norway's exports. This share increases to nearly 50 percent if refined products and goods and services from the supply industry are included. In 2004, the total NOK value of petroleum exports was 346 billion, 36 times higher than the export value of fish.

Since the petroleum industry started its activities on the NCS, huge sums have been invested in exploration, field development, transport infrastructure and onshore installations; at the end of 2004 around NOK 1,800 billion in current terms. Investment for 2004 was NOK 71 billion, or 24 percent of the country's total real investments.

Norwegian petroleum industry

The development of Norwegian and Norwegianbased petroleum expertise has been an important factor in Norwegian petroleum policy. Initially, there was a strong element of knowledge transfer from foreign oil companies and supply/service companies, but today Norway has a highly developed and internationally competitive petroleum industry. This applies to oil companies, the supply industry and research institutions alike. The industry provides a powerful boost for innovation and technology development to other sectors of the Norwegian economy. Supply companies in Norway are active along most of the supply chain – from exploration and development to production and disposal. In a number of areas, Norwegian suppliers are among the world leaders, in particular in seismic surveying, subsea installations and floating production systems. They are present in all of the country's counties. Local and regional economic trickle-down from petroleum activities extends to a relatively high degree even to areas of the country not normally associated with petroleum activities. The Norwegian Directorate of Labour's latest survey, from 2003, showed that more than 75,000 people are employed in the petroleum industry in Norway.

Future trends

In spite of more than 30 years of production, only about 30 percent of the expected total resources on the NCS have been produced. There is thus huge potential for further value creation.

Figure 1.5 shows a forecast for future production from the NCS. It is based on the Norwegian Petroleum Directorate's (NPD) estimate of recoverable petroleum resources on the NCS and assumes that the authorities and the industry take the requisite decisions for recovering the remaining volumes.

Oil production is expected to remain relatively constant until 2007, and then to fall gradually. Gas production is expected to increase until 2010 and to plateau at a level of 120 billion scm. From representing around 30 percent of Norwegian petroleum production in 2005, gas production is likely to continue to increase and may come to represent a share of more than 50 percent by 2014. In the longer term, the number and size of new discoveries will be a critical factor for the production level.

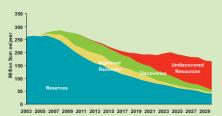


Figure 1.5 Production forecast (breakdown of oil/gas in figure 1.1) (Source: NPD/MPE)

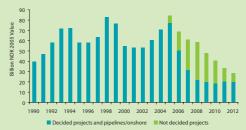


Figure 1.6 Historic investments and forecasted future investments (Source: NPD/MPE)

The level of activity on the NCS remains high. In 2004, investments of NOK 71 billion were made, while investments in exploration activity amounted to NOK 4 billion. In 2005, an investment level of NOK 88 billion is anticipated and between 30 and 40 exploration wells are scheduled for drilling. There will be investment both in measures to increase oil recovery and in developing new fields. The individual projects with the largest investments are Snøhvit, Ormen Lange and Kristin. Investments are expected to fall after 2005, but forecasts indicate that activity in the industry will remain high over the long term, see fig. 1.6. In the years ahead, investment will relate primarily to modification and drilling activities. There is considerable uncertainty in the investment

forecasts, in both the longer and the shorter terms. In addition to the investments, the forecasts also show a market for operations and maintenance of NOK 30–35 billion annually for years to come.

The oil companies' investments in development, operations and maintenance on the NCS generate considerable demand for products and services from the supply industry in Norway and elsewhere. However continued growth depends on success internationally. International experience and participation in international development projects are extremely important for the further growth of the supply industry. In addition, international experience of this kind has the potential to contribute to further cost savings on the NCS.



Ekofisk